BEFORE THE PUBLIC UTILITIES COMMISSION OF OHIO

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APPLICATION OF DUKE ENERGY OHIO, INC.

- 1. Duke Energy Ohio, Inc., (Duke Energy Ohio or Company) is an Ohio corporation engaged in the business of supplying electricity distribution service to customers in southwestern Ohio and is a public utility as defined by Section 4905.02 and 4905.03 Revised Code. As an Ohio electric distribution utility, Duke Energy Ohio is subject to the mandates set forth in Revised Code (R.C.) 4928.66, including, *inter alia*, the requirements to implement energy efficiency programs and peak demand reduction programs.
- 2. Subsequent to the enactment of the mandates contained in R.C. 4928.66, the Public Utilities Commission of Ohio (Commission) promulgated rules to facilitate the Commission's oversight of compliance with this law. These rules are set forth in Ohio Administrative Code (O.A.C.) 4901:1-39-01, et seq. This Application is submitted in compliance with these rules. Where required, the Company requests a waiver from applicable rules and will explain, in detail, the basis for the request.
- 3. In Case No. 13-431-EL-POR, the Public Utilities Commission of Ohio (Commission) approved a portfolio of energy efficiency and peak demand reduction

 programs.¹ In compliance with the Commission's rules, Duke Energy Ohio also submitted an assessment of potential, entitled, "The Market Assessment and Action Plan for Electric DSM Programs."

- 4. On March 26, 2014, Duke Energy Ohio submitted an Annual Status Report detailing its compliance with energy efficiency and peak demand reduction mandates.² As stated in the Annual Status Report, the Company continues to develop and research additional programs to enhance its ability to meet the mandates set forth in R.C.4928.66.
- 5. As a result of this continuing research, Duke Energy Ohio proposes an additional non-residential energy efficiency program for inclusion in its portfolio that will allow it to more effectively deliver measures that are already included in its Commission-approved Non-Residential Smart Saver Prescriptive Program, to a hard to reach segment of the non-residential market. The program is targeted at small business customers and is called *Small Business Energy Saver* (SBES).
- 6. SBES is a program designed to target the hard-to-reach small business sector by introducing approved prescriptive measures. The program will consist of a free energy assessment resulting in a customized proposal with improvement recommendations and eligible incentives provided upfront to offset the cost of measure installation, with the entire process managed by a program administrator. This program will help alleviate the burden of implementing energy efficiency measures for this smaller business customer segment. An overview of the program was presented to the Duke Energy Community Partnership (Collaborative) on October 7, 2013. The Collaborative accepted the program

¹ In the Matter of the Application of Duke Energy Ohio for Energy Efficiency and Peak Demand Reduction Portfolio of Programs, Case No. 13-431-EL-POR, Opinion and Order, December 4, 2013.

² In the Matter of the Annual Energy Efficiency Portfolio Status Report of Duke Energy Ohio, Inc., Case No. 14-456-EL-EEC, March 26, 2014.

and agreed that the Company should seek approval to include it in the portfolio. Duke Energy Ohio hereby requests approval of this program through December 31, 2016, to align with the timeframe of the existing Energy Efficiency portfolio. The projected program budget for the three years is as follows:

Annual Total Program	2014	2015	2016	
Costs ³	\$ 1,961,887	\$ 4,531,326	\$ 5,467,536	

7. In compliance with the Commission's rules for approval of energy efficiency and peak demand reduction programs, Duke Energy Ohio submits the following information:

Rules 4901:1-39-03(A) - Program Planning Requirements

Duke Energy Ohio respectfully refers the Commission to *The Market Assessment* and Action Plan for Electric DSM Programs that was submitted in Case No. 13-431-EL-POR. That report remains relevant and timely. In the alternative, should the Commission deem it not sufficient for compliance with the rule, Duke Energy Ohio respectfully requests that the Commission grant a waiver from the requirements of this rule, for this application. Duke Energy Ohio respectfully submits that good cause exists to permit the inclusion of an additional program in the Company's portfolio in order to enable the Company to better meet its statutory requirements and to encourage the possibility of developing appropriate programs in real-time when necessary. It is necessary to continually enhance the portfolio to address new technological advancements and changing market conditions, as well as,

³ The forecasted annual costs do not include estimates for evaluation, measurement and verification. These costs will not exceed five percent of the program budget.

provide additional opportunities to customers beyond the low-hanging energy efficiency. The remaining information required by the Rules in Chapter 4901:1-39-03, are set forth below:

Rule 4901:1-39-03(B) - Program Design Criteria

The Small Business Energy Saver (SBES) program uses the direct install energy efficiency program model to offer eligible non-residential customers a free, no-obligation energy assessment of their facility and a recommendation of energy efficiency measures including the projected costs (materials plus installation), incentives, and projected energy savings. If the customer is interested in moving forward with a proposed project, the program administrator works with local electrical subcontractors for measurement and installation services. The incentive from Duke Energy Ohio is provided upfront, offsetting the initial measure & installation costs required by the customer. The participating customer is responsible for payment of the remaining portion of the project cost, payable directly to the program administrator.

Rule 4901:1-39-03(B)(1) - Relative Cost Effectiveness

SBES	Utility Test	TRC Test	RIM Test	Participant Test
SDES	3.12	2.51	2.34	2.78

Rule 4901:1-39-03(B)(2) - Benefit to All Members of the Customer Class, Including Nonparticipants

Participating customers will have the opportunity to realize several key benefits by participating in the SBES program, some of which include: Reduced energy consumption and energy costs at their business as well as reduced ongoing operation and maintenance costs which result from inefficient equipment; Increased awareness of how their buildings are using energy and whether or not that usage is efficient; Improved conditions within their

business resulting from the energy efficiency upgrades, which has been found to increase workplace productivity. The participating customers will in turn provide significant energy and capacity benefits which will benefit the entire system, including non-participating customers.

Rule 4901:1-39-03(B)(3) - Potential for Broad Participation Within the Targeted Class

SBES program eligibility will be limited to all non-residential customers with an average annual electric demand of 100kW or less that are not classified as new construction. Participants may be owner-occupied or tenant facilities with owner permission. A landlord consent agreement must be executed when the customer does not own the occupied facility. Based on the eligibility requirements, there are approximately 60,000 customers that can benefit from this program. Duke Energy Ohio expects an adoption rate of approximately 5 percent – 6 percent of eligible non-residential customers, which reflects what has been achieved in the Duke Energy Progress service territory to date.

Rule 4901:1-39-03(B)(4) - Likely Magnitude of Aggregate Energy Savings or Peak Demand reduction

Regarding the basis for the estimated energy reduction impacts, the Company produced the impact estimates using industry information from a variety of sources, including existing results from the SBES program currently in operation within the Duke Energy Progress in North and South Carolina service territory (for which the proposed Duke Energy Ohio program has been modeled), as well as other utility program information and evaluations of similar programs. Over time, as impact and process evaluations are performed on this program, information and input specifically related to this program will be

used within future cost-effectiveness analyses. Based on the projected participation, the forecasted energy savings and peak demand reduction associated with the SBES program are summarized in the table below:

	2014	2015	2016	2017	2018
kW	1,716	5,792	12,441	24,882	49,764
kWh	7,117,883	14,235,765	28,471,530	56,943,061	113,886,121
Participation	6,731,644	22,719,303	42,072,785	61,426,266	80,779,748

kW - Gross Cumulative Summer Coincident kW w/losses, kWh - Gross Cumulative kWh w/losses, Participation - Cumulative Participants (refers to number of kWh saved)

Rule 4901:1-39-03(B)(5) - Non Energy Benefits

The SBES program will have several non-energy benefits. First, customer satisfaction among the small business sector will likely increase because this customer segment has previously been considered an underserved market in terms of energy efficiency program offerings from Duke Energy Ohio. The SBES program is designed to effectively remove barriers to small business program participation, offering attractive incentive levels and convenient, turn-key energy efficiency installations. The program is also designed to further increase customer satisfaction, with the program administrator offering extended, interest-free payment options, waste disposal and comprehensive warranties on materials and labor. Second, the program design leverages local electrical subcontractors to perform the equipment installations, which effectively boosts the local economy and helps to create new, green jobs within the Duke Energy Ohio service territory. Third, as mentioned above in Section (B)(2), improved conditions within participants' businesses resulting from the energy efficiency upgrades can improve employee comfort levels and increase workplace productivity as well as have the potential to increase the facilities' property values.

Rule 4901:1-39-03(B)(6) - Equity Among Customer Classes

Given the nature of the program, the SBES program is solely targeted at small non-residential customers. However, as previously mentioned, small non-residential customer participation in Duke Energy Ohio's other non-residential program offerings has historically occurred at much lower levels than the medium and large business segment. Thus, designing the SBES program specifically for the small business customer segment using a model proven to be effective with small businesses improves upon an existing inequity among the non-residential customer classes.

Rule 4901:1-39-03(B)(7) - Relative Advantages or Disadvantages of Energy Efficiency and Peak-Demand Reduction Programs for the Construction of New Facilities, Replacement of Retiring Capital Stock, or Retrofitting Existing Capital Stock

The SBES program is designed to focus on both the replacement of retiring capital stock and the retrofitting of existing capital stock. The SBES program will offer small business customers an opportunity to replace aging, inefficient equipment that is at or near the end of its useful life (EUL) with new and more efficient technology. The interaction between the customer and the program administrator will create customers who are more aware and engaged in the energy usage and energy issues within their facilities. In addition, participation in SBES will provide insight into other energy conservation measures and offerings the customer may be eligible for through current and future offerings.

Rule 4901:1-39-03(B)(8) - Potential to Integrate the Proposed Program with Similar Programs Offered by Other Utilities, if Such Integration Produces the Most Cost-Effective Result and is in the Public Interest

The SBES program, as presented, is currently in operation within the Duke Energy Progress North & South Carolina service territories and has been offered since January 2013. Along with the effort presented here, Duke Energy is simultaneously preparing to offer the program in the Duke Energy Carolinas service territory and also plans to offer the program in the Duke Energy Kentucky, Inc. service territory as well when the opportunity becomes available. As such, Duke Energy Corporation is presently working to reach agreement on a contract with potential program administrator(s) that would take full advantage of any and all economies of scale in program administrator pricing as well as any other efficiencies made possible through operating the SBES program across four service territories. Duke Energy Ohio is also aware that Ohio Power Company currently offers an Express Program designed for small business customers which uses the same direct install program model planned by Duke Energy Ohio. Duke Energy Ohio will continue to cooperate with other Ohio utilities to determine potential savings available through integration of programs.

Rule 4901:1-39-03(B)(9) - The Degree to Which a Program Bundles Measures so as to Avoid Lost Opportunities to Attain Energy Savings or Peak Reductions That Would Not be Cost-Effective or Would be Less Cost-Effective if Installed Individually

One of the key features of the SBES program design is the ability to bundle multiple measures of a single technology, but also multiple measures across technology types. With every project, the program administrator first conducts a free, no-obligation energy assessment at the eligible customer's facility. During the assessment, the program administrator builds a scope of work/proposal that includes program-eligible suggested replacements for existing equipment and details out all costs for the upgrades (equipment and installation) using standardized, consistent pricing, approved by Duke Energy Ohio for each measure. Program measures will address major end-uses in lighting, refrigeration, and Heating, Ventilation and Air Conditioning (HVAC) applications.

Lighting measures will include screw-in and hard-wired compact fluorescent lights; Light Emitting Diode (LED) exit signs; T5&T8 fluorescent fixtures and ballasts; high bay fixtures and LED fixtures; lighting occupancy sensors will also be included. Refrigeration upgrades will include anti-sweat heater controls, vending machine controls, night covers, evaporator fan controls, EC motors for walk-in and reach-in refrigeration, LED cooler case lighting, and door closers for reach-in and walk-in refrigeration. HVAC upgrades such as unitary, split systems, and air source heat pumps will also be included. It is the goal of the program administrator to bundle measures wherever possible and whenever feasible so that the customer has the potential to save the maximum amount of energy. SBES program incentives are calculated per project based upon the deemed energy savings of the energy efficiency improvements and the conditions found within the customer's facility. Duke Energy Ohio will provide an upfront customer incentive for up to 80 percent of the total cost of installed measures per project, which further encourages the bundling of multiple measures. Before agreeing to participate, the customer has the ability to make the final determination of project scope before moving forward.

Rule 4901:1-39-03(B)(10) - The Degree to Which the Program Design Engages the Energy Efficiency Supply Chain and Leverages Partners in Program Delivery

Duke Energy Ohio is using its energy efficiency supply chain to solicit and select program administrators. A detailed Request For Proposal (RFP) document was issued for program administrators to review and submit bids. Fixed unit pricing per measure was requested from the program administrators so that apple-to-apples comparisons can be made between program administrators. The SBES program is designed to partner with and leverage local general and electrical contracting companies in order to complete the installation of energy efficiency measures on each project. Also, the program

administrator will leverage material distribution partners (both local and national) to procure the energy efficiency measures approved for the program.

Rule 4901:1-39-03(B)(11) - The Degree to Which the Program Successfully Addresses Market Barriers or Market Failures

The SBES program is designed specifically to address and overcome market barriers which have prevented small business customer participation within other program offerings in the past. Small business customers typically lack the time, technical expertise, or upfront capital to participate in programs. Also, many small businesses lease their facilities. Because building tenants may not be the final decision makers on installing energy related equipment into the facility, this market has been generally more difficult to reach by way of traditional incentive programs. The SBES program design ensures that eligible customers will be contacted directly by the program administrator, offered a free energy assessment resulting in customized energy efficiency recommendations and will be provided consistent pricing for energy efficient upgrades. Also, Duke Energy Ohio will pay significant incentives upfront, up to 80 percent per project, thereby reducing the customer's upfront cost, which will significantly reduce the amount of capital initially required to participate and improve the attractiveness of projects, shorten payback times and further breakdown barriers to participation even for tenants of leased facilities. Equipment installation will be scheduled with the business owner to ensure convenience and no disruption to the operation of the business. As mentioned above in this document under Rule 4901:1-39-03(B)(5), interest-free, extended payment options will be provided and administered by the program administrator to alleviate any capital-related obstacles to participation.

Rule 4901:1-39-03(B)(12) - The Degree to Which the Program Leverages Knowledge Gained from Existing Program Successes and Failures

As mentioned above, the SBES program as presented uses the same program design and model of the Duke Energy Progress program currently in operation in North & South Carolina. This program has proven very successful during 15 months in operation and will allow Duke Energy Ohio to benefit from all of the lessons, improvements and efficiencies gained since the Duke Energy Progress program's inception. Also, Duke Energy Ohio plans to utilize the same internal SBES program management resources across all service territories, further enhancing program efficiencies, cohesiveness, and consistency.

Rule 4901:1-39-03(B)(13) - The Degree to Which the Program Promotes Market Transformation

Duke Energy Ohio believes promoting investment in energy efficiency measures and customer engagement will advance the adoption of energy efficiency measures and behavior. Duke Energy Ohio will continue to examine the level of free ridership in this program as a potential indicator of market transformation.

Chapter 4901:1-39-04 - Program Portfolio Plan and Filing Requirements

The rules contained in this Chapter address criteria for program portfolio plans. As the Company has recently obtained approval of its energy efficiency and peak demand portfolio, many of the requirements are not applicable. However, additional information required on a "per program" basis is provided in response to the elements requested in Chapter 4901:1-39-03, O.A.C.

WHEREFORE, for the reasons set forth herein, Duke Energy Ohio respectfully requests Commission approval of Small Business Energy Saver as described herein.

Respectfully submitted,

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