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BEFORE  
THE PUBLIC UTILITIES COMMISSION OF OHIO

In the Matter of the Application of Columbus )  
Southern Power Company and Ohio Power ) Case No. 11-346-EL-SSO  
Company for Authority to Establish A Standard ) Case No. 11-348-EL-SSO  
Service Offer Pursuant to Section 4928.143, )  
Revised Code, in the Form of an Electric )  
Security Plan )

In the Matter of the Application of Columbus )  
Southern Power Company and Ohio Power ) Case No. 11-349-EL-AAM  
Company for Approval of Certain Accounting ) Case No. 11-350-EL-AAM  
Authority )

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DIRECT TESTIMONY OF  
DYLAN SULLIVAN  
ON BEHALF OF THE  
NATURAL RESOURCES DEFENSE COUNCIL AND THE SIERRA CLUB

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1   **Q.     Please state your name, address, and position.**

2   A.     My name is Dylan Sullivan. My business address is 2 North Riverside Plaza, Suite 2250,  
3           Chicago, Illinois 60606. I am employed by the Natural Resources Defense Council  
4           ("NRDC") as an Energy Advocate.

5   **Q:     On whose behalf are you testifying in this proceeding?**

6   A:     I am testifying on behalf of the Natural Resources Defense Council and the Sierra Club,  
7           Ohio Chapter.

8   **Q.     Please describe your educational background and professional experience.**

9   A.     I earned a Bachelor of Arts degree, magna cum laude, in Environmental Geology from  
10          the University of Missouri-Columbia in 2004. I was awarded a Master of Science in Civil  
11          and Environmental Engineering from Stanford University in June 2008. My Master's  
12          degree was energy focused: I graduated from the Civil and Environmental Engineering  
13          Department's Atmosphere/Energy program and took classes on economic analysis of  
14          natural resources and climate policy, air quality analysis, and energy efficiency and  
15          renewable energy technologies and policies. I joined NRDC in June 2008. At NRDC, I  
16          work throughout the Midwest to promote energy efficiency policies that lower customer  
17          utility bills and cut pollution, including ensuring that electric utilities' energy efficiency  
18          portfolios are cost effective and address major end-uses of electricity and all customer  
19          classes. I also advocate for changes in regulations that guide the utility business model to  
20          ensure that the interests of utilities and their customers are aligned in the promotion of  
21          energy efficiency and renewable energy. I represent NRDC on the groups assisting Duke  
22          Energy-Ohio, American Electric Power-Ohio, and FirstEnergy's Ohio operating

companies in meeting the state's efficiency portfolio standard. I am currently writing NRDC's decoupling fact sheet and have conducted staff trainings on decoupling.

**Q. Have you previously testified before the Public Utilities Commission of Ohio ("PUCO" or "Commission")?**

A. Yes. I have testified before the Public Utilities Commission of Ohio on: (i) the design, implementation, and administration of energy efficiency programs, (ii) policies that remove utilities' current disincentive to support energy efficiency, and (iii) policies that reward a utility for performing well in saving customers money through energy efficiency programs.<sup>1</sup> I have also recently testified before the Indiana Utility Regulatory Commission<sup>2</sup> and the Illinois Commerce Commission.<sup>3</sup>

**Q: What documents did you review to prepare your testimony?**

A: I reviewed the Company's testimony in this case, the Company's responses to the discovery of NRDC and the Sierra Club, some of the Company's discovery responses to other parties, and the rider language for the Energy Efficiency/Peak Demand Reduction ("EE/PDR") Rider and the Green Power Portfolio Rider.

**Q: Please summarize your testimony.**

A: Below, I (i) describe the Company's performance in implementing energy efficiency programs since 2009 and review the Company's proposal to continue the EE/PDR Rider, (ii) review the Company's proposed Green Power Portfolio Rider, and (iii) review the Company's proposed Plug-In Electric Vehicle ("PEV") Tariff.

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<sup>1</sup> Public Utilities Commission of Ohio Case No. 08-935-EL-SSO, Case No. 09-1947-EL-EEC, et al., and Case No. 10-388-EL-SSO.

<sup>2</sup> Indiana Utility Regulatory Commission Cause No. 43839.

<sup>3</sup> Illinois Commerce Commission Case No. 10-0527.

43 **Q: Does the Company request that the Commission continue its Energy Efficiency/Peak**  
44 **Demand Reduction (“EE/PDR”) Rider in this case?**

45 A: Yes. The Company requests that the Commission retain the EE/PDR Rider in this case,<sup>4</sup>  
46 and that the “EE/PDR Rider continue to be set through a separate filings as is done  
47 currently and be updated annually each year as ordered by the Commission.”<sup>5</sup>

48 **Q: Characterize the Company’s performance to-date in implementing energy efficiency**  
49 **programs.**

50 A: The Company has, since approval of the prior Electric Security Plan, done an exemplary  
51 job of implementing energy efficiency programs. The Company has exceeded the energy  
52 saving targets provided in O.R.C. Section 4928.66 each year since 2009, at a lower price  
53 than anticipated in its plan. In regular collaborative meetings, the Company has kept  
54 stakeholders informed of its progress in implementing energy efficiency programs, timely  
55 notified stakeholders of changes in program tactics, and listened to our feedback. I  
56 estimate that the energy efficiency programs implemented by the Company in 2009 and  
57 2010 will save customers more than \$137 million over the implemented measures’  
58 lifetimes, taking into account the costs of delivering the programs and excluding results  
59 from the Company’s self direct and demand response programs.<sup>6</sup>

60 **Q: In your opinion, should the Commission approve the Company’s request to**  
61 **continue the EE/PDR Rider in this case?**

62 A: Yes. The Company has proven that it can implement programs well and responsibly  
63 manage the money that customers pay for energy efficiency programs. Continuing the  
64 EE/PDR rider in this case, subject to the same update process currently in place, would

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<sup>4</sup> Sloneker at 5 Lines 17-19.

<sup>5</sup> Moore at 10 Lines 16-18.

<sup>6</sup> See Exhibit DES-2.

65 assure the Company that it can recover its prudent costs of implementing energy  
66 efficiency programs. Over NRDC's 30-year history of monitoring utility energy  
67 efficiency efforts, assured and timely cost recovery has proven to be a necessary  
68 component of sustained utility investment in cost effective energy efficiency. Others  
69 recognize the importance of assured and timely recovery of prudently incurred program  
70 costs. For example, the National Action Plan for Energy Efficiency Vision for 2025,  
71 developed by a Leadership Group of more than 60 regulators, utilities, advocates, and  
72 customer representatives, recommended that regulators "promote sufficient, timely, and  
73 stable program funding to deliver energy efficiency where cost effective."<sup>7</sup> Approving  
74 AEP's proposal would do exactly that.

75 **Q: Is the Company proposing a Green Power Portfolio Rider ("GPPR") in this case?**

76 A: Yes. The Company's GPPR, available to customers under the Company's metered rate  
77 schedules, allows customers to opt-in to paying an extra "Green Energy Charge" per-  
78 kWh, varying by the amount of renewable energy resources they wish to pay for.  
79 Customers who opt-in to the GPPR are exempt from paying the Alternative Energy Rider  
80 ("AER"), which collects the incremental (renewable energy certificate) costs of the  
81 Company's investments in renewable energy required by Ohio law.<sup>8</sup> Company witness  
82 Roush states that the GPPR "gives customers the option to purchase 25%, 50%, 75%, or  
83 100% of their energy usage from renewable resources."<sup>9</sup>

84 **Q: Will the GPPR lead to renewable energy investments in excess of those already**  
85 **required by Ohio law?**

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<sup>7</sup> Executive Summary, National Action Plan for Energy Efficiency Vision for 2025: A Framework for Change, November 2008, Page ES-1.

<sup>8</sup> Exhibits DMR-5 and DMR-6, Sheets 98-1 and 98-2.

<sup>9</sup> Roush at 7, Lines 3-5.

86 A: No. Rather than leading to investments in renewable energy beyond those already  
87 required by Ohio law, the “amounts collected under the GPPR would offset costs paid by  
88 all other customers through the AER,” according to Roush.<sup>10</sup> Customers opting-in to the  
89 GPPR will be getting a “higher percentage of usage from renewable resources,”<sup>11</sup> but this  
90 means that other customers will be getting a lower percentage of usage from renewable  
91 resources because of the “offset.”

92 **Q: Is the fact the GPPR will not lead to additional investments in renewable energy**  
93 **problematic, in your opinion?**

94 A: Yes. Customers who opt-in to the GPPR will be expressing their desire to see more  
95 renewable energy development, but they may not know that opting-in will not actually  
96 lead to development beyond what is already required. Of course, it is possible that some  
97 who opt-in will be consciously choosing to pick up more of the bill for AEP’s required  
98 renewable energy effort than their neighbors. As a representative of NRDC’s members in  
99 Ohio, many of whom would probably be interested in opting-in to this rider, I would  
100 caution them that their money will not actually lead to incremental investment.

101 **Q: In your opinion, should the Commission approve the GPPR as proposed?**

102 A: No. As designed it will not lead to additional renewable energy development, as many  
103 customers who opt-in will likely expect.

104 **Q: How could the Commission modify the GPPR to address this concern?**

105 A: The Commission could instruct the Company to modify the rider so that the monies  
106 collected are used to purchase RECs above the amount required to meet Ohio law. If the  
107 Commission makes this change, GPPR customers should continue paying the AER so

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<sup>10</sup> Id, Lines 6-7.

<sup>11</sup> Roush at 6, Line 18.

108 they pay their share of the costs of the Company's renewable energy compliance effort.  
109 The Commission could also approve the rider as-is but require the Company to clearly  
110 disclose the fact that GPPR customer purchase of renewable energy will lower the  
111 amount purchased for other customers.

112 **Q: Describe the Company's proposed PEV Tariff.**

113 A: The PEV tariff would be offered to 200 customers in the Company's service territory,  
114 and would include a Time of Use (TOU) tariff to encourage off-peak charging and a  
115 subsidized charging station and separate TOU meter. The Company is proposing the PEV  
116 tariff to better understand the affects of vehicle charging on its system, and to determine  
117 if all AEP Ohio customers could benefit from the PEV tariff.<sup>12</sup>

118 **Q: Is the PEV tariff similar to other programs being introduced by other utilities.**

119 A: Yes. The program as described is similar to a pilot program being offered by San Diego  
120 Gas & Electric ("SDG&E"). However, the SDG&E program, approved by the California  
121 Public Utilities Commission on June 24, 2010,<sup>13</sup> investigates the effect of different rates  
122 on customer charging behavior.

123 **Q: What is your opinion on the proposed PEV tariff?**

124 A: In my opinion, the Commission should approve the proposed PEV tariff. It will give the  
125 Company valuable information on the response of its PEV-owning customers to a TOU  
126 rate. A PEV roll-out informed by this information would likely be more orderly than one  
127 based on extrapolations from other service territories. However, the Commission should  
128 instruct the Company to develop testable hypotheses about the impact of the TOU tariff

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<sup>12</sup> Sloneker at 5-7.

<sup>13</sup> [http://docs.cpuc.ca.gov/word\\_pdf/FINAL\\_RESOLUTION/119984.pdf](http://docs.cpuc.ca.gov/word_pdf/FINAL_RESOLUTION/119984.pdf)

129           on charging behavior. If the TOU rate does not have the expected effect, the Company  
130           should investigate other pricing regimes.

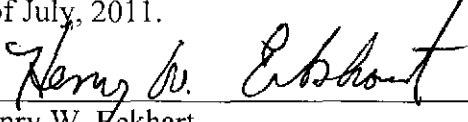
131   **Q:   Does this conclude your testimony?**

132   A:    Yes.



### CERTIFICATE OF SERVICE

I hereby certify that a true and accurate copy of the Direct Testimony of Dylan Sullivan has been filed with the Commission and has been served on the following parties by U. S. Postal Service or by e-mail on this 25th day of July, 2011.

  
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Utility	Program	Customer Incentives *	Third Party Cost *	Utility Admin Cost (C+D+E)	Participant Contribution **	Annual Gross Energy Savings (KWh)	Coincident Peak Savings (MW)	TBC **	UCT **	TBC costs (F-C+G)	TBC benefits (L*)	UCT benefits (F*H)	TBC net benefits (M-L)	UCT net benefits (N-F)
CSP 2010	Efficient Products	2,131,000	421,000	41,000	3,285,003	74,000,000		5	3.9	4.7	\$14,613,312	\$12,281,100	\$10,866,309	9,668,100
	Appliance Recycling	595,000	359,000	28,000	0	7,000,000		1	4.3	1.7	\$1,664,100	\$1,669,400	\$1,277,100	687,400
	Residential Retrofit	25,000	493,000	39,000	0	0		0			\$0	\$0	-\$573,000	-577,000
	Low Income	408,000	279,000	5,000	0	1,000,000		0.8	0.3	284,000	\$227,200	\$207,600	-\$56,800	-484,400
	Residential New Construction		162,000	22,000		0					\$0	\$0	-\$184,000	-184,000
	EE Smart (Kits)	154,000	2,000	11,000		167,000				13,000	\$0	\$0	-\$13,000	-167,000
	Behavioral		377,000	400,000		777,000				777,000	\$0	\$0	-\$777,000	-777,000
	C/I Prescriptive	4,160,000	997,000	39,000	40,378,167	79,000,000		13	1.3	10	\$53,838,417	\$51,960,000	\$12,424,250	46,764,000
	C/I Custom	1,561,000	941,000	71,000	9,403,760	21,000,000		3	1.5	6	\$15,623,640	\$15,438,000	\$5,207,880	12,865,000
	Express Install	11,000	66,000							66,000	\$0	\$0	-\$66,000	-77,000
	Pilots	109,000		2,000						2,000	\$0	\$0	-\$2,000	-111,000
	Department Education/Media									\$22,000	\$0	\$0	-\$22,000	-522,000
	Evaluation									2,623,000	\$0	\$0	-\$2,623,000	-2,623,000
	Demand Response	314,000						62			\$0	\$0	-\$963,000	-963,000
	Self-direct	669,000	800,000	120,000	6,517,351	16,000,000		2	1.2	5.7	\$8,924,821	\$9,057,300	\$1,487,470	7,468,300
OPCO 2010	Total with Self-Direct and Demand Response	10,157,000	4,897,000	778,000	59,584,281					69,367,281	\$94,891,490	\$90,613,400	\$25,524,209	70,673,400
	Total without Self-Direct and Demand Response	9,174,000	4,097,000	658,000	53,066,930					61,929,930	\$85,966,669	\$81,556,100	\$24,036,739	63,519,100
	Total without Admin	10,157,000	4,897,000	778,000	59,584,281					65,259,281				
	Efficient Products	1,634,000	530,000	40,000	2,747,015	63,000,000		5	3.7	4.7	\$12,272,956	\$10,358,800	\$8,955,941	8,154,800
	Appliance Recycling	712,000	335,000	26,000	0	9,000,000		1	5	1.7	\$1,805,000	\$1,824,100	\$1,444,000	751,100
	Residential Retrofit	24,000	493,000	40,000	0	553,000					\$0	\$0	-\$533,000	-557,000
	Low Income	132,000	238,000	6,000	0	244,000		0.4	0.2		\$97,600	\$75,200	-\$146,400	-300,800
	Residential New Construction		155,000	22,000						177,000	\$0	\$0	-\$177,000	-177,000
	EE Smart (Kits)	116,000	2,000	8,000		1,000,000				10,000	\$0	\$0	-\$10,000	-126,000
	Behavioral		350,000	385,000		735,000		11	2.5	8.8	\$39,470,443	\$39,714,400	\$23,682,266	35,201,400
	C/I Prescriptive	3,461,000	1,014,000	38,000	14,736,177	63,000,000		2	1.9	5.4	\$9,881,353	\$9,968,400	\$4,680,641	8,122,400
	C/I Custom	1,184,000	591,000	71,000	4,538,712	14,000,000				\$20,712	\$9,881,353	\$9,968,400	\$4,680,641	8,122,400
	Express Install	4,000	80,000							84,000	\$0	\$0	-\$84,000	-84,000
	Pilots		1,000							1,000	\$0	\$0	-\$1,000	-1,000
	Department Education/Media									523,000	\$0	\$0	-\$523,000	-523,000
Evaluation									673,000	\$0	\$0	-\$673,000	-673,000	
Demand Response									882,000	\$0	\$0	-\$882,000	-882,000	
Self-direct	721,000	549,000	115,000	3,967,490	16,000,000		3	1.9	6.3	\$8,799,831	\$8,725,500	\$4,168,341	7,340,500	
Total AEP without self-direct and demand response	Total with Self-Direct and Demand Response	7,988,000	4,338,000	751,000	25,989,394					33,156,394	\$72,327,182	\$70,666,400	\$39,170,788	55,511,400
	Total without Self-Direct and Demand Response	7,267,000	3,789,000	636,000	22,021,904					28,524,904	\$63,527,351	\$61,940,900	\$35,002,447	48,170,900
	Total without Admin	7,988,000	4,338,000	751,000	25,989,394					31,078,394	\$0	\$0		
Total AEP with self-direct and demand response														
From 2010 AEP Portfolio Status Report page 14-15														
From Evaluation reports														
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**\*\* Assume same cost effectiveness as Business Prescriptive Program**

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Error in evaluation reports: spending for Efficient Products Appliance Recycling Programs shipped, but cost effectiveness as reported