### BEFORE THE NORTH CAROLINA UTILITIES COMMISSION

DOCKET NO. E-2, SUB 1252

In the Matter of
Application of Duke Energy Progress, )
LLC, for Approval of Demand-Side )
Management and Energy Efficiency )
Cost Recovery Rider Pursuant to )
N.C.G.S. § 62-133.9 and Commission )
Rule R8-69

TESTIMONY OF MICHAEL C. MANESS PUBLIC STAFF – NORTH CAROLINA UTILITIES COMMISSION

August 26, 2020

### BEFORE THE NORTH CAROLINA UTILITIES COMMISSION **DOCKET NO. E-2, SUB 1252**

### **Testimony of Michael C. Maness**

#### On Behalf of the Public Staff

#### **North Carolina Utilities Commission**

#### August 26, 2020

1	Q.	PLEASE STATE YOUR NAME, BUSINESS ADDRESS, AND
2		PRESENT POSITION.
3	A.	My name is Michael C. Maness. My business address is 430 North
4		Salisbury Street, Dobbs Building, Raleigh, North Carolina. I am the
5		Director of the Accounting Division of the Public Staff - North
6		Carolina Utilities Commission (Public Staff).
7	0	RRIEFI V STATE VOLID OLIALIFICATIONS AND DUTIES

- A summary of my qualifications and duties is set forth in Appendix B 8 A. 9 of this testimony.
- WHAT IS THE PURPOSE OF YOUR TESTIMONY? 10 Q.
- 11 A. The purpose of my testimony is to present my recommendations 12 regarding the Demand-Side Management (DSM) and Energy

1	Efficiency (EE) cost and incentive recovery rider (DSM/EE Rider), <sup>1</sup>
2	proposed by Duke Energy Progress, LLC (DEP or the Company), in
3	its Application filed in this docket on June 9, 2020 (Application). The
4	DSM/EE Rider is authorized by N.C. Gen. Stat. § 62-133.9 and
5	implemented pursuant to Commission Rule R8-69.

#### 6 Q. HOW IS YOUR TESTIMONY ORGANIZED?

A. My testimony begins with a review of the regulatory framework for DSM/EE cost recovery by electric utilities and the historical background of DEP's Application in this docket. I then discuss the Company's proposed billing rates and other aspects of its filing. Following a summary of my investigation, I present my conclusions and recommendations regarding the proposed billing rates and the overall DSM/EE Rider.

# THE PROCESS FOR SETTING DEP'S DSM/EE REVENUE REQUIREMENTS

#### 16 Q. PLEASE DESCRIBE THE BASIS FOR THE COMPANY'S FILING.

17 A. N.C. Gen. Stat. § 62-133.9(d) allows a utility to petition the
18 Commission for approval of an annual rider to recover (1) the
19 reasonable and prudent costs of new DSM and EE measures; and
20 (2) other incentives to the utility for adopting and implementing new

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<sup>&</sup>lt;sup>1</sup> The DSM/EE Rider is comprised of various class-based DSM, EE, DSM Experience Modification Factor (DSM EMF), and Energy Efficiency Experience Modification Factor (EE EMF) billing rates.

DSM and EE measures. However, N.C. Gen. Stat. § 62-133.9(f)
allows industrial and certain large commercial customers to opt out
of participating in the power supplier's DSM/EE programs or paying
the DSM/EE rider, if an opt-out-eligible customer notifies its electric
power supplier that it has implemented or will implement, at its own
expense, alternative DSM and EE measures. Commission Rule R8-
69, which was adopted by the Commission pursuant to N.C. Gen.
Stat. § 62-133.9(h), sets forth the general parameters and
procedures governing approval of the annual rider, including, but not
limited to: (1) provisions for both (a) a DSM/EE rider to recover the
estimated costs and utility incentives applicable to the "rate period"
in which that DSM/EE rider will be in effect; and (b) a DSM/EE
experience modification factor (EMF) rider to recover the difference
between the DSM/EE rider in effect for a given test period
(plus a possible extension) and the actual recoverable amounts
incurred during that test period; and (2) provisions for interest or
return on amounts deferred and on refunds to customers.
In this proceeding, DEP has calculated its proposed DSM/EE Rider
(incorporating both prospective and Experience Modification Factor
(EMF) DSM and EE billing rates) using the Cost Recovery and
Incentive Mechanism for Demand-Side Management and Energy
Efficiency Programs (Revised Mechanism) approved by the

Commission on January 20, 2015, in its Order Approving Revised
Cost Recovery and Incentive Mechanism and Granting Waivers, in
Docket No. E-2, Sub 931 (2015 Sub 931 Order), as subsequently
amended by the Commission in the Company's 2017 DSM/EE rider
proceeding, Docket No. E-2, Sub 1145 (2017 Sub 1145 Order). <sup>2</sup> The
2017 amendments consisted of certain changes to Paragraphs 18,
22, and 70 of the Revised Mechanism, and the addition of new
Paragraphs 22A through 22D and 70A. A copy of the entire Revised
Mechanism, as amended, was attached to my testimony in Docket
No. E-2, Sub 1174, as Maness Exhibit I.

# 11 Q. PLEASE DESCRIBE THE REVISED MECHANISM (INCLUDING 12 THE 2017 CHANGES) AND ITS MAJOR COMPONENTS.

A. The overall purpose of the Revised Mechanism, as amended, is to (1) allow DEP to recover all reasonable and prudent costs incurred for adopting and implementing new DSM and new EE measures; (2) establish the terms, conditions, and methodology for the recovery of certain utility incentives – Net Lost Revenues (NLR) and a Portfolio Performance Incentive (PPI) - to reward DEP for adopting and

<sup>&</sup>lt;sup>2</sup> Certain billing factor components consisting of costs incurred or incentives earned prior to January 1, 2016, but being carried forward to or amortized as part of the billing factors proposed in this proceeding, were determined pursuant to the Cost Recovery and Incentive Mechanism for Demand-Side Management and Energy Efficiency Programs (Initial Mechanism) approved by the Commission on June 15, 2009, in its *Order Approving Agreement and Stipulation of Partial Settlement, Subject to Certain Commission-Required Modifications*, in Docket No. E-2, Sub 931, as modified by the Commission's November 25, 2009, *Order Granting Motions for Reconsideration in Part*, in the same docket.

implementing DSM and EE measures and programs; (3) provide for
an additional incentive to further encourage kilowatt-hour (kWh
savings achievements; and (4) establish certain requirements and
guidelines to guide requests by DEP for approval, monitoring, and
management of DSM and EE programs. The Revised Mechanism
includes many provisions that indirectly influence the ratemaking
process for DSM and EE costs and incentives, including provisions
that address program approval, management, and modification
evaluation, measurement, and verification (EM&V) of program
results; operation of a Stakeholder Collaborative; procedural matters
and the general structure of the DSM/EE billing rates; allocation
methodologies; reporting requirements; and provisions for the term
and future review of the Revised Mechanism itself, as well as
provisions directly affecting the calculation of the DSM/EE and
DSM/EE EMF riders. A summary of these provisions is set forth in
Appendix A of this testimony.

#### **THE COMPANY'S PROPOSED BILLING RATES**

- Q. PLEASE DESCRIBE THE BILLING FACTORS, VINTAGE YEARS,
   RATE PERIOD, AND TEST PERIOD BEING CONSIDERED IN
   THIS PROCEEDING.
- 21 A. In its Application in this proceeding, DEP requested approval of 22 prospective and EMF DSM and EE billing rates that would result in

annual North Carolina retail revenue of approximately \$174.1 million
[including a revenue adder for the North Carolina Regulatory Fee
(regulatory fee)]. DEP's request would be an increase of
approximately \$12.9 million from the annual revenues that would be
produced by the rates currently in effect. These proposed billing
factors are set forth on DEP witness Listebarger's Exhibit 1. The
factors (rates), as applicable to each class, are proposed by the
Company to be charged to all participating North Carolina retail
customers [i.e., those who have not opted out pursuant to N.C. Gen.
Stat. § 62-133.9(f)] served during the rate period.
The rate period for this proceeding is the twelve-month period from
January 1, 2021, through December 31, 2021. This is the period over
which the prospective DSM and EE billing rates and the DSM and
EE EMF billing rates determined in this proceeding will be charged.
It is also the period for which the estimated revenue requirements
(program costs, NLR, and PPI) to be recovered through the
prospective DSM/EE rates are determined.
The test period applicable to this proceeding is the twelve-month
period ended December 31, 2019. This is the period for which the
under- or overrecovery of DSM/EE revenue requirements as
compared to actual DSM/EE rider revenues is measured for
purposes of determining the DSM and EE EMF billing rates (although

the Commission Rules do allow the true-up to be extended to cover additional months, subject to review and adjustment in next year's proceeding). Actual program costs considered for true-up in this proceeding are either costs actually incurred during the test period, or further true-ups and/or corrections related to previous test periods. For purposes of recovery, actual program costs may be amortized over periods ranging from one to ten years. A return is also calculated on program costs deferred during the test year and on over-recoveries of total program costs after the date the rates change. NLR and PPI reflected in the EMF revenue requirements being set in this proceeding are associated with kWh and dollar savings achieved during Vintage Year 2019 (which is also the test year), as well as true-ups associated with prior vintage years. The PPI revenue requirement may also be amortized on a levelized basis over several years.

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16 Q. WHAT ARE SOME OF THE CHARACTERISTICS OF DEP'S
17 PROPOSED DSM/EE BILLING FACTORS IN THIS SPECIFIC
18 PROCEEDING?

The prospective DSM and EE billing rates incorporate several cost recovery elements as estimated for the rate period, including amortizations of operations and maintenance and administrative and general (A&G) costs, capital costs of the Demand Side Distribution

Response program (DSDR), carrying costs (return on deferred
costs), NLR, and levelized PPI incentives. The test period true-up
DSM and EE EMF billing rates contain test period actual amounts of
the same types of costs and incentives as do the prospective rates.
The DSM and EE EMF billing rates also include adjustments to the
2016, 2017, and 2018 NLR and/or PPI, a reduction for the DSM/EE
billing rate amounts billed during the test period, and interest on over-
collections and under-collections.
NLR amounts included in the DSM and EE billing rates have also
been affected by the Company's most recently concluded general
rate case (Docket No. E-2, Sub 1142). The revenue requirement filed
by the Company in that case took into account DEP's total net
revenue losses through December 31, 2016, and further residential
losses through October 31, 2017. The effective date of the rates set
in the case was March 16, 2018. Therefore, NLR being requested in
this proceeding exclude, effective March 16, 2018, any net revenue
losses due to DSM/EE measures installed or implemented on or prior
to December 31, 2016, for all customers, and on or prior to October

31, 2017, for residential customers.

## Q. WILL THERE BE FUTURE TRUE-UPS OF THE DSM/EE

**REVENUE REQUIREMENTS?** 

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The finalization of the true-ups of NLR and PPI sometimes tends to lag behind the true-ups of program costs and A&G expenses subject to amortization. This feature of the true-up process is due to the fact that while cost amounts are typically known and determinable very soon after they are incurred, it can take several months to complete the applicable EM&V process and to refine and adjust the cost savings results for a given vintage year so that the final actual incentives payable to the utility can be determined. Therefore, while the cost amounts to be trued up as part of the test period DSM/EE EMF revenue requirement in a given annual proceeding typically correspond very closely to the actual costs incurred during the test period, the test period revenue requirement often contains incentives related to more than one vintage year. Additionally, certain components of the revenue requirements related to prior years will remain subject to prospective update adjustments and retrospective true-ups in the future, as participation and EM&V analyses are finalized, reviewed, and perhaps refined.

#### **INVESTIGATION AND CONCLUSIONS**

#### 2 Q. PLEASE DESCRIBE YOUR INVESTIGATION OF DEP'S FILING.

A.

My investigation of DEP's filing in this proceeding focused on
determining whether the proposed DSM/EE Rider (a) was calculated
in accordance with the Initial or Revised Mechanisms, as applicable,
and (b) otherwise adhered to sound ratemaking concepts and
principles. The procedures I and other members of the Public Staff's
Accounting Division acting under my supervision utilized included a
review of the Company's filing, relevant prior Commission
proceedings and orders, and workpapers and source documentation
used by the Company to develop the proposed billing rates.
Performing the investigation required the review of responses to
written and verbal data requests, as well as discussions with
Company personnel. As part of its investigation, the Accounting
Division performed a review of the actual DSM/EE program costs
incurred by DEP during the 12-month period ended December 31,
2019. To accomplish this, the Accounting Division selected and
reviewed samples of source documentation for test year costs
included by the Company for recovery through the DSM/EE Rider.
Review of this sample, which is still underway as of the date of pre-
filing of this testimony, is intended to test whether the actual costs
included by the Company in the DSM and EE billing rates are either

- valid costs of approved DSM and EE programs or administrative costs supporting those programs.
  - My investigation, including the sampling of source documentation, concentrated primarily on costs and incentives related to the January through December 2019 test period, which will begin to be trued up through the DSM and EE EMF billing rates approved in this proceeding. The Public Staff also performed a more general review of the prospective billing rates proposed to be charged for Vintage Year 2021, which are subject to true-up in future proceedings.

#### 10 Q. WHAT ARE YOUR FINDINGS AND CONCLUSIONS?

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With the exception of items specifically described later in this testimony, as well as subject to the outcome of the Public Staff's program cost review described above, I am of the opinion that the Company has calculated its proposed DSM, EE, DSM EMF, and EE EMF billing rates in a manner consistent with N.C. Gen. Stat. § 62-133.9, Commission Rule R8-69, the Initial Mechanism, and the Revised Mechanism, as amended, and other relevant Commission Orders. However, this conclusion is subject to the caveat that the Public Staff is still in the process of reviewing certain data responses recently received from the Company, including documentation of costs selected for review in the Public Staff's sample; once this

1		review is complete, the Public Staff will file with the Commission any			
2		findings not already set forth in testimony.			
3	Q.	WHAT IS THE IMPACT OF THE TESTIMONY OF PUBLIC STAFF			
4		WITNESSES WILLIAMSON AND HINTON ON YOUR			
5		CONCLUSIONS REGARDING THE DSM/EE RIDERS IN THIS			
6		PROCEEDING?			
7	A.	Public Staff witnesses Williamson and Hinton have each filed			
8		testimony and exhibits in this proceeding that recommend certain			
9		changes to the calculations of avoided cost savings for estimated			
10		Vintage 2021 DSM/EE participation. The first change involves the			
11		elimination of a reserve margin that the Company has added to the			
12		avoided capacity benefits for Vintage 2021 EE measures. The			
13		second involves the allocation of avoided capacity benefits between			
14		summer and winter for the Company's Vintage 2021 DSM measures.			
15		These changes affect the PPI recommended by the Public Staff in			
16		this proceeding. Mr. Williamson has calculated the system-level			
17		impacts of these avoided cost savings recommendations and			
18		provided them to me. I have taken his calculations and calculated			
19		their impact on the Vintage 2021 DSM/EE riders. The results of my			
20		calculations are set forth in Maness Exhibit I.			
21		Mr. Williamson has also filed testimony in this proceeding discussing			
22		several other topics related to the Company's filing. None of the			

- 1 matters discussed by Mr. Williamson necessitate an adjustment in 2 this particular proceeding to the Company's billing factor 3 calculations, although some of them may affect the determination of the factors in future proceedings.
- WHAT ARE THE IMPACTS OF THE PUBLIC STAFF'S 5 Q.
- 6 RECOMMENDATIONS ON THE COMPANY'S PROPOSED
- 7 **VINTAGE 2021 DSM AND EE RIDERS?**

- 8 Α. The table below sets forth the Public Staff's recommended Vintage 9 2021 prospective factors, as calculated in Maness Exhibit I, and the 10 Company's proposed factors (excluding the regulatory fee), as set 11 forth in Company witness Listebarger's Exhibit 1:
- 12 (In cents per kWh)

13 14	Billing <u>Factor</u>	Proposed by Company	Recommended by Public Staff
15	Res. DSM factor	0.123	0.123
16	Res. EE factor	0.518	0.517
17	General Service EE factor	0.666	0.666
18	General Service DSM factor	or 0.073	0.072
19	Lighting EE factor	0.095	0.095

- 20 PLEASE SUMMARIZE YOUR CONCLUSIONS REGARDING THE Q.
- 21 COMPANY'S PROPOSED BILLING FACTORS.
- 22 Α. In summary, I have calculated the effects on the Vintage 2021 DSM 23 and EE Riders of the adjustments to avoided cost savings 24 recommended by Public Staff witnesses Williamson and Hinton.

Other than these adjustments, the Public Staff has found no errors or other issues necessitating an adjustment to the Company's proposed billing factors, subject to completion of our program cost sample review.

#### **RECOMMENDATION**

#### Q. WHAT IS YOUR RECOMMENDATION IN THIS PROCEEDING?

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Based the results of the Public Staff's investigation on (subject to completion of its review of 2019 program costs), I recommend that the adjustments I have recommended be incorporated into the DSM/EE billing factors. These factors should be approved subject to any true-ups in future cost recovery proceedings consistent with the 2015 Sub 931 Order, the Revised Mechanism as amended by the 2017 Sub 1145 Order, as well as other relevant orders of the Commission, including the Commission's final order in this proceeding. In making this recommendation, the Public Staff notes that reviewing the calculation of the DSM/EE rider is a process that involves reviewing numerous assumptions, inputs, and calculations, and its recommendation with regard to this proposed rider is not intended to indicate that the Public Staff will not raise questions in future proceedings regarding the same or similar assumptions, inputs, and calculations.

#### Q. DO YOU HAVE ANY OTHER COMMENTS?

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Yes. As explained in Public Staff witness Williamson's testimony, as part of the Company's Residential SmartSaver Program, it operates a referral channel (entitled "FinditDuke" for marketing purposes). This referral channel enables DEP customers and others to locate contractors who may be able to provide certain services. The contractors pay a fee to DEP for performing referrals, and this fee is used to offset some of the program costs of the SmartSaver program. The referable services include those that are associated with measures under the SmartSaver Program, but have been expanded since the referral channel began to include other services, including Plumbing, Solar, and Tree Removal unrelated to DSM/EE. It appears possible that some of the services that could be referred through FinditDuke are services that are not regulated by the Commission. Thus, DEP may be operating a referral service that includes referrals for non-regulated services to be performed by third parties. The Public Staff is not making a recommendation for any adjustment related to the possible non-regulated service-related component of the referral program, but has begun and will continue to examine and review it, and reserves the right to address it in a future proceeding.

#### Q. DOES THIS CONCLUDE YOUR TESTIMONY?

22 A. Yes, it does.

#### SUMMARY OF CERTAIN PORTIONS OF DEP'S DSM/EE MECHANISM

- 1. Eligible non-residential customers may opt out of either or both of the DSM and EE categories of programs, as well as opt back into either or both. Beginning on January 1, 2016, separate DSM and EE billing rates became available to Non-Residential opt-out-eligible customers. A customer receiving program incentives from either a DSM or an EE program will be required to pay the respective portion(s) of the DSM/EE and DSM/EE EMF billing rates for a period of not less than 36 months.
- 2. In general, DEP shall be allowed to recover, through the DSM/EE and DSM/EE EMF rates, all reasonable and prudent costs of Commissionapproved DSM/EE programs. However, any of the Stipulating Parties may propose a procedure for the deferral and amortization over a maximum of ten years of all or a portion of DEP's non-capital program costs to the extent those costs are intended to produce future benefits, and may propose to defer and amortize related non-incremental administrative and general (A&G) costs over a maximum of three years. Deferred program and A&G costs shall be allowed to accrue a return at the overall weighted average net-of-tax rate of return approved in DEP's most recent general rate case (net of income taxes). For program costs not deferred for amortization in future DSM/EE riders, the accrual of a return on any under-recoveries or over-recoveries of cost will follow the requirements of Commission Rule R8-69(b), subparagraphs (3) and (6), unless the Commission determines otherwise.
- 3. DEP shall be allowed to recover NLR as an incentive (with the exception of those amounts related to research and development or the promotion of general awareness and education of EE and DSM activities), but shall be limited for each measurement unit installed in a given vintage year to those dollar amounts resulting from kWh sales reductions experienced during the first 36 months after the installation of the measurement unit. NLR related to pilot programs are subject to additional qualifying criteria.
- 4. The eligibility of kWh sales reductions to generate recoverable NLR during the applicable 36-month period will cease upon the implementation of a Commission-approved alternative recovery mechanism that accounts for NLR, or new rates approved by the Commission in a general rate case or comparable proceeding that account for NLR.
- 5. NLR will be reduced by net found revenues, as defined in the Revised Mechanism, occurring in the same 36-month period. Net found revenues will be determined according to the "Decision Tree" process included in the Revised Mechanism.

- 6. DEP shall be allowed to recover a PPI per vintage year for its DSM and EE portfolio based on a sharing of actually achieved and verified energy and peak demand savings (excluding those related to general programs and measures and research and development activities). The inclusion of pilot programs in any PPI calculation is subject to additional qualifying criteria. Unless the Commission determines otherwise in an annual DSM/EE rider proceeding, the amount of the pre-income-tax PPI to be recovered for the entire allowable DSM/EE portfolio for a vintage year shall be equal to 11.75% multiplied by the present value of the estimated net dollar savings associated with the DSM/EE portfolio installed in that vintage year (as determined by the UCT). Low-income programs or other programs approved with expected UCT results less than 1.00 shall not be included in the portfolio for purposes of the PPI calculation; nor shall the Demand Side Distribution Response (DSDR) program. The PPI for each vintage year shall ultimately be trued up based on net dollar savings as verified by the EM&V process and approved by the Commission. Unless the Commission determines otherwise, the PPI shall be converted into a stream of no more than ten levelized annual payments, incorporating the overall weighted average net-of-tax rate of return approved in DEP's most recent general rate case as the appropriate discount rate.
- 7. For Vintage Years 2019 and afterwards, the program-specific per kilowatt (kW) avoided capacity benefits and per kWh avoided energy benefits used for the initial estimate of the PPI and any PPI true-up will be derived from the underlying resource plan, production cost model, and cost inputs that generated the avoided capacity and avoided energy credits reflected in the most recent Commission-approved Biennial Determination of Avoided Cost Rates as of December 31 of the year immediately preceding the date of the annual DSM/EE rider filing, but using, for program-specific avoided energy benefits, the projected EE portfolio hourly shape rather than an assumed 24x7 100 megawatt (MW) reduction.
- 8. If the Company achieves incremental energy savings of 1% of its prior year's system retail electricity sales in any year during the five-year 2015-2019 period, the Company will receive a bonus incentive of \$400,000 for that year.

#### QUALIFICATIONS AND EXPERIENCE

#### MICHAEL C. MANESS

I am a graduate of the University of North Carolina at Chapel Hill with a Bachelor of Science degree in Business Administration with Accounting. I am a Certified Public Accountant and a member of both the North Carolina Association of Certified Public Accountants and the American Institute of Certified Public Accountants.

As Director of the Accounting Division of the Public Staff, I am responsible for the performance, supervision, and management of the following activities: (1) the examination and analysis of testimony, exhibits, books and records, and other data presented by utilities and other parties under the jurisdiction of the Commission or involved in Commission proceedings; and (2) the preparation and presentation to the Commission of testimony, exhibits, and other documents in those proceedings. I have been employed by the Public Staff since July 12, 1982.

Since joining the Public Staff, I have filed testimony or affidavits in a number of general, fuel, and demand-side management/energy efficiency rate cases of the utilities currently organized as Duke Energy Carolinas, LLC, Duke Energy Progress, LLC., and Virginia Electric and Power Company (Dominion Energy North Carolina) as well as in several water and sewer general rate cases.

I have also filed testimony or affidavits in other proceedings, including applications for certificates of public convenience and necessity for the construction of generating facilities, applications for approval of self-generation deferral rates, applications for approval of cost and incentive recovery mechanisms for electric utility demand-side management and energy efficiency (DSM/EE) efforts, and applications for approval of cost and incentive recovery pursuant to those mechanisms.

I have also been involved in several other matters that have come before this Commission, including the investigation undertaken by the Public Staff into the operations of the Brunswick Nuclear Plant as part of the 1993 Carolina Power & Light Company fuel rate case (Docket No. E-2, Sub 644), the Public Staff's investigation of Duke Power's relationship with its affiliates (Docket No. E-7, Sub 557), and several applications for business combinations involving electric utilities regulated by this Commission. Additionally, I was responsible for performing an examination of Carolina Power & Light Company's accounting for the cost of Harris Unit 1 in conjunction with the prudence audit performed by the Public Staff and its consultants in 1986 and 1987.

I have had supervisory or management responsibility over the Electric Section of the Accounting Division since 1986, and also was assigned

# **APPENDIX B PAGE 3 OF 3**

management duties over the Water Section of the Accounting Division during the 2009-2012 time frame. I was promoted to Director of the Accounting Division in late December 2016.

#### Public Staff Maness Exhibit I Schedule 1

(Listebarger Exhibit 1)

#### Duke Energy Progress, LLC Docket No. E-2, Sub 1252 Summary of 2021 DSM/EE Rates

	Source:	cents/kWh Rate	Pog Foo	Pilling Pato
Residential Rate	Source:	Kate	Reg Fee	Billing Rate
EMF Rate - DSM	Listebarger Exhibit 2, page 5	-0.003	0.000	-0.003
EMF Rate - EE	Listebarger Exhibit 2, page 4	0.016	0.000	0.016
Projected Rate - DSM	Listebarger Exhibit 2, page 2	0.123	0.000	0.123
Projected Rate - EE	Listebarger Exhibit 2, page 1	0.517	0.001	0.518
Total Residential Rate		0.653		0.654
General Service				
EE EMF Rate	Listebarger Exhibit 2, page 4	0.034	0.000	0.034
EE Projected Rate	Listebarger Exhibit 2, page 1	0.666	0.001	0.667
Total General Service EE Rate		0.700		0.701
DSM EMF Rate	Listebarger Exhibit 2, page 5	-0.010	0.000	-0.010
DSM Projected Rate	Listebarger Exhibit 2, page 2	0.072	0.000	0.072
John Frojected Hate		0.072	0.000	
Total General Service DSM Rate		0.062		0.062
Lighting EE Rate				
Lighting EE EMF Rate	Listebarger Exhibit 2, page 4	-0.007	0.000	-0.007
Lighting EE Projected Rate	Listebarger Exhibit 2, page 1	0.095	0.000	0.095
Total Lighting EE Rate		0.088		0.088

(Listebarger Exhibit 2 page 1 of 7)

#### DUKE ENERGY PROGRESS, LLC Docket No. E-2, Sub 1252 Energy Efficiency Rate Derivation

		Data Olasa	EE Revenue Requirements														
NC Rate Class	Adjusted NC Rate Class kWh Sales (1)	Rate Class Energy Allocation Factor <sup>(2)</sup>		Residential Programs <sup>(3)</sup>		G Programs (4)	DSDR <sup>(5)</sup>	Non-DSDR Allocated A&G and Carrying Costs <sup>(6)</sup>		DSDR Allocated A&G and Carrying Costs <sup>(7)</sup>		Total of Allocated Costs		Total EE Rate			
	(1)	(2)		(3)		(4)	(5)		(6)		(7)	(8	3) = Σ (3 thru 7)	(9) = (8) / (1)			
Residential	15,893,328,062	62.61%	\$	59,915,968	\$	-	\$ 3,238,927	\$	7,098,396	\$	11,920,257	\$	82,173,547	0.517			
General Service	9,132,663,985	35.98%	\$	-	\$	46,966,749	\$ 1,861,160	\$	5,107,920	\$	6,849,648	\$	60,785,477	0.666			
Lighting	356,925,937	1.41%	\$	-	\$	-	\$ 72,739	\$	-	\$	267,700	\$	340,439	0.095			
NC Retail	25,382,917,984	100%	\$	59,915,968	\$	46,966,749	\$ 5,172,826	\$	12,206,316	\$	19,037,605	\$	143,299,463				

#### NOTES:

- (1) Rate Class Sales, excluding "Opt-Out" sales, are derived in Listebarger Exhibit 6.
- (2) Rate Class Energy Allocation Factor is derived in Listebarger Exhibit 5, page 5, column (4).
- (3) Residential Program costs are allocated solely to the Residential Class in compliance with Commission's Order in Docket No. E-2, Sub 931, dated 1/20/15.
- (4) Non-Residential Program costs are allocated solely to the General Service Class in compliance with Commission's Order in Docket No. E-2, Sub 931, dated 1/20/15.
- (5) DSDR Costs allocated using the Rate Class Energy Allocation Factor from column (2) in compliance with Commission's Order in Docket No. E-2, Sub 931, dated 1/20/15.
- (6) Non-DSDR A&G and Carrying Costs are allocated on the basis of Non-DSDR revenue requirements (excluding incentives and net lost revenues).
- (7) DSDR A&G Costs and Carrying Costs are allocated using the Rate Class Energy Allocation Factor from column (2).

Please note: Exhibit may not foot due to rounding.

#### Public Staff Maness Exhibit I Schedule 3

(Listebarger Exhibit 2 Page 2 of 7)

# DUKE ENERGY PROGRESS, LLC Docket No. E-2, Sub 1252 Demand-Side Management Rate Derivation

**DSM Revenue Requirements** Rate Class Adjusted NC Demand EnergyWise Allocated Total of Rate Class kWh Allocation CIG DR Program Allocated Carrying Total DSM Allocated Sales (1) Factor<sup>(2)</sup> Costs<sup>(3)</sup> Program (4) A&G Costs<sup>(5)</sup> Costs<sup>(5)</sup> NC Rate Class Costs Rate (8) = (7) / (1) $(7) = \Sigma (3 \text{ thru } 6)$ Residential 15,893,328,062 68.32% \$ 15,998,691 766,168 \$ 2,816,861 0.123 \$ 19,581,720 General Service 9,064,020,676 4,928,496 337,024 \$ 1,239,089 0.072 31.68% \$ 6,504,609 Lighting 356,188,368 0.00% NC Retail 25,313,537,106 100.00% \$ 15,998,691 \$ 4,928,496 \$ 1,103,192 \$ 4,055,950 \$ 26,086,329

#### **NOTES:**

- (1) Rate Class Sales, excluding "Opt-Out" sales, are derived in Listebarger Exhibit 6.
- (2) Rate Class Demand Allocation Factor is derived in Listebarger Exhibit 5, page 6, column (5).
- (3) EnergyWise costs are directly assigned solely to the Residential Rate Class in compliance with Commission's Order in Docket No. E-2, Sub 931, dated 1/20/15.
- (4) CIG DR Program costs are directly assigned solely to the General Service Class in compliance with Commission's Order in Docket No. E-2, Sub 931, dated 1/20/15.
- (5) A&G and Carrying Costs are allocated on the basis of revenue requirements (excluding incentives and net lost revenues).

Please note: Exhibit may not foot due to rounding.

Public Staff Maness Exhibit I Schedule 4

(Listebarger Exhibit 2 page 3 of 7)

#### DUKE ENERGY PROGRESS, LLC Docket No. E-2, Sub 1252 Rate Period Revenue Requirement Summary - NC Level January 2021 - December 2021

		Г	NORTH CAROLINA JURISDICTIONALLY ALLOCATED RETAIL COSTS ONLY																					
											Income Taxes	DSDR			Income Taxes	Rev Reqmt		Program	Rev Reqmt					
			0&M	Insurance	A&G Expense		Amortization of Capitalized O&M			DSDR Capital Costs	on DSDR Capital Costs	Property	DSDR Depreciation	Carrying Costs Net of Taxes	on Carrying Cost	Before PPI & NLR	Net Lost Revenue	Performance	With PPI & NLR					
			(1)	(2)	(3)	(4)	(5)	(6)	Amortization	(10)	(11)	Taxes (12)	(13)	(14)	(15)	(16)	Recoupment (17)	Incentive (18)	(19)					
			(1)	(2)	(5)	ΣCols(1)thru(3)	((1)+(2))/10 or 5 or 3	(3)/3		(10)	(11)	(12)	(13)	(14)	(13)	ΣCols(5)thru(15)	(17)	(10)	ΣCols(16)thru(18)					
	NC DSM Program Expenses					2000(1)0110(0)	((1)-(2))-10 al 0 al 0	(0)/0								2000(0)010(10)			2000 (10) and 10)					
1	CIG DR	Per Forecast	1,423,410			1,423,410	474,470	-	1,836,870							2,311,340		408,658	2,719,997					
2		Per Forecast	14,453,107			14,453,107	1,445,311	-	9,580,946							11,026,257		4,972,434	15,998,691					
3		Per Forecast	2,982,311			2,982,311	994,104	-	1,544,816							2,538,920	6,275	(336,697)	2,208,499					
4	Total DSM	Σ Lines 1 thru 2	18,858,828	-	-	18,858,828	2,913,885	-	12,962,632	-	-		-		-	15,876,517	6,275	5,044,395	20,927,187					
5	DSM Assigned A&G and CCost	Per Forecast			1,055,454	1,055,454		351,819	751,373					3,327,473	728,477	5,159,142			5,159,142					
6	Total DSM and Assigned Costs	Σ Lines 4 thru 5	18,858,828		1,055,454	19,914,282	2,913,885	351,819	13,714,005					3,327,473	728,477	21,035,659	6,275	5,044,395	26,086,329					
	NC EE Program Expenses												`											
7	Res Home Advantage	Per Forecast				-	-	-	105,384							105,384	-	60,967	166,350					
8	Residential Smart \$aver/Home		4,143,460			4,143,460	414,346	-	4,271,913							4,686,259	603,598	114,795	5,404,651					
9	Neighborhood Energy Saver	Per Forecast	1,770,453			1,770,453	177,045	-	1,392,494							1,569,539	359,746	-	1,929,286					
10		Per Forecast	-			-	-	-	3,909							3,909		-	3,909					
11		Per Forecast (allocated)	2,938,329			2,938,329	587,666	-	6,006,243							6,593,909	1,453,132	3,359,222	11,406,264					
12		Per Forecast						-	432,846							432,846		70,614	503,460					
13		Per Forecast	6,003,298			6,003,298	6,003,298	-								6,003,298	9,430,353	331,953	15,765,604					
14		Per Forecast	12,989,999			12,989,999	1,299,000	-	6,448,745							7,747,745	2,069,918	768,083	10,585,747					
15	·	Per Forecast	2,287,511			2,287,511	457,502	-	1,616,106							2,073,608	1,678,042	597,795	4,349,445					
16 17			854,696 1,328,200			854,696 1,328,200	170,939 265,640	-	522,723 634,149							693,662 899,789	384,242 3,149,524	1,399,422	1,077,904 5,448,735					
18			3,205,530			3,205,530	641,106	-	1,259,366							1,900,472	1,015,044	359,097	3,274,614					
18		s Per Forecast Per Forecast	3,205,530			3,205,530	641,106	-	1,259,366							1,900,472	1,015,044	359,097	3,274,614					
20			20													-			-					
21		Σ Lines 7 thru 19	35,521,476			35,521,476	10,016,542		22,693,877							32,710,419	20,143,599	7,061,950	59,915,968					
	Subtotal Residential	2 Lines 7 tino 15	33,322,470			33,321,470	10,010,542		22,033,077							32,710,413	20,243,333	7,001,550	33,313,300					
22	CIG Energy Efficiency	Per Forecast	0						2,551,507							2,551,507			2,551,507					
23		Per Forecast (allocated)	356,052			356,052	71,210	-	727,869							799,079	568,717	1,193,926	2,561,722					
24	Energy Efficiency for Business	Per Forecast	- 1																					
25	Smart Saver Prescriptive	Per Forecast	9,966,090			9,966,090	3,322,031		5,157,345							8,479,376	7,581,108	5,219,039	21,279,523					
26	Smart Saver Custom	Per Forecast	3,364,818			3,364,818	1,121,606		1,808,562							2,930,168	1,824,631	703,996	5,458,795					
27	Smart Saver Performance Incer	nt Per Forecast	520,703			520,703	173,568		332,913							506,481	436,323	154,838	1,097,642					
28	Small Business Energy Saver	Per Forecast	6,348,703			6,348,703	2,116,234	-	6,155,175							8,271,409	4,230,228	1,538,019	14,039,656					
29	Business Energy Report	Per Forecast				-	-	-	-							-			-					
30	Lost Revenue Decrement Pend	ing Rate Case Implementation	on																-					
31	General Service Found Revenue	Per Forecast															(22,096)		(22,096)					
	Subtotal-General Service	Σ Lines 22 thru 31	20,556,366	-		20,556,366	6,804,649	-	16,733,371	-	-	-	-	-	-	23,538,020	14,618,911	8,809,818	46,966,749					
	Total of SE Boronous		55 077 043			55 077 042	45 024 404		20 427 240							55 240 420	24 752 540	45 074 750	405 003 747					
	Total of EE Programs	Σ Lines 21 + 31	56,077,842		3.490.994	56,077,842 3,490,994	16,821,191	1.163.664	39,427,248 2.369.624					7.115.292	1.557.736	56,248,439 12,206,316	34,762,510	15,871,768	106,882,717 12.206.316					
33		Per Forecast	56,077,842		-,,	59,568,836	16,821,191	, ,	41,796,872					, , , ,	1,557,736	, ,	34,762,510	45 074 750	119,089,032					
34	Total EE and Assigned Costs	Lines 32 + 33	56,077,842		3,490,994	59,508,836	16,821,191	1,163,664	41,/90,8/2					7,115,292	1,557,736	68,454,755	34,/62,510	15,871,768	119,089,032					
	NC DSDR Program Expenses																							
35	- '	Per Forecast	3,875,976	919,725		4,795,701	479,570		4,693,256							5,172,826		_	5,172,826					
36		Per Forecast	3,3,3,370	323,123		-,,,,,,,,,,,	4,5,570	-	-,055,250	8,930,311	1,973,096	726,281	5.936.923	1,206,793	264,201	19,037,605			19,037,605					
37		Per DSDR Summary analysis								.,,.		., .=		,,		-			-					
	Total DSDR and Assigned Costs	Σ Lines 35 thru 36	3,875,976	919,725	-	4,795,701	479,570	-	4,693,256	8,930,311	1,973,096	726,281	5,936,923	1,206,793	264,201	24,210,431		-	24,210,431					
	=	_																						
39	Rate Period Totals	Lines 6 + 34 + 38	78,812,646	919,725	4,546,448	84,278,820	20,214,646	1,515,483	60,204,133	8,930,311	1,973,096	726,281	5,936,923	11,649,558	2,550,414	113,700,845	34,768,785	20,916,162	169,385,792					

<sup>\*</sup>All Non-Residential programs are amortized over a 3 year period. The Residential Lighting Program, Multi-Family EE, EE Education, Save Energy and Water Kit and Residential Energy Assessments are recoverable over a 5 year period. My Home Energy Report is recoverable over a 1 year period. All other Residential EE programs are recoverable over 10 years.

#### Public Staff Maness Exhibit I

## Duke Energy Progress Evans Exhibit 1 Vintage 2021 Estimate - January 1, 2021 to December 31, 2021 Docket No. E-2, Sub 1252 Load Impacts and Estimated Revenue Requirements by Program

В c G =(A-B)\*C = (B+D) =K (from page 2) System NPV of Avoided System kW NC Residential Shared Unadjusted Rev Costs Per Public Staff **Total Cost** Incentive Reduction - Summer System Energy NC Retail kWh Sales NC Allocation NC Residential Unadjusted Adjusted Revenue Savings % Requirement (2) **Residential Programs** Witness Williamson Peak Reduction (kWh) Allocation Factor Factor (2) Revenue Requirement<sup>(3)</sup> Requirement **EE Programs** 1 Appliances and Devices 2 Appliance Recycling Program 2.204 25,669,938 12.509.761 1.649.616 11.75% 1,276,067 2,925,683 85 7544161% F1 \* F1 2.508.902 774 756 E2 \* F2 E3 \* F3 11.75% 85.7544161% 70,614 519 4.347.246 1.318.300 1.058.606 1.058.606 907.801 3 Energy Education Program for Schools 0.00% 85.7544161% Energy Efficient Lighting 1,653 1,216 10,029,458 4,598,197 5,920,004 2,695,507 3,650,338 5,132,745 11.75% 11.75% 266,686 (286,376) 3,917,024 4,846,370 85.7544161% 85.7544161% 3,359,021 4,155,976 3,359,222 Residential Smart \$aver 114,795 E6 \* F6 6 Multi-Family 1.908 15.024.097 6.797.537 2.841.814 11.75% 464,797 3.306.612 85.7544161% 2.835.566 597,795 7 Neighborhood Energy Saver 8 Residential Energy Assessments 721 1,817 3,572,708 15,202,956 1,767,108 2,234,972 0.00% 11.75% 2,234,972 85.7544161% 85.7544161% E7 \* F7 E8 \* F8 1,916,587 3.946.778 404.502 4.351.280 3.731.414 359,097 7.389.347 11.75% 11.75% 11.75% E9 \* F9 E10 \* F10 9 Residential New Construction 5,124 17,703,423 18,999,062 16,137,702 336,210 16,473,912 85.7544161% 14,127,107 768,083 85.7544161% 85.7544161% Save Energy and Water Kit 11 Residential Home Advantage E11 \* F11 60.967 12 Total for Residential Conservation Program 15,161 96 148 023 57,396,628 36,652,570 2 461 887 39,114,457 33 542 374 85.7544161% F12 \* F12 13 My Home Energy Report (1) 10.742.804 7 448 359 11.75% 7.835.457 331.953 14 Total Residential Conservation and Behavioral Programs 258,631,119 68,139,432 44,100,929 2,848,984 46,949,913 40,261,624 7,061,950 NC Residential Peak Demand Allocation Factor 86.3393647% 15 EnergyWise \* Home 68,217 13,517,088 11.75% 7,842,874 48.01% (E13+E23) \*F13 \*G13 5,732,283 7,087,384 755,490 4,972,434 258,631,119 16 Total Residential 140,160 81,656,520 51,188,313 3,604,474 54,792,788 45.993.907 12,034,384 System kW NC Non-Residential Unadjusted Rev System NPV of Avoided luction - Summer System Energy NC Retail kWh Sales NC Residential Unadjusted Adjusted Revenue Total Cost Incentive Costs Savings % Requirement (2) Peak Reduction (kWh) Allocation Factor Revenue Requirement<sup>(3)</sup> Requirement Non-Residential Programs EE Programs 1,607,865 136,950 85.7544161% E15 \* F15 1,193,926 17 Energy Efficient Lighting 685 2,641,574 442,330 11.75% 579,280 496,758 18 Non-Residential Smart Saver Performance (Custom)
19 Non-Residential Smart Saver Performance (Prescriptive)
20 Non-Residential Smart Saver Performance Incentive 2,852 12,836 457 20,451,120 75,650,527 4,007,622 9.728.133 4,175,909 12,372,044 646,501 11.75% 11.75% 11.75% 652,386 3,002,296 120,586 4,828,295 15,374,340 767,086 85.7544161% E16 \* F16 E17 \* F17 E18 \* F18 4.140.476 703.996 37,923,497 1,672,761 85 7544161% 13,184,175 657,810 5,219,039 154,838 85.7544161% 21 Small Business Energy Saver 22 Total for Non-Residential Conservation Programs 6.702 36 563 955 14 494 482 7 883 877 11.75% 776.746 8,660,623 85.7544161% F19 \* F19 7 426 867 1.538.019 139,314,798 NC Non-Residential Peak Demand Allocation Factor 23 EnergyWise \* for Business 9.292 54,635 337 027 3 655 911 11.75% (389 969) 3 265 942 3 386 679 (336 697) 24 Commercial Industrial Governmental Demand Response 11.75% 3,153 3,700,583 2,590,719 130,409 2,721,128 2,821,724 408,658 25 Total for Non-Residential DSM Programs 12,445 54.635 4.037.609 6.246.630 (259,560) 5.987.071 86.3393647% 51.99% (E13+E23) \*F23 \*G23 6.208.403 71.961 31,767,291 8,881,779 26 Total Non Residential 35,978 139,369,433 69,464,348 4,429,404 36,196,695 32,114,489 27 Total All Programs 398,000,553 82,955,604 8,033,878 90,989,483 20,916,162 NC Retail kWh System kW Sales System NPV of Avoided Shared Unadjusted Rev Total Cost Incentive Reduction - Summer System Energy NC Retail kWh Sales Allocation NC DSDR Unadjusted NC DSDR Adjusted Costs Savings % Requirement <sup>III</sup> Peak Reduction (kWh) Allocation Factor Factor Revenue Requirement<sup>10</sup> Revenue Requirement DSDR 1 DSDR 296,976 48,111,106 15,383,940 \$ 15,383,940 106,373,422 473 113 446.111.659 98.339.544 8,033,878 78.108.396 20,916,162 Total All Programs with DSDR 151.120.868

<sup>(1)</sup> My Home Energy Report impacts reflect cumulative capability as of end of vintage year (2) Total System DSM programs allocated to Residential and Non-Residential based on contribution to retail system peak (3) Excluding DSD, EPP's EE/DSM portfolio estimates a Winter Peak reduction of 89,984 kW systemwide in 2021.

### Duke Energy Progress Evans Exhibit 1 Vintage 2021 Estimate - January 1, 2021 to December 31, 2021 Docket No. E-2, Sub 1252 Load Impacts and Estimated Revenue Requirements by Program Public Staff Maness Exhibit I Schedule 6

	A	В	C =A*B	D =A+C	E	F	G =-PMT(E,F,D)	H =1-B	1	ı													K =J+l
Residential Programs	NC Incentive	Income Tax Rate	Income Taxes	Net-of-Tax PPI - Total NPV	Discount Rate	PPI Amortizati on Period	Vintage Year 2021 - Year 1 PPI	Income Tax Gross-Up Factor	Adjusted PPI	Σ Prior Period PPI	Vintage 2009 PPI	Vintage 2010 PPI	Vintage 2011 PPI	Vintage 2012 PPI	Vintage 2013 PPI	Vintage 2014 PPI	Vintage 2015 PPI	Vintage 2016 PPI	Vintage 2017 PPI	Vintage 2018 PPI	Vintage 2019 PPI	Vintage 2020 PPI	PPI Values for Test Period
EE Programs  1 Appliances and Devices  2 Appliance Recycling Program  3 Energy Education Program for School:  4 Energy Efficient Lighting  5 Residential Service – Smant Saver  7 Neighborhood Energy Saver  8 Residential Ferry Assessments  9 Residential Ferry Assessments  10 Save Energy and Water Rit  11 Residential Home Advantage  12 Total for Residential Conservation Programs  12 Total for Residential Conservation Programs	\$ 228,695 \$ (245,580) \$ 398,584 \$ - \$ 346,878 \$ 288,315 \$ -	23.17% 23.17% 23.17% 23.17% 23.17% 23.17% 23.17% 23.17% 23.17% 23.17% 23.17%	\$ (253,538) \$ - \$ (52,987) \$ 56,899 \$ (92,349) \$ - \$ (80,369) \$ (66,801) \$ - \$ - \$ (489,145)	\$ 840,746 \$ - \$ 175,708 \$ (188,681) \$ 306,235 \$ - \$ 266,509 \$ 221,514 \$ - \$ - \$ 1,622,032	6.64% 6.64% 6.64% 6.64% 6.64% 6.64% 6.64% 6.64% 6.64% 6.64%	5 10 N/A 5 10 5 N/A 5 10 5	\$ 203,086 \$ - \$ - \$ 42,443 \$ (26,421) \$ 73,973 \$ - \$ 64,377 \$ 31,018 \$ - \$ - \$ 388,476	76.83% 76.83% 76.83% 76.83% 76.83% 76.83% 76.83% 76.83% 76.83% 76.83%	\$ 264,330 \$ - \$ 5,242 \$ (34,388) \$ 96,280 \$ - \$ 83,790 \$ 40,372 \$ - \$ - \$ 505,626	\$ 510,427 \$ 70,614 \$ - \$ 3,303,980 \$ 149,183 \$ 501,515 \$ - \$ 275,307 \$ 727,711 \$ 624,666 \$ 60,967 6,224,371	\$	\$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	\$ - \$ - \$ - \$ - \$ - \$ - \$ - \$ - \$ - \$ -	\$ 38,647 \$ - \$ 621,854 \$ 108,864 \$ - \$ - \$ - \$ - \$ 5 \$ 60,450 829,814	\$ 17,038 \$ - \$ 636,857 \$ - \$ - \$ - \$ - \$ 47,653 \$ - \$ 517 702,066	\$ 7,505 \$ - \$ 397,825 \$ 14,647 \$ - \$ - \$ 5 \$ - \$ 54,738 \$ - \$ - \$ 54,738	\$ 4,492 \$ - \$ 332,048 \$ 24,334 \$ - \$ - \$ 72,258 \$ - \$ - \$ -	\$ 3,011 \$ - \$ 13,823 \$ - \$ 139,487 \$ - \$ 156,321	\$ (79) \$ 473,444 \$ (9,166) \$ 186,211 \$ - \$ 88,834 \$ 138,767 \$ 396,792 \$ - 1,274,803	\$ - \$ - \$ 408,930 \$ (12,442) \$ 115,436 \$ - \$ 85,429 \$ 134,808 \$ 227,873 \$ - 960,035	\$ 210,763 \$ - \$ - \$ 366,366 \$ (14,011) \$ 96,624 \$ - \$ 54,208 \$ 60,340 \$ - \$ - \$ 774,290	\$ 299,664 \$ - \$ 66,656 \$ 23,134 \$ 103,244 \$ - \$ 46,836 \$ 79,661 \$ - \$ - \$ -	\$ 774,756 \$ 70,614 \$ 5,3359,222 \$ 114,795 \$ 597,795 \$ 5 \$ 768,083 \$ 624,666 \$ 60,967 6,729,997
13 My Home Energy Report 14 Total Residential Conservation and Be	\$ 331,953	23.17%	\$ (76,911) (566,056)	\$ 255,042 1,877,074	6.64%	1	\$ 255,042 643,518	76.83%	\$ 331,953 837,579	\$ - 6,224,371	\$ -	\$ -	\$ -	\$ - 829,814	\$ - 702,066	\$ - 474,715	\$ -	\$ - 156,321	\$ - 1,274,803	\$ - 960,035	\$ - 774,290	\$ - 619,196	\$ 331,953 7,061,950
15 EnergyWise * Home 16 Total Residential	\$ 652,285 3,095,415	23.17%	\$ (151,130) (717,186)	\$ 501,156 2,378,229	6.64%	10	\$ 70,176 713,694	76.83%	\$ 91,338 928,917	\$ 4,881,096 11,105,466	\$ -	\$ -	\$ - -	\$ 347,959 1,177,773	\$ 301,384 1,003,450	\$ 369,522 844,237	\$ 265,373 698,504	\$ 911,314 1,067,635	\$ 796,851 2,071,654	\$ 717,405 1,677,440	\$ 676,304 1,450,594	\$ 494,983 1,114,179	\$ 4,972,434 12,034,384
	NC Incentive	Income Tax Rate	Income Taxes	Net-of-Tax PPI - Total NPV	Discount Rate	PPI Amortizati on Period	Vintage Year 2021 - Year 1 PPI	Income Tax Gross-Up Factor	Adjusted PPI	Σ Prior Period PPI	Vintage 2009 PPI	Vintage 2010 PPI	Vintage 2011 PPI	Vintage 2012 PPI	Vintage 2013 PPI	Vintage 2014 PPI	Vintage 2015 PPI	Vintage 2016 PPI	Vintage 2017 PPI	Vintage 2018 PPI	Vintage 2019 PPI	Vintage 2020 PPI	PPI Values for Test Period
Non-Residential Programs EE Programs 17 Energy Efficient Lighting 18 Non-Residential Smart Saver Custom 19 Non-Residential Smart Saver Prescrip 20 Non-Res SmartSaver Performance 21 Small Business Energy Saver 22 Total for Non-Residential Conservatio	\$ 103,408 \$ 666,094	23.17% 23.17% 23.17% 23.17% 23.17%	\$ (27,210) \$ (129,621) \$ (596,517) \$ (23,959) \$ (154,329) (931,636)	\$ 90,231 \$ 429,829 \$ 1,978,084 \$ 79,449 \$ 511,765 3,089,358	6.64% 6.64% 6.64% 6.64%	5 3 3 3	\$ 21,796 \$ 162,716 \$ 748,822 \$ 30,076 \$ 193,733 1,157,142	76.83% 76.83% 76.83% 76.83% 76.83%	\$ 28,368 \$ 211,785 \$ 974,638 \$ 39,146 \$ 252,156 1,506,093	\$ 1,165,557 \$ 492,211 \$ 4,244,401 \$ 115,692 \$ 1,285,863 7,303,724	\$ - \$ - \$ - \$ - \$ -	\$ - \$ - \$ - \$ - \$ -	\$ - \$ - \$ - \$ - \$ -	\$ 153,107 \$ - \$ 722,666 \$ - \$ - 875,773	\$ 171,971 \$ - \$ 678,479 \$ - \$ 80,709 931,159	\$ 116,186 \$ - \$ 438,885 \$ - \$ 217,323 772,394	\$ 152,430 \$ - \$ 369,180 \$ - \$ 241,051 762,661	\$ - \$ - \$ - \$ - \$ -	\$ 191,685 \$ - \$ - \$ - \$ - \$ 191,685	\$ 172,317 \$ - \$ - \$ - \$ - \$ 172,317	\$ 167,569 \$ 262,127 \$ 1,021,143 \$ 12,918 \$ 333,775 1,797,532	\$ 40,292 \$ 230,084 \$ 1,014,048 \$ 102,774 \$ 413,007 1,800,204	\$ 1,193,926 \$ 703,996 \$ 5,219,039 \$ 154,838 \$ 1,538,019 8,809,818
23 EnergyWise * for Business 24 Commercial, Industrial, & Governmen 25 Total for Non-Residential DSM Progra		23.17% 23.17%	\$ 78,010 \$ (26,087) 51,923	\$ (258,686) \$ 86,507 (172,179)	6.64% 6.64%	1 3	\$ (258,686) \$ 32,748 (225,938)	76.83% 76.83%	\$ (336,697) \$ 42,624 (294,073)	\$ - \$ 366,034 366,034	\$ - \$ -	\$ - \$ -	\$ - \$ -	\$ - \$ 28,315 28,315	\$ - \$ 9,714 9,714	\$ - \$ 25,139 25,139	\$ - \$ 4,414 4,414	\$ - \$ -	\$ - \$ -	\$ - \$ -	\$ - \$ 99,592 99,592	\$ - \$ 198,860 198,860	\$ (336,697) \$ 408,658 71,961
26 Total Non Residential	3,796,891		(879,713)	2,917,178			931,204		1,212,020	7,669,758				904,088	940,873	797,533	767,075	==	191,685	172,317	1,897,123	1,999,064	8,881,779
27 Total All Programs	6,892,306		(1,596,899)	5,295,407			1,644,897		2,140,938	18,775,225				2,081,861	1,944,323	1,641,770	1,465,580	1,067,635	2,263,339	1,849,757	3,347,718	3,113,243	20,916,162