

March 16, 2018

VIA HAND DELIVERY & ELECTRONIC MAIL

Luly E. Massaro, Commission Clerk
Rhode Island Public Utilities Commission
89 Jefferson Boulevard
Warwick, RI 02888

RE: Docket 4371 - Long-Term Contracting for Renewable Energy Recovery Factor Response to Commission Post-Hearing Data Requests – Set 11

Dear Ms. Massaro:

Enclosed are National Grid's¹ responses to the Rhode Island Public Utilities Commission's (PUC) Eleventh Set of Post-Hearing Data Requests in the above-referenced docket.

Thank you for your attention to this filing. Please contact me if you have any questions concerning this matter at 401-784-7288.

Very truly yours,



Jennifer Brooks Hutchinson.

Enclosures

cc: Docket 4371 Service List
John Bell, Division
Al Mancini, Division
Leo Wold, Esq.

¹ The Narragansett Electric Company d/b/a National Grid.

Certificate of Service

I hereby certify that a copy of the cover letter and any materials accompanying this certificate was electronically transmitted to the individuals listed below.

The paper copies of this filing are being hand delivered to the Rhode Island Public Utilities Commission and to the Rhode Island Division of Public Utilities and Carriers.



Joanne M. Scanlon

March 16, 2018

Date

Docket No. 4371 - National Grid – Tariff Advice Filing to Amend Long-Term Contracting for Renewable Energy Recovery Factor effective

Service List updated 1/5/17

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PUC 11-1

Request:

Please provide a projection of the above-market or below-market cost of the pricing for each project with which National Grid has entered an agreement to purchase power, the costs of which will be recovered through the LTCRER Tariff. Please identify and use the most recent market price forecast for energy, RECs, and capacity readily available to National Grid and provide the response in the same format as the Company's response to Commission Post Hearing Data Request issued October 25, 2016.

Response:

Please see Attachment PUC 11-1(a) and Attachment PUC 11-1(b).

Attachment PUC 11-1(a) contains a summary of the above-market cost for the long-term contracts and distributed generation standard contracts by year. Attachment PUC 11-1(b) contains a detailed listing of the above-market cost by unit. The Company calculated the above market cost using the market price forecasts for Energy, Capacity and RECs provided by ESAI in December 2016.

Year	Long-term Contracts	DG Standard Contracts	Clean Energy RFP	Totals by Year
	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$23,470,668	\$3,951,854	\$0	\$27,422,522
2019	\$17,695,707	\$3,789,727	(\$56,269)	\$21,429,164
2020	\$26,248,140	\$4,062,841	(\$67,090)	\$30,243,891
2021	\$32,636,246	\$4,232,523	\$641,064	\$37,509,833
2022	\$35,536,897	\$4,263,621	\$749,429	\$40,549,948
2023	\$36,023,481	\$4,172,776	\$412,745	\$40,609,002
2024	\$37,808,184	\$4,146,017	\$313,694	\$42,267,895
2025	\$38,496,028	\$4,072,655	\$55,921	\$42,624,604
2026	\$40,476,190	\$4,067,728	\$38,972	\$44,582,890
2027	\$42,868,581	\$4,067,383	\$34,139	\$46,970,104
2028	\$37,666,079	\$3,616,962	\$30,851	\$41,313,892
2029	\$30,788,359	\$1,372,950	(\$38,219)	\$32,123,091
2030	\$32,592,146	\$789,142	(\$59,970)	\$33,321,318
2031	\$34,355,566	\$463,502	(\$115,673)	\$34,703,395
2032	\$35,747,040	\$158,610	(\$178,907)	\$35,726,742
2033	\$37,284,339	\$13,135	(\$249,752)	\$37,047,722
2034	\$36,424,367	\$0	(\$328,292)	\$36,096,075
2035	\$38,028,130	\$0	(\$414,619)	\$37,613,512
2036	\$35,839,148	\$0	(\$508,831)	\$35,330,317
2037	\$0	\$0	(\$611,033)	(\$611,033)
2038	\$0	\$0	(\$696,348)	(\$696,348)
2039	\$0	\$0	(\$737,966)	(\$737,966)
2040	\$0	\$0	(\$479,388)	(\$479,388)
Total	\$649,985,295	\$47,241,425	(\$2,265,539)	\$694,961,182
NPV (7%, 2018)	\$339,507,002	\$31,498,910	\$278,396	\$371,284,308

Notes:

- RI LTC, RI DG & RI CERFP Contracts as of February 2018; approximately 88.1% of the 90 MW minimum requirement. RI CERFP PPAs received approval at the Open Meeting on 2/15/2018.

- Above market cost is calculated using market price forecasts for Energy, Capacity and RECs provided by ESAI in December 2016.

- Capacity factors for the FCM, commercial operation dates, and annual output have been estimated for the given projects' technology and location.

	Deepwater Wind 30 MW	Rhode Island Landfill Gas GenCo 32MW	Orbit Energy HSAD Biogas 3.2 MW (\$95)	Black Bear Hydro 3.958 MW	Copenhagen Wind 79.9 MW	RI DG - Plain Meeting House Solar 2 MW	RI DG - ACP 28 Jacome Way 500 kW
Year	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$17,275,222	\$6,500,491	(\$247,909)	\$210,393	(\$267,530)	\$444,390	\$136,239
2019	\$16,576,915	\$5,468,306	(\$391,644)	\$92,055	(\$4,049,925)	\$430,321	\$132,721
2020	\$18,360,001	\$9,307,441	(\$20,093)	\$411,265	(\$1,810,474)	\$452,256	\$138,205
2021	\$20,389,416	\$11,755,878	\$204,203	\$623,512	(\$336,764)	\$465,884	\$141,612
2022	\$21,611,455	\$12,728,948	\$270,956	\$714,926	\$210,612	\$468,381	\$142,237
2023	\$22,352,888	\$12,819,594	\$241,195	\$689,200	(\$79,396)	\$461,085	\$140,412
2024	\$23,378,595	\$13,350,615	\$258,102	\$721,774	\$99,097	\$458,936	\$139,875
2025	\$24,166,457	\$13,408,057	\$223,533	\$720,484	(\$22,504)	\$453,044	\$138,402
2026	\$25,238,654	\$13,899,691	\$235,141	\$781,519	\$321,185	\$452,648	\$138,303
2027	\$26,458,907	\$14,601,334	\$267,102	\$845,872	\$695,366	\$452,621	\$138,296
2028	\$27,779,656	\$7,655,688	\$310,226	\$836,585	\$1,083,924	\$263,873	\$80,634
2029	\$29,090,321	\$0	\$343,496	\$0	\$1,354,543	\$0	\$0
2030	\$30,483,010	\$0	\$383,888	\$0	\$1,725,248	\$0	\$0
2031	\$31,900,915	\$0	\$420,445	\$0	\$2,034,206	\$0	\$0
2032	\$33,362,600	\$0	\$47,312	\$0	\$2,337,128	\$0	\$0
2033	\$34,869,813	\$0	\$0	\$0	\$2,414,526	\$0	\$0
2034	\$36,424,367	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$38,028,130	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$35,839,148	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$513,586,469	\$121,496,046	\$2,545,954	\$6,647,585	\$5,709,241	\$4,803,439	\$1,466,938
NPV (7%, 2018)	\$255,003,385	\$79,773,360	\$1,113,443	\$4,178,759	(\$561,945)	\$3,308,105	\$1,010,575

Notes:

- RI LTC, RI DG & RI CERFP Contracts as of February 2018; approximately 88.1% of the 90 MW minimum requirement. RI CERFP PPAs received approval at the Open Meeting on 2/15/2018.
- Above market cost is calculated using market price forecasts for Energy, Capacity and RECs provided by ESAI in December 2016.
- Capacity factors for the FCM, commercial operation dates, and annual output have been estimated for the given projects' technology and location.

	RI DG - North Kingstown Green Wind 1.5 MW	RI DG - Forbes Street Solar 3.7 MW	RI DG - West Davisville Solar 2.34 MW	RI DG - 100 Dupont 1.5 MW	RI DG - Altus Comtram Cable Plant 499 kW	RI DG - Cox Comm 181 kW	RI DG - 0 Martin 500 kW	RI DG - 225 Dupont 300 kW
Year	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$114,698	\$660,546	\$410,857	\$211,879	\$135,966	\$49,318	\$136,239	\$81,743
2019	\$98,116	\$634,447	\$394,395	\$201,327	\$132,456	\$48,045	\$132,721	\$79,633
2020	\$123,968	\$675,137	\$420,059	\$217,778	\$137,929	\$50,030	\$138,205	\$82,923
2021	\$140,029	\$700,416	\$436,004	\$227,999	\$141,329	\$51,264	\$141,612	\$84,967
2022	\$142,973	\$705,049	\$438,926	\$229,872	\$141,952	\$51,490	\$142,237	\$85,342
2023	\$134,374	\$691,515	\$430,389	\$224,400	\$140,132	\$50,829	\$140,412	\$84,247
2024	\$131,841	\$687,528	\$427,875	\$222,788	\$139,595	\$50,635	\$139,875	\$83,925
2025	\$124,897	\$676,599	\$420,981	\$218,369	\$138,125	\$50,102	\$138,402	\$83,041
2026	\$124,430	\$675,865	\$420,518	\$218,073	\$138,027	\$50,066	\$138,303	\$82,982
2027	\$124,398	\$675,813	\$420,486	\$218,052	\$138,020	\$50,063	\$138,296	\$82,978
2028	\$20,680	\$675,317	\$385,159	\$217,851	\$103,465	\$50,039	\$138,230	\$82,938
2029	\$0	\$0	\$0	\$54,200	\$0	\$8,319	\$34,470	\$20,682
2030	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$1,280,402	\$7,458,234	\$4,605,650	\$2,462,590	\$1,486,996	\$560,200	\$1,559,003	\$935,402
NPV (7%, 2018)	\$887,930	\$5,074,375	\$3,140,660	\$1,661,863	\$1,019,477	\$379,427	\$1,053,243	\$631,946

	RI DG - 35 Martin 500 kW	RI DG - Cox Comm 498 kW	RI DG - Brickle Group 1.08 MW	RI DG - Gannon & Scott 406 kW	RI DG - All American Solar 331 kW	RI DG - TEAM 182 kW	RI DG - CMS 128 kW
Year	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$136,239	\$135,694	\$121,079	\$94,693	\$77,200	\$43,341	\$30,482
2019	\$132,721	\$132,191	\$113,453	\$91,836	\$74,872	\$42,061	\$29,581
2020	\$138,205	\$137,652	\$125,342	\$96,289	\$78,502	\$44,057	\$30,985
2021	\$141,612	\$141,046	\$132,728	\$99,056	\$80,757	\$45,297	\$31,857
2022	\$142,237	\$141,668	\$134,082	\$99,563	\$81,171	\$45,524	\$32,017
2023	\$140,412	\$139,851	\$130,128	\$98,082	\$79,963	\$44,860	\$31,550
2024	\$139,875	\$139,316	\$128,963	\$97,645	\$79,607	\$44,665	\$31,413
2025	\$138,402	\$137,849	\$125,769	\$96,449	\$78,632	\$44,129	\$31,036
2026	\$138,303	\$137,750	\$125,555	\$96,369	\$78,567	\$44,093	\$31,010
2027	\$138,296	\$137,743	\$125,540	\$96,363	\$78,562	\$44,090	\$31,008
2028	\$138,230	\$114,730	\$125,395	\$96,309	\$78,518	\$44,066	\$25,826
2029	\$34,470	\$0	\$114,248	\$32,008	\$65,238	\$40,277	\$0
2030	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$1,559,003	\$1,495,489	\$1,502,283	\$1,094,662	\$931,589	\$526,460	\$336,766
NPV (7%, 2018)	\$1,053,243	\$1,022,885	\$994,059	\$737,539	\$618,674	\$348,828	\$230,298

	RI DG - Newport Vineyard 53 kW	RI DG - Johnston Solar I 1.7 MW	RI DG - Randall Steere Farm 91 kW	RI DG - Nexamp 76 Stilson Rd 498 kW	RI DG - North Kingstown Solar 1720 Davisville Rd 500 kW	RI DG - SER Solar 23 Appian Way 52 kW	RI DG - Foster Solar - 23 Theodore Foster Drive 1.3 MW
Year	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$13,369	\$169,244	\$22,953	\$61,720	\$58,976	\$11,718	\$171,952
2019	\$12,996	\$157,285	\$22,313	\$58,217	\$55,458	\$11,352	\$163,158
2020	\$13,577	\$175,929	\$23,311	\$63,679	\$60,942	\$11,923	\$176,868
2021	\$13,938	\$187,513	\$23,931	\$67,072	\$64,349	\$12,277	\$185,385
2022	\$14,005	\$189,636	\$24,044	\$67,694	\$64,973	\$12,342	\$186,946
2023	\$13,811	\$183,434	\$23,713	\$65,877	\$63,149	\$12,152	\$182,386
2024	\$13,754	\$181,608	\$23,615	\$65,342	\$62,612	\$12,096	\$181,043
2025	\$13,598	\$176,599	\$23,347	\$63,875	\$61,139	\$11,943	\$177,360
2026	\$13,588	\$176,263	\$23,329	\$63,776	\$61,040	\$11,933	\$177,113
2027	\$13,587	\$176,240	\$23,327	\$63,769	\$61,033	\$11,932	\$177,096
2028	\$13,580	\$176,012	\$23,315	\$63,703	\$60,966	\$11,925	\$176,928
2029	\$12,414	\$174,819	\$23,251	\$63,353	\$60,615	\$11,889	\$176,051
2030	\$0	\$101,609	\$5,804	\$10,528	\$50,358	\$0	\$175,587
2031	\$0	\$0	\$0	\$0	\$0	\$0	\$116,539
2032	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$162,217	\$2,226,193	\$286,253	\$778,606	\$785,611	\$143,481	\$2,424,411
NPV (7%, 2018)	\$107,491	\$1,444,406	\$187,821	\$511,580	\$506,378	\$94,847	\$1,526,457

	RI DG - Brookside Equestrian Center - 90 Tifft Rd 1.2 MW	RI DG - 200 Frenchtown Road Solar 1.25 MW	RI DG - Wilco 260 South County Trail 1.246 MW	CERFP - Sanford Airport Solar Project	CERFP - Chinook Solar Project	CERFP - Farmington Solar Project	CERFP - Quinebaug Solar Project
Year	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$85,691	\$143,584	\$192,046	\$0	\$0	\$0	\$0
2019	\$76,925	\$147,844	\$183,281	(\$21,249)	(\$10,607)	(\$13,449)	(\$10,964)
2020	\$90,591	\$161,553	\$196,946	(\$68,845)	(\$29,349)	(\$28,316)	(\$10,219)
2021	\$99,081	\$170,070	\$205,436	(\$34,431)	(\$9,214)	\$2,420	\$22,939
2022	\$100,637	\$171,631	\$206,992	(\$27,365)	(\$5,079)	\$8,731	\$28,740
2023	\$96,091	\$167,071	\$202,447	(\$46,823)	(\$16,433)	(\$8,648)	\$9,825
2024	\$94,753	\$165,728	\$201,108	(\$53,487)	(\$20,319)	(\$14,600)	\$4,411
2025	\$91,082	\$162,046	\$197,437	(\$68,022)	(\$28,803)	(\$27,581)	(\$9,982)
2026	\$90,835	\$161,798	\$197,191	(\$68,871)	(\$29,282)	(\$28,340)	(\$10,996)
2027	\$90,818	\$161,781	\$197,173	(\$69,268)	(\$29,498)	(\$28,694)	(\$11,333)
2028	\$90,651	\$161,614	\$197,007	(\$69,419)	(\$29,572)	(\$28,829)	(\$11,458)
2029	\$89,777	\$160,737	\$196,133	(\$74,168)	(\$32,324)	(\$33,071)	(\$15,281)
2030	\$89,314	\$160,272	\$195,669	(\$75,437)	(\$33,049)	(\$34,204)	(\$16,398)
2031	\$73,782	\$159,494	\$113,688	(\$78,555)	(\$34,850)	(\$36,989)	(\$19,564)
2032	\$0	\$158,610	\$0	(\$82,104)	(\$36,903)	(\$40,158)	(\$23,152)
2033	\$0	\$13,135	\$0	(\$86,089)	(\$39,210)	(\$43,717)	(\$27,166)
2034	\$0	\$0	\$0	(\$90,513)	(\$41,773)	(\$47,669)	(\$31,610)
2035	\$0	\$0	\$0	(\$95,384)	(\$44,596)	(\$52,019)	(\$36,490)
2036	\$0	\$0	\$0	(\$100,705)	(\$47,682)	(\$56,771)	(\$41,811)
2037	\$0	\$0	\$0	(\$106,483)	(\$51,034)	(\$61,932)	(\$47,579)
2038	\$0	\$0	\$0	(\$111,292)	(\$53,822)	(\$66,227)	(\$52,400)
2039	\$0	\$0	\$0	(\$97,066)	(\$47,359)	(\$59,049)	(\$47,991)
2040	\$0	\$0	\$0	\$0	\$0	\$0	\$0
Total	\$1,260,028	\$2,426,967	\$2,682,554	(\$1,525,576)	(\$670,756)	(\$699,111)	(\$358,480)
NPV (7%, 2018)	\$788,794	\$1,464,858	\$1,693,151	(\$644,933)	(\$273,929)	(\$265,487)	(\$100,547)

	CERFP - Hope Farm Solar Project	CERFP - Scituate Solar Project	CERFP - Wood's Hill Solar	CERFP - Cassadaga Wind Project	Totals by Year
Year	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost	Above Market Cost
2018	\$0	\$0	\$0	\$0	\$27,422,522
2019	\$0	\$0	\$0	\$0	\$21,429,164
2020	\$24,603	\$24,603	\$20,434	\$0	\$30,243,891
2021	\$69,482	\$69,482	\$33,316	\$487,070	\$37,509,833
2022	\$77,707	\$77,707	\$35,570	\$553,418	\$40,549,948
2023	\$53,679	\$53,679	\$28,221	\$339,244	\$40,609,002
2024	\$46,602	\$46,602	\$26,118	\$278,368	\$42,267,895
2025	\$27,198	\$27,198	\$20,526	\$115,386	\$42,624,604
2026	\$25,895	\$25,895	\$20,132	\$104,539	\$44,582,890
2027	\$25,804	\$25,804	\$20,001	\$101,322	\$46,970,104
2028	\$24,923	\$24,923	\$19,952	\$100,331	\$41,313,892
2029	\$20,302	\$20,302	\$18,467	\$57,555	\$32,123,091
2030	\$17,854	\$17,854	\$18,033	\$45,377	\$33,321,318
2031	\$13,752	\$13,752	\$16,803	\$9,978	\$34,703,395
2032	\$9,095	\$9,095	\$15,409	(\$30,188)	\$35,726,742
2033	\$3,875	\$3,875	\$13,850	(\$75,171)	\$37,047,722
2034	(\$1,913)	(\$1,913)	\$12,123	(\$125,025)	\$36,096,075
2035	(\$8,275)	(\$8,275)	\$10,227	(\$179,808)	\$37,613,512
2036	(\$15,220)	(\$15,220)	\$8,160	(\$239,582)	\$35,330,317
2037	(\$22,755)	(\$22,755)	\$5,919	(\$304,414)	(\$611,033)
2038	(\$29,050)	(\$29,050)	\$4,046	(\$358,553)	(\$696,348)
2039	(\$35,832)	(\$35,832)	\$2,030	(\$416,867)	(\$737,966)
2040	\$0	\$0	\$0	(\$479,388)	(\$479,388)
Total	\$327,726	\$327,726	\$349,340	(\$16,408)	\$694,961,182
NPV (7%, 2018)	\$246,277	\$246,277	\$189,632	\$881,106	\$371,284,308

PUC 11-2

Request:

For each project listed in the Company's response to PUC-9-1, please provide the total contract cost and the annual financial remuneration National Grid expects to receive for each contract for each year. Please include column totals on the spreadsheets in addition to the row totals already provided.

Response:

Please see Attachment PUC 11-2(a) and Attachment PUC 11-2(b). Attachment PUC 11-2(a) contains a summary of the contract cost and annual financial remuneration for the long-term contracts and distributed generation standard contracts by year. Attachment PUC 11-2(b) contains a detailed listing of the contract cost and annual financial remuneration by unit.

Year	Long-term Contracts		DG Standard Contracts		Clean Energy RFP		Totals by Year	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration	Total Contract Cost	Total Remuneration
2018	\$64,985,729	\$1,787,108	\$6,805,229	\$187,144	\$0	\$0	\$71,790,957	\$1,974,251
2019	\$82,183,260	\$2,260,040	\$6,830,268	\$187,832	\$302,928	\$8,331	\$89,316,455	\$2,456,203
2020	\$84,427,203	\$2,321,748	\$6,830,268	\$187,832	\$3,565,968	\$98,064	\$94,823,439	\$2,607,645
2021	\$86,735,513	\$2,385,227	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$103,506,282	\$2,846,423
2022	\$89,110,121	\$2,450,528	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$105,880,890	\$2,911,724
2023	\$91,553,019	\$2,517,708	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$108,323,789	\$2,978,904
2024	\$94,066,260	\$2,586,822	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$110,837,029	\$3,048,018
2025	\$96,651,963	\$2,657,929	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$113,422,732	\$3,119,125
2026	\$99,312,312	\$2,731,089	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$116,083,081	\$3,192,285
2027	\$102,049,559	\$2,806,363	\$6,830,268	\$187,832	\$9,940,502	\$273,364	\$118,820,328	\$3,267,559
2028	\$88,743,224	\$2,440,439	\$6,002,155	\$165,059	\$9,940,502	\$273,364	\$104,685,881	\$2,878,862
2029	\$65,298,734	\$1,795,715	\$2,511,304	\$69,061	\$9,940,502	\$273,364	\$77,750,540	\$2,138,140
2030	\$67,236,815	\$1,849,012	\$1,518,843	\$41,768	\$9,940,502	\$273,364	\$78,696,160	\$2,164,144
2031	\$69,235,781	\$1,903,984	\$897,534	\$24,682	\$9,940,502	\$273,364	\$80,073,817	\$2,202,030
2032	\$69,817,036	\$1,919,968	\$300,468	\$8,263	\$9,940,502	\$273,364	\$80,058,005	\$2,201,595
2033	\$68,566,759	\$1,885,586	\$25,039	\$689	\$9,940,502	\$273,364	\$78,532,300	\$2,159,638
2034	\$50,049,587	\$1,376,364	\$0	\$0	\$9,940,502	\$273,364	\$59,990,089	\$1,649,727
2035	\$51,801,323	\$1,424,536	\$0	\$0	\$9,940,502	\$273,364	\$61,741,825	\$1,697,900
2036	\$48,787,021	\$1,341,643	\$0	\$0	\$9,940,502	\$273,364	\$58,727,523	\$1,615,007
2037	\$0	\$0	\$0	\$0	\$9,940,502	\$273,364	\$9,940,502	\$273,364
2038	\$0	\$0	\$0	\$0	\$9,940,502	\$273,364	\$9,940,502	\$273,364
2039	\$0	\$0	\$0	\$0	\$9,637,574	\$265,033	\$9,637,574	\$265,033
2040	\$0	\$0	\$0	\$0	\$6,374,534	\$175,300	\$6,374,534	\$175,300
Totals	\$1,470,611,219	\$40,441,809	\$79,532,981	\$2,187,157	\$198,810,035	\$5,467,276	\$1,748,954,234	\$48,096,241
NPV (7%, 2018)	\$831,970,170	\$22,879,180	\$53,011,900	\$1,457,827	\$88,319,056	\$2,428,774	\$973,301,127	\$26,765,781

Notes:

- RI LTC, RI DG & RI CERFP Contracts as of February 2018; approximately 88.1% of the 90 MW minimum requirement. RI CERFP PPAs received approval at the Open Meeting on 2/15/2018.
- Above market cost is calculated using market price forecasts for Energy, Capacity and RECs provided by ESAI in December 2016.
- Capacity factors for the FCM, commercial operation dates, and annual output have been estimated for the given projects' technology and location.

Year	Deepwater Wind 30 MW		Rhode Island Landfill Gas GenCo 32MW		Orbit Energy HSAD Biogas 3.2 MW (\$95)	
	Contract Cost less Outperform Adj Credit	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$28,863,893	\$793,757	\$29,690,858	\$816,499	\$2,244,204	\$61,716
2019	\$29,874,128	\$821,539	\$30,433,129	\$836,911	\$2,289,088	\$62,950
2020	\$30,919,723	\$850,292	\$31,193,957	\$857,834	\$2,334,870	\$64,209
2021	\$32,001,913	\$880,053	\$31,973,806	\$879,280	\$2,381,567	\$65,493
2022	\$33,121,981	\$910,854	\$32,773,151	\$901,262	\$2,429,199	\$66,803
2023	\$34,281,250	\$942,734	\$33,592,480	\$923,793	\$2,477,783	\$68,139
2024	\$35,481,093	\$975,730	\$34,432,292	\$946,888	\$2,527,338	\$69,502
2025	\$36,722,932	\$1,009,881	\$35,293,099	\$970,560	\$2,577,885	\$70,892
2026	\$38,008,234	\$1,045,226	\$36,175,427	\$994,824	\$2,629,443	\$72,310
2027	\$39,338,522	\$1,081,809	\$37,079,813	\$1,019,695	\$2,682,032	\$73,756
2028	\$40,715,372	\$1,119,673	\$22,170,638	\$609,693	\$2,735,672	\$75,231
2029	\$42,140,409	\$1,158,861	\$0	\$0	\$2,790,386	\$76,736
2030	\$43,615,323	\$1,199,421	\$0	\$0	\$2,846,193	\$78,270
2031	\$45,141,859	\$1,241,401	\$0	\$0	\$2,903,117	\$79,836
2032	\$46,721,825	\$1,284,850	\$0	\$0	\$1,480,590	\$40,716
2033	\$48,357,089	\$1,329,820	\$0	\$0	\$0	\$0
2034	\$50,049,587	\$1,376,364	\$0	\$0	\$0	\$0
2035	\$51,801,323	\$1,424,536	\$0	\$0	\$0	\$0
2036	\$48,787,021	\$1,341,643	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$755,943,479	\$20,788,446	\$354,808,650	\$9,757,238	\$37,329,366	\$1,026,558
NPV (7%, 2018)	\$384,956,746	\$10,586,311	\$240,980,303	\$6,626,958	\$22,452,784	\$617,452

Notes:

- RI LTC, RI DG & RI CERFP Contracts as of February 2018; approximately 88.1% of the 90 MW minimum requirement. RI CERFP PPAs received approval at the Open Meeting on 2/15/2018.
- Above market cost is calculated using market price forecasts for Energy, Capacity and RECs provided by ESAI in December 2016.
- Capacity factors for the FCM, commercial operation dates, and annual output have been estimated for the given projects' technology and location.

Year	Black Bear Hydro 3.958 MW		Copenhagen Wind 79.9 MW	
	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$2,821,676	\$77,596	\$1,365,098	\$37,540
2019	\$2,878,110	\$79,148	\$16,708,805	\$459,492
2020	\$2,935,672	\$80,731	\$17,042,981	\$468,682
2021	\$2,994,385	\$82,346	\$17,383,841	\$478,056
2022	\$3,054,273	\$83,993	\$17,731,517	\$487,617
2023	\$3,115,358	\$85,672	\$18,086,148	\$497,369
2024	\$3,177,666	\$87,386	\$18,447,871	\$507,316
2025	\$3,241,219	\$89,134	\$18,816,828	\$517,463
2026	\$3,306,043	\$90,916	\$19,193,165	\$527,812
2027	\$3,372,164	\$92,735	\$19,577,028	\$538,368
2028	\$3,152,974	\$86,707	\$19,968,569	\$549,136
2029	\$0	\$0	\$20,367,940	\$560,118
2030	\$0	\$0	\$20,775,299	\$571,321
2031	\$0	\$0	\$21,190,805	\$582,747
2032	\$0	\$0	\$21,614,621	\$594,402
2033	\$0	\$0	\$20,209,670	\$555,766
2034	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0
Totals	\$34,049,540	\$936,362	\$288,480,185	\$7,933,205
NPV (7%, 2018)	\$22,961,037	\$631,429	\$160,619,299	\$4,417,031

Year	RI DG - Plain Meeting House Solar 2 MW		RI DG - ACP 28 Jacome Way 500 kW		RI DG - North Kingstown Green Wind 1.5 MW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2019	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2020	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2021	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2022	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2023	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2024	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2025	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2026	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2027	\$674,520	\$18,549	\$193,771	\$5,329	\$385,922	\$10,613
2028	\$393,470	\$10,820	\$113,033	\$3,108	\$64,320	\$1,769
2029	\$0	\$0	\$0	\$0	\$0	\$0
2030	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$7,138,670	\$196,313	\$2,050,745	\$56,395	\$3,923,538	\$107,897
NPV (7%, 2018)	\$4,924,481	\$135,423	\$1,414,669	\$38,903	\$2,741,111	\$75,381

Year	RI DG - Forbes Street Solar 3.7 MW		RI DG - West Davisville Solar 2.34 MW		RI DG - 100 Dupont 1.5 MW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2019	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2020	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2021	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2022	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2023	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2024	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2025	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2026	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2027	\$1,087,437	\$29,905	\$680,108	\$18,703	\$384,476	\$10,573
2028	\$1,087,437	\$29,905	\$623,433	\$17,144	\$384,476	\$10,573
2029	\$0	\$0	\$0	\$0	\$96,119	\$2,643
2030	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$11,961,803	\$328,950	\$7,424,515	\$204,174	\$4,325,360	\$118,947
NPV (7%, 2018)	\$8,154,333	\$224,244	\$5,072,984	\$139,507	\$2,925,741	\$80,458

Year	RI DG - Altus Comtram Cable Plant 499 kW		RI DG - Cox Comm 181 kW		RI DG - 0 Martin 500 kW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2019	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2020	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2021	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2022	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2023	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2024	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2025	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2026	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2027	\$193,384	\$5,318	\$70,145	\$1,929	\$193,771	\$5,329
2028	\$145,038	\$3,989	\$70,145	\$1,929	\$193,771	\$5,329
2029	\$0	\$0	\$11,691	\$321	\$48,443	\$1,332
2030	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$2,078,874	\$57,169	\$783,288	\$21,540	\$2,179,926	\$59,948
NPV (7%, 2018)	\$1,427,152	\$39,247	\$531,187	\$14,608	\$1,474,536	\$40,550

Year	RI DG - 225 Dupont 300 kW		RI DG - 35 Martin 500 kW		RI DG - Cox Comm 498 kW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2019	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2020	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2021	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2022	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2023	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2024	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2025	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2026	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2027	\$116,263	\$3,197	\$193,771	\$5,329	\$192,996	\$5,307
2028	\$116,263	\$3,197	\$193,771	\$5,329	\$160,830	\$4,423
2029	\$29,066	\$799	\$48,443	\$1,332	\$0	\$0
2030	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$1,307,956	\$35,969	\$2,179,926	\$59,948	\$2,090,791	\$57,497
NPV (7%, 2018)	\$884,722	\$24,330	\$1,474,536	\$40,550	\$1,431,933	\$39,378

Year	RI DG - Brickle Group 1.08 MW		RI DG - Gannon & Scott 406 kW		RI DG - All American Solar 331 kW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2019	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2020	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2021	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2022	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2023	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2024	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2025	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2026	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2027	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2028	\$245,809	\$6,760	\$141,409	\$3,889	\$115,287	\$3,170
2029	\$225,325	\$6,196	\$47,136	\$1,296	\$96,072	\$2,642
2030	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$2,929,228	\$80,554	\$1,602,633	\$44,072	\$1,364,224	\$37,516
NPV (7%, 2018)	\$1,943,291	\$53,441	\$1,081,308	\$29,736	\$907,153	\$24,947

Year	RI DG - TEAM 182 kW		RI DG - CMS 128 kW		RI DG - Newport Vineyard 53 kW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2019	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2020	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2021	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2022	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2023	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2024	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2025	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2026	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2027	\$64,283	\$1,768	\$45,210	\$1,243	\$19,467	\$535
2028	\$64,283	\$1,768	\$37,675	\$1,036	\$19,467	\$535
2029	\$58,926	\$1,620	\$0	\$0	\$17,845	\$491
2030	\$0	\$0	\$0	\$0	\$0	\$0
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$766,039	\$21,066	\$489,775	\$13,469	\$231,985	\$6,380
NPV (7%, 2018)	\$508,201	\$13,976	\$335,435	\$9,224	\$153,902	\$4,232

Year	RI DG - Johnston Solar I 1.7 MW		RI DG - Randall Steere Farm 91 kW		RI DG - Nexamp 76 Stilson Rd 498 kW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2019	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2020	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2021	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2022	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2023	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2024	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2025	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2026	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2027	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2028	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2029	\$364,854	\$10,033	\$33,424	\$919	\$119,022	\$3,273
2030	\$212,832	\$5,853	\$8,356	\$230	\$19,837	\$546
2031	\$0	\$0	\$0	\$0	\$0	\$0
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$4,591,080	\$126,255	\$409,442	\$11,260	\$1,448,106	\$39,823
NPV (7%, 2018)	\$2,986,238	\$82,122	\$268,942	\$7,396	\$953,589	\$26,224

Year	RI DG - North Kingstown Solar 1720 Davisville Rd 500 kW		RI DG - SER Solar 23 Appian Way 52 kW		RI DG - Foster Solar - 23 Theodore Foster Drive 1.3 MW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2019	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2020	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2021	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2022	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2023	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2024	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2025	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2026	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2027	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2028	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2029	\$116,508	\$3,204	\$17,701	\$487	\$315,783	\$8,684
2030	\$97,090	\$2,670	\$0	\$0	\$315,783	\$8,684
2031	\$0	\$0	\$0	\$0	\$210,522	\$5,789
2032	\$0	\$0	\$0	\$0	\$0	\$0
2033	\$0	\$0	\$0	\$0	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$1,495,186	\$41,118	\$212,417	\$5,841	\$4,315,696	\$118,682
NPV (7%, 2018)	\$965,675	\$26,556	\$140,597	\$3,866	\$2,720,845	\$74,823

Year	RI DG - Brookside Equestrian Center - 90 Tiff Rd 1.2 MW		RI DG - 200 Frenchtown Road Solar 1.25 MW		RI DG - Wilco 260 South County Trail 1.246 MW	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$229,061	\$6,299	\$275,429	\$7,574	\$335,417	\$9,224
2019	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2020	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2021	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2022	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2023	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2024	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2025	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2026	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2027	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2028	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2029	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2030	\$229,061	\$6,299	\$300,468	\$8,263	\$335,417	\$9,224
2031	\$190,884	\$5,249	\$300,468	\$8,263	\$195,660	\$5,381
2032	\$0	\$0	\$300,468	\$8,263	\$0	\$0
2033	\$0	\$0	\$25,039	\$689	\$0	\$0
2034	\$0	\$0	\$0	\$0	\$0	\$0
2035	\$0	\$0	\$0	\$0	\$0	\$0
2036	\$0	\$0	\$0	\$0	\$0	\$0
2037	\$0	\$0	\$0	\$0	\$0	\$0
2038	\$0	\$0	\$0	\$0	\$0	\$0
2039	\$0	\$0	\$0	\$0	\$0	\$0
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$3,168,682	\$87,139	\$4,507,020	\$123,943	\$4,556,077	\$125,292
NPV (7%, 2018)	\$1,988,443	\$54,682	\$2,721,717	\$74,847	\$2,879,176	\$79,177

Year	Sanford Airport Solar Project		Chinook Solar Project		Farmington Solar Project	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$0	\$0	\$0	\$0	\$0	\$0
2019	\$82,831	\$2,278	\$50,132	\$1,379	\$79,507	\$2,186
2020	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2021	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2022	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2023	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2024	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2025	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2026	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2027	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2028	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2029	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2030	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2031	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2032	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2033	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2034	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2035	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2036	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2037	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2038	\$496,987	\$13,667	\$300,789	\$8,272	\$477,042	\$13,119
2039	\$414,156	\$11,389	\$250,658	\$6,893	\$397,535	\$10,932
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$9,939,746	\$273,343	\$6,015,789	\$165,434	\$9,540,840	\$262,373
NPV (7%, 2018)	\$4,652,386	\$127,941	\$2,815,743	\$77,433	\$4,465,674	\$122,806

Year	Quinebaug Solar Project		Hope Farm Solar Project		Scituate Solar Project	
	Contract Cost	Remuneration	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$0	\$0	\$0	\$0	\$0	\$0
2019	\$90,458	\$2,488	\$0	\$0	\$0	\$0
2020	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2021	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2022	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2023	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2024	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2025	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2026	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2027	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2028	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2029	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2030	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2031	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2032	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2033	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2034	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2035	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2036	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2037	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2038	\$542,748	\$14,926	\$756,566	\$20,806	\$756,566	\$20,806
2039	\$452,290	\$12,438	\$756,566	\$20,806	\$756,566	\$20,806
2040	\$0	\$0	\$0	\$0	\$0	\$0
Totals	\$10,854,962	\$298,511	\$15,131,330	\$416,112	\$15,131,330	\$416,112
NPV (7%, 2018)	\$5,080,761	\$139,721	\$7,000,678	\$192,519	\$7,000,678	\$192,519

Year	Wood's Hill Solar		Cassadaga Wind Project	
	Contract Cost	Remuneration	Contract Cost	Remuneration
2018	\$0	\$0	\$0	\$0
2019	\$0	\$0	\$0	\$0
2020	\$235,268	\$6,470	\$0	\$0
2021	\$235,268	\$6,470	\$6,374,534	\$175,300
2022	\$235,268	\$6,470	\$6,374,534	\$175,300
2023	\$235,268	\$6,470	\$6,374,534	\$175,300
2024	\$235,268	\$6,470	\$6,374,534	\$175,300
2025	\$235,268	\$6,470	\$6,374,534	\$175,300
2026	\$235,268	\$6,470	\$6,374,534	\$175,300
2027	\$235,268	\$6,470	\$6,374,534	\$175,300
2028	\$235,268	\$6,470	\$6,374,534	\$175,300
2029	\$235,268	\$6,470	\$6,374,534	\$175,300
2030	\$235,268	\$6,470	\$6,374,534	\$175,300
2031	\$235,268	\$6,470	\$6,374,534	\$175,300
2032	\$235,268	\$6,470	\$6,374,534	\$175,300
2033	\$235,268	\$6,470	\$6,374,534	\$175,300
2034	\$235,268	\$6,470	\$6,374,534	\$175,300
2035	\$235,268	\$6,470	\$6,374,534	\$175,300
2036	\$235,268	\$6,470	\$6,374,534	\$175,300
2037	\$235,268	\$6,470	\$6,374,534	\$175,300
2038	\$235,268	\$6,470	\$6,374,534	\$175,300
2039	\$235,268	\$6,470	\$6,374,534	\$175,300
2040	\$0	\$0	\$6,374,534	\$175,300
Totals	\$4,705,364	\$129,397	\$127,490,676	\$3,505,994
NPV (7%, 2018)	\$2,176,989	\$59,867	\$55,126,148	\$1,515,969

PUC 11-3

Request:

For each contract entered into under the Long Term Contracting for Renewable Energy statute (not including distributed generation) for which commercial operation has not begun, please provide an update as to the status, including copies of any extensions that may have been executed and which have not already been filed with the PUC.

Response:

Copenhagen Wind

On December 29, 2017, EDF Renewable Energy provided a progress report for activities performed during the fourth quarter of 2017. According to that progress report, construction started on September 5, 2017, with surveying activities and road work. All tree clearing has been completed. As of December 23, 2017, 85 percent of the access roads have been built. Construction was halted for winter and will restart in mid-April, weather permitting. Permit and real property and site control access is ongoing. The expected Commercial Operation Date for this project is November 30, 2018.

Rhode Island Clean Energy RFP Power Purchase Agreements (PPAs)

- ***Sanford Airport Solar, LLC***
- ***Chinook Solar, LLC***
- ***Farmington Solar, LLC***
- ***Quinebaug Solar, LLC***
- ***Hope Farm Solar, LLC***
- ***Scituate RI Solar, LLC***
- ***Woods Hill Solar, LLC***
- ***Cassadaga Wind LLC***

The Public Utilities Commission approved the PPAs listed above at its Open Meeting on February 15, 2018.