## CENTRAL HUDSON GAS & ELECTRIC CORPORATION 284 SOUTH AVENUE POUGHKEEPSIE, NEW YORK 12601

August 25, 2011

Public Service Commission Three Empire State Plaza Albany, NY 12223

## Proposal by Central Hudson to Implement a Residential Off-Peak Rate

Dear Commissioners:

The tariff leaves set forth below are filed by Central Hudson Gas & Electric Corporation ("Central Hudson" or "the Company") on August 25, 2011 to become effective December 1, 2011:

# P.S.C. No. 15 – Electricity

Original Leaf No. 203.6
Original Leaf No. 203.7
Original Leaf No. 203.8
Original Leaf No. 203.9
Original Leaf No. 203.10
Original Leaf No. 203.11
Original Leaf No. 203.12
Original Leaf No. 203.13
4th Revised Leaf No. 272.3.1
4th Revised Leaf No. 272.3.2
3rd Revised Leaf No. 272.6.1
4th Revised Leaf No. 272.10
1st Revised Leaf No. 272.19
2nd Revised Leaf No. 272.21

Statement of Bill Credit EBC – 3 Statement of Merchant Function Charges MFC – 6 Statement of New York State Assessment Surcharge NYSA – 7 Statement of Revenue Decoupling Mechanism Adjustment RDM – 5

## **Purpose of Filing**

The purpose of this filing is to propose the implementation of a residential off-peak rate, covering both delivery and supply, to encourage customers owning and/or operating plug-in electric and plug-in hybrid electric vehicles (collectively, "PEV") to charge these vehicles during off-peak periods. While this rate structure is proposed to address PEV charging, as discussed more fully below, the rate structure would not be limited to this specific end-use only as the Company is not proposing separate metering. Moreover, although the Company currently offers residential time-of-use service under Service Classification No. 6, it would not preclude residential customers from taking service under this new structure to address other significant loads, such as air conditioning and space heating.

The launch of PEVs in 2010 by major automotive manufacturers, including Nissan and Chevrolet, signaled a fundamental shift in transportation to cleaner and more efficient electric drive systems. As a result, all other variables constant, PEVs will increase electricity use. Time differentiated pricing can help determine when this increased load is served. In competitively served electricity supply markets, such as in the New York market, off-peak supply prices generally tend to be lower than on-peak supply prices. Rate design can help to influence financially motivated customers to charge their vehicles during off-peak hours. Encouraging incremental usage during off-peak periods will help to limit peak load and will allow greater use of existing infrastructure, thereby limiting additional investment and minimizing costs to help keep rates lower for all customers.

#### **Rate Structure Proposal**

Central Hudson proposes to implement Service Classification ("SC") No. 4 – Residential Off-Peak Charging. The structure of SC 4 would be similar to SC 6, with on-peak and off-peak rate differentials for both base delivery and electricity supply rates. However, unlike SC 6 wherein the customer selects from one of three 12 hour on-peak periods, the 12 hour on-peak period for SC 4 would be established as 9:00 am to 9:00 pm weekdays, excluding six designated holidays (the same as SC 6). This timeframe, with the weekday off-peak period starting at 9:00 pm, would encourage charging sufficiently outside the peak period frame of 3:00 pm to 7:00 pm.

The SC 4 rate structure would be similar to the SC 6 rate structure, with base delivery rates comprised of a monthly basic service charge, or customer charge, on-peak and off-peak energy delivery charges and Merchant Function Charges, as applicable. Customers requesting service under SC 4 would be required to take service for a minimum of one year.

Two sets of base delivery rates have been developed, as more fully discussed below, with the first effective December 1, 2011 through June 30, 2012 and the second effective on and after July 1, 2012, coinciding with the second and third rate years of the current three-year rate plan approved by the Commission in Case 09-E-0588:

	Effective	Effective
	December 1, 2011	July 1, 2012
Monthly Customer Charge	\$25.00	\$27.00
Energy Delivery Charge per kWh:		
On-Peak	\$0.07019	\$0.07079
Off-Peak	\$0.03105	\$0.03131

The Electric Bill Credit and Merchant Function Charge rates applicable to SC 1 would be applied to SC 4. The Energy Cost Adjustment Mechanism rates applicable to SC 6, which reflect timedifferentiated supply rates, would be applied to SC 4. For purposes of both the revenue decoupling mechanism and New York State Assessment, the Company proposes to include SC 4 with SC 1 and SC 6, which it requested be combined pursuant to the tariff filing submitted July 21, 2011 (Case 11-E-0388). The System Benefits Charge, which includes the Renewable Portfolio Standard and Energy Efficiency Portfolio Standard, and which is a system rate that is not time-differentiated, would also apply.

#### Rate Development

SC 4 delivery rates were developed to be revenue neutral based on general residential service provided under SC 1, pursuant to rates approved in Case 09-E-0588. In other words, based on the determinants utilized to set rates in Case 09-E-0588, if all SC 1 customers were to take service under the proposed SC 4 rates the resulting revenue would equal the SC 1 revenue requirement utilized in Case 09-E-0588 to set SC 1 rates. The rate design development is detailed on Exhibit A and was accomplished as follows:

- 1. The Rate Year 1 SC 1 levelized revenue requirement by functional category (Joint Proposal ("JP") in Case 09-E-0588, Appendix J, Schedule C, Page 1 of 2) was scaled to the final rate design revenue allocation (combination of Page 2 of 2 of Schedule C of Appendix J and Sheets 1 and 2 of 5 of Appendix M from the JP), excluding Merchant Function Charge revenue.
- 2. The customer/energy allocation of the scaled revenue requirement was determined by utilizing the SC 6 Rate Year 1 customer charge to estimate the customer portion with the remainder assigned as energy.
- 3. Current residential non-heat and heat load profiles (as posted on the Company's web site and utilized for retail access settlement) were utilized to determine on-peak and off-peak kWh allocation based on the on-peak definition of 9:00 am to 9:00 pm weekdays.
- 4. The non-transmission portion of the energy allocation of the scaled revenue requirement was divided by total kWh to determine the "base" energy delivery charge per kWh, which is also the off-peak energy delivery charge per kWh.
- 5. The transmission portion of the energy allocation of the scaled revenue requirement was divided by the on-peak kWh allocation with the result added to the "base" energy delivery charge per kWh to develop the on-peak energy delivery charge per kWh.
- 6. Rates for Rate Years 2 and 3 were developed by adding the approved rate increase to the scaled revenue requirement from the previous year and following steps 2 through 5, above, with the appropriate determinants from Case 09-E-0588.

## Bill Impact

Annual bill comparisons for various levels of usage including and excluding two levels of assumed off-peak charging have been developed and are presented on Exhibit B. For a customer with non-PEV average consumption of between 500 and 750 kWh a month, off-peak charging under SC 4 for incremental kWh would result in an approximate savings of 3% to 5% depending on level of charging.

### Summary

Central Hudson believes its proposal addresses not only the concerns of customers contemplating the purchase and/or operation of a PEV, but also the concerns of all customers for rate optimization. Encouraging off-peak charging of PEV will benefit all customers by increasing the use of existing infrastructure while reducing the contribution of PEV charging to peak demand and limiting resulting additional investment.

The Company is arranging to comply with the requirements of Section 66(12)(b) of the Public Service Law as to newspaper publication by publishing notices of the changes proposed herein in the September 7, 14, 21 and 28 issues of the Catskill Daily Mail, Kingston Freeman, Times Herald Record and Poughkeepsie Journal.

Work papers supporting the rate design contained herein have been provided to Staff of the Department of Public Service.

Questions related to this filing should be directed to Glynis Bunt at (845) 486-5420 or Linda VanEtten at (845) 486-5554.

Yours very truly,

Michael L. Mosher Vice President - Regulatory Affairs

#### Residential Off-Peak Charging Rate Design

			Case 09-E-0588 - Rate Year 1 - 12 Mor	 RY 2	RY 3	
	L	evelized.		Scaled		
A Demand-related B Energy-related C Customer-related D Revenue E Total Rev Req	SC 1 NHT S   \$ 59,020,296 \$   \$ 5,689,871 \$   \$ 93,145,359 \$   \$ (4,138,911) \$   \$ 153,716,615 \$	SC 1 HT 9,031,490 \$ 6   799,123 \$ 10,915,292 \$ 10   (844,471) \$ 1 19,901,434 \$ 17	Source Source   38.051.786 JP App. J, Sch. C, P. 1 of 2, L39   6,489.94 JP App. J, Sch. C, P. 1 of 2, L40   4/060.651 JP App. J, Sch. C, P. 1 of 2, L42   (4983.382) JP App. J, Sch. C, P. 1 of 2, L43   73,618,049 JP App. J, Sch. C, P. 1 of 2, L43	Source		Source
F Production G Production - MFC Supply H Transmission & SubTran I Bulk Distribution J Customer K MFC Admin L Total Rev Req	\$ 5,505,691 \$ \$ 3,341,165 \$ \$ 27,279,187 \$ \$ 80,387,902 \$ \$ 3,916,196 \$ \$ 3,286,474 \$ \$ 153,716,615 \$	975,984 \$   375,883 \$   3,465,164 \$   10,766,656 \$   3,948,017 \$   369,730 \$   19,901,434 \$ 17	6,481,675 JP App. J, Sch. C, P. 1 of 2, L1 + L2 3,717,048 JP App. J, Sch. C, P. 1 of 2, L4 3,743,651 JP App. J, Sch. C, P. 1 of 2, L13 31,154,568 JP App. J, Sch. C, P. 1 of 2, L23 37,864,213 JP App. J, Sch. C, P. 1 of 2, sum L24 thru L36 - L34 3,565,204 JP App. J, Sch. C, P. 1 of 2, L34 73,618,049	\$ 6,418,678 F / M * Ma   \$ 3,727,277 Q x 1000 x \$0.00181 - JP App. M, Sheet 2 of 5   \$ 3,0445,537 H / M * Ma   \$ 90,288,597 I / M * Ma   \$ 37,496,198 J / M * Ma   \$ 37,496,198 J / M * Ma   \$ 3656,499 Q x 1000 x \$0.00178 - JP App. M, Sheet 2 of {   \$ 172,021,786 I		
M Bundled Rev Req (excl MFC) Ma Mb RY2/RY3 Base Increase	\$ 147,088,976 \$	19,155,821 \$ 16	36,244,797 L-G-K	\$ 164,629,010 (P x 12 x \$20) + (Q x 1000 x \$0.05011) - JP App. M., Sheet 1 of 5	\$ 5,817,498 \$	5,582,121 JP App. I, Sheet 1 of 3
Other Revenue N Demand-relat O Energy-relat	ed \$ 3,922,529 \$ ed \$ 214,889 \$	588,555 \$ 255,611 \$	4,511,084 COS workpapers 470,500 COS workpapers			
P Number of Customers Q MWh R On-Peak % S Off-Peak % T On-Peak MWh U Off-Peak MWh	230,109 1,744,845 39% 61% 680,490 1,064,355	25,887 314,424 33% 67% 103,760 210,664	255.996 JP App. J, Sch. C, P. 2 of 2, L59 2,059,269 JP App. J, Sch. C, P. 2 of 2, L58 38% Annualized Load Profile 62% Annualized Load Profile 784,250 Q X R 1,275,019 Q - T		257,060 2,032,670 38% 62% 772,415 1,260,255	258,263 JP App. I, Sheet 1 of 14, Customer Months/12 1,994,580 JP App. I, Sheet 1 of 14, kWh/1000 38% 62% 757,940 1,236,640
V Customer Charge W Energy Rate per kWh	\$ 31.12 \$ \$ 0.03505 \$	32.05 \$ 0.02926 \$	31.22 (C - K - N)/(P x 12) 0.03416 (A + B - G - O)/(Q x 1000)			

Y Total Base Z Customer Charge AA Total Energy AB Transmission - On-Peak AC Energy - On-Peak & Off-Peak

			Residential	Off-Peak Charging R	ate Design			
1	RY 1	- 12 ME 6/30/1	1	RY 2				
	\$	23.00	Current SC 6 - JP App. M, Sheet 1 of 5	s	25.00	s	27.00	Current SC 6 - JP App. M, Sheet 1 of
On-Peak	\$	0.06968	(AC (scaled)/(Q x 1000)) + (AB / (T x 1000))	\$	0.07019	\$	0.07079	(AC / (Q x 1000)) + (AB / (T x 1000))
Off-Peak	\$	0.03086	(AC / (Q x 1000))	\$	0.03105	\$	0.03131	(AC / (Q x 1000))
	\$	164,629,010	Ма	s	170,446,508	s	176,028,629	Prior RY Y + Mb
	\$	70,654,896	(P x 12 x \$23)	\$	77,118,000	\$	83,677,212	P x 12 x SC 6 Cust Chg
	\$	93,974,114	Y-Z	\$	93,328,508	\$	92,351,417	Y - Z
	\$	30,445,537	H Scaled	\$	30,236,375	\$	29,919,819	Change in Y * Prior RY AE
	s	63 528 577	AA - AB	S	63 092 133	s	62 431 598	AA - AB

Check:			
Customer Charge Revenue	\$ 95,893,363 P x 12 x V	\$ 70,654,896	\$ 77,118,000 \$ 83,677,212
Energy Delivery Revenue	\$ 70,353,232 Q x 1000 x W	\$ 93,993,626	<u>\$ 93,346,727</u> <u>\$ 92,373,771</u>
Base	\$ 166,246,595	\$ 164,648,522	\$ 170,464,727 \$ 176,050,983
MFC	\$ 7,373,252 G + K	\$ 7,373,252	\$ 7,373,252 <b>\$</b> 7,373,252
Total	\$ 173,619,847	\$ 172,021,774	\$ 177,837,979 \$ 183,424,235
		difference \$ (12)	\$ 1,305 \$ (2,830)

Rate Year 2 - Twelve Months Ending June 30, 2012																					
Non -	PEV			With	1,872 annua	V kWh off-pe	ak	With 2,340 annual PEV kWh off-peak													
Usage (kWh) Annual Bill									Annu	Bill		Annual Bill									
Monthly	Annual	SC 1	1 SC 4 SC 4 Savings/(Loss)		SC 4 Savings/(Loss)		SC 4 Savings/(Loss)			SC 1	SC 4	SC 4 Savings/(Loss)		/(Loss)	SC 1		SC 4		SC 4 Savings/		(Loss)
-	-	\$ 264.00	\$ 300.00	\$	(36.00)	-12.0%	\$	522.07	\$ 504.87	\$	17.20	3.4%	\$	667.65	\$	620.44	\$	47.21	7.6%		
250	3,000	\$ 677.58	\$ 701.17	\$	(23.59)	-3.4%	\$	935.65	\$ 906.04	\$	29.62	3.3%	\$	1,081.23	\$	1,021.61	\$	59.63	5.8%		
500	6,000	\$ 1,091.16	\$ 1,102.33	\$	(11.17)	-1.0%	\$	1,349.23	\$ 1,307.20	\$	42.03	3.2%	\$	1,494.81	\$	1,422.77	\$	72.04	5.1%		
750	9,000	\$ 1,504.74	\$ 1,503.50	\$	1.24	0.1%	\$	1,762.81	\$ 1,708.37	\$	54.44	3.2%	\$	1,908.39	\$	1,823.94	\$	84.46	4.6%		
1,000	12,000	\$ 1,918.32	\$ 1,904.66	\$	13.66	0.7%	\$	2,176.39	\$ 2,109.54	\$	66.86	3.2%	\$	2,321.97	\$	2,225.10	\$	96.87	4.4%		
1,250	15,000	\$ 2,331.90	\$ 2,305.83	\$	26.07	1.1%	\$	2,589.97	\$ 2,510.70	\$	79.27	3.2%	\$	2,735.55	\$	2,626.27	\$	109.28	4.2%		
1,500	18,000	\$ 2,745.48	\$ 2,707.00	\$	38.48	1.4%	\$	3,003.55	\$ 2,911.87	\$	91.69	3.1%	\$	3,149.13	\$	3,027.44	\$	121.70	4.0%		
1,750	21,000	\$ 3,159.06	\$ 3,108.16	\$	50.90	1.6%	\$	3,417.13	\$ 3,313.03	\$	104.10	3.1%	\$	3,562.71	\$	3,428.60	\$	134.11	3.9%		
2,000	24,000	\$ 3,572.64	\$ 3,509.33	\$	63.31	1.8%	\$	3,830.71	\$ 3,714.20	\$	116.51	3.1%	\$	3,976.29	\$	3,829.77	\$	146.53	3.8%		
2,500	30,000	\$ 4,399.80	\$ 4,311.66	\$	88.14	2.0%	\$	4,657.87	\$ 4,516.53	\$	141.34	3.1%	\$	4,803.45	\$	4,632.10	\$	171.35	3.7%		
3,000	36,000	\$ 5,226.96	\$ 5,113.99	\$	112.97	2.2%	\$	5,485.03	\$ 5,318.86	\$	166.17	3.1%	\$	5,630.61	\$	5,434.43	\$	196.18	3.6%		
3,500	42,000	\$ 6,054.12	\$ 5,916.32	\$	137.80	2.3%	\$	6,312.19	\$ 6,121.20	\$	191.00	3.1%	\$	6,457.77	\$	6,236.76	\$	221.01	3.5%		
4,000	48,000	\$ 6,881.28	\$ 6,718.66	\$	162.62	2.4%	\$	7,139.35	\$ 6,923.53	\$	215.83	3.1%	\$	7,284.93	\$	7,039.10	\$	245.84	3.5%		
4,500	54,000	\$ 7,708.44	\$ 7,520.99	\$	187.45	2.5%	\$	7,966.51	\$ 7,725.86	\$	240.65	3.1%	\$	8,112.09	\$	7,841.43	\$	270.67	3.5%		
5,000	60,000	\$ 8,535.60	\$ 8,323.32	\$	212.28	2.6%	\$	8,793.67	\$ 8,528.19	\$	265.48	3.1%	\$	8,939.25	\$	8,643.76	\$	295.49	3.4%		

# Bill Comparisons - Excluding Taxes

Rate Year 3 - Twelve Months Ending June 30, 2013																					
	Non -	PEV						With	1,872 annual	I PE	V kWh off-pea	k	With 2,340 annual PEV kWh off-peak								
	Usage (	kWh)		Annı	ial Bill				Annu	Bill		Annual Bill									
	Monthly	Annual	SC 1	SC 4	SC 4 Sav	rings/(Loss)		SC 1	SC 4		SC 4 Savings/	(Loss)	SC 1		SC 4		SC 4 Saving	s/(Loss)			
	-	-	\$ 288.00	\$ 324.00	\$ (36.00	) -11.1%	\$	547.98	\$ 531.85	\$	16.14	3.0%	\$ 694.64	\$	649.10	\$	45.54	7.0%			
	250	3,000	\$ 704.64	\$ 730.32	\$ (25.68	) -3.5%	\$	964.62	\$ 938.17	\$	26.45	2.8%	\$ 1,111.28	\$	1,055.42	\$	55.86	5.3%			
	500	6,000	\$ 1,121.28	\$ 1,136.65	\$ (15.37	) -1.4%	\$	1,381.26	\$ 1,344.50	\$	36.77	2.7%	\$ 1,527.92	\$	1,461.74	\$	66.18	4.5%			
	750	9,000	\$ 1,537.92	\$ 1,542.97	\$ (5.05	) -0.3%	\$	1,797.90	\$ 1,750.82	\$	47.08	2.7%	\$ 1,944.56	\$	1,868.07	\$	76.49	4.1%			
	1,000	12,000	\$ 1,954.56	\$ 1,949.29	\$ 5.27	0.3%	\$ 3	2,214.54	\$ 2,157.14	\$	57.40	2.7%	\$ 2,361.20	\$	2,274.39	\$	86.81	3.8%			
	1,250	15,000	\$ 2,371.20	\$ 2,355.62	\$ 15.58	0.7%	\$ 3	2,631.18	\$ 2,563.47	\$	67.72	2.6%	\$ 2,777.84	\$	2,680.71	\$	97.13	3.6%			
	1,500	18,000	\$ 2,787.84	\$ 2,761.94	\$ 25.90	0.9%	\$ 3	3,047.82	\$ 2,969.79	\$	78.03	2.6%	\$ 3,194.48	\$	3,087.04	\$	107.44	3.5%			
	1,750	21,000	\$ 3,204.48	\$ 3,168.27	\$ 36.21	1.1%	\$ 3	3,464.46	\$ 3,376.11	\$	88.35	2.6%	\$ 3,611.12	\$	3,493.36	\$	117.76	3.4%			
	2,000	24,000	\$ 3,621.12	\$ 3,574.59	\$ 46.53	1.3%	\$ 3	3,881.10	\$ 3,782.44	\$	98.67	2.6%	\$ 4,027.76	\$	3,899.68	\$	128.08	3.3%			
	2,500	30,000	\$ 4,454.40	\$ 4,387.24	\$ 67.16	1.5%	\$ 4	4,714.38	\$ 4,595.08	\$	119.30	2.6%	\$ 4,861.04	\$	4,712.33	\$	148.71	3.2%			
	3,000	36,000	\$ 5,287.68	\$ 5,199.88	\$ 87.80	1.7%	\$ !	5,547.66	\$ 5,407.73	\$	139.93	2.6%	\$ 5,694.32	\$	5,524.98	\$	169.34	3.1%			
	3,500	42,000	\$ 6,120.96	\$ 6,012.53	\$ 108.43	1.8%	\$ 1	6,380.94	\$ 6,220.38	\$	160.56	2.6%	\$ 6,527.60	\$	6,337.63	\$	189.97	3.0%			
	4,000	48,000	\$ 6,954.24	\$ 6,825.18	\$ 129.06	1.9%	\$	7,214.22	\$ 7,033.03	\$	181.20	2.6%	\$ 7,360.88	\$	7,150.27	\$	210.61	2.9%			
	4,500	54,000	\$ 7,787.52	\$ 7,637.82	\$ 149.70	2.0%	\$ 8	8,047.50	\$ 7,845.67	\$	201.83	2.6%	\$ 8,194.16	\$	7,962.92	\$	231.24	2.9%			
	5.000	60.000	\$ 8.620.80	\$ 8.450.47	\$ 170.33	2.0%	Ś	8.880.78	\$ 8.658.32	Ś	222.46	2.6%	\$ 9.027.44	Ś	8.775.57	Ś	251.87	2.9%			

Assumes non-PEV on peak/off peak split of 38/62.