Appendix Item 1.a. Page 1 of 3

Request No. 1.a:

Provide a schedule of the calculation of the 12-month average line loss, by month, for the period under review.

Response:

Please note that Blue Grass Energy provides service for one direct-serve customer. There is no line loss for that particular customer. Line loss is computed by taking the total kWh for the system less the kWh totals for that customer.

Please see the following pages for the calculation of the 12-month average line loss, by month, for November 1, 2016 through October 31, 2018.

Blue Grass Energy PSC Case No. 2019-00008 Response to Commision Staff's Request

Appendix Item 1.a. Page 2 of 3

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			Office	Line	Percent
Month	Purchases	Sales	Use	Loss	Line Loss
Balance Forward	1,253,914,419	1,187,857,536	1,095,790	64,961,093	5.181%
Less 10/2015	82,917,757	81,451,726	97,522	1,368,509	
Plus 10/2016	82,944,175	87,371,776	89,976	(4,517,577)	
Balance Forward	1,253,940,837	1,193,777,586	1,088,244	59,075,007	4.711%
Less 11/2015	91,596,963	82,038,030	99,794	9,459,139	
Plus 11/2016	92,520,561	82,203,605	93,327	10,223,629	
For 11/2016	1,254,864,435	1,193,943,161	1,081,777	59,839,497	4.769%
Less 12/2015	101,508,064	93,364,462	117,733	8,025,869	
Plus 12/2016	129,264,102	103,493,272	129,459	25,641,371	
For 12/2016	1,282,620,473	1,204,071,971	1,093,503	77,454,999	6.039%
Less 1/2016	143,474,372	110,336,229	183,737	32,954,406	
Plus 1/2014	124,790,688	122,973,817	150,238	1,666,633	
For 1/2014	1,263,936,789	1,216,709,559	1,060,004	46,167,226	3.653%
Less 2/2016	120,133,668	133,067,958	160,872	(13,095,162)	
Plus 2/2017	97,691,445	112,692,655	110,634	(15,111,844)	
For 2/2017	1,241,494,566	1,196,334,256	1,009,766	44,150,544	3.556%
Less 3/2016	95,304,417	102,952,366	114,388	(7,762,337)	
Plus 3/2017	104,931,983	91,878,130	114,756	12,939,097	
For 3/2017	1,251,122,132	1,185,260,020	1,010,134	64,851,978	5.184%
Less 4/2016	85,979,826	88,149,106	94,140	(2,263,420)	
Plus 4/2017	82,926,846	91,117,498	84,023	(8,274,675)	
For 4/2017	1,248,069,152	1,188,228,412	1,000,017	58,840,723	4.715%
Less 5/2016	86,308,003	78,381,108	86,583	7,840,312	
Plus 5/2017	89,029,797	79,285,735	88,364	9,655,698	
For 5/2017	1,250,790,946	1,189,133,039	1,001,798	60,656,109	4.849%
Less 6/2016	105,480,296	89,377,612	91,688	16,010,996	······
Plus 6/2017	99,894,477	89,379,777	89,083	10,425,617	
For 6/2017	1,245,205,127	1,189,135,204	999,193	55,070,730	4.423%
Less 7/2016	115,941,788	103,326,209	99,224	12,516,355	
Plus 7/2017	115,576,511	100,479,356	89,559	15,007,596	
For 7/2017	1,244,839,850	1,186,288,351	989,528	57,561,971	4.624%
Less 8/2016	120,071,579	113,671,138	102,627	6,297,814	
Plus 8/2017	105,833,238	107,431,969	97,325	(1,696,056)	
For 8/2017	1,230,601,509	1,180,049,182	984,226	49,568,101	4.028%
Less 9/2016	99,833,847	110,403,124	94,479	(10,663,756)	
Plus 9/2017	88,449,876	94,340,954	88,902	(5,979,980)	
For 9/2017	1,219,217,538	1,163,987,012	978,649	54,251,877	4.450%
Less 10/2016	82,944,175	87,371,776	89,976	(4,517,577)	
Plus 10/2017	86,797,682	84,135,935	97,215	2,564,532	
For 10/2017	1,223,071,045	1,160,751,171	985,888	61,333,986	5.015%
Less 11/2016	92,520,561	82,203,605	93,327	10,223,629	5.01070
Plus 11/2017	99,979,278	87,633,344	103,054	12,242,880	
For 11/2017	1,230,529,762	1,166,180,910	995,615	63,353,237	5.148%
		1,100,100,310	535,013	102,002,207	5.14070

Blue Grass Energy PSC Case No. 2019-00008 Response to Commision Staff's Request

Appendix Item 1.a. Page 3 of 3

Less 12/2016	129,264,102	103,493,272	129,459	25,641,371	
Plus 12/2017	136,375,804	106,446,190	140,262	29,789,352	
For 12/2017	1,237,641,464	1,169,133,828	1,006,418	67,501,218	5.454%
Less 1/2017	124,790,688	122,973,817	150,238	1,666,633	
Plus 1/2018	159,531,454	148,088,399	174,081	11,268,974	
For 1/2018	1,272,382,230	1,194,248,410	1,030,261	77,103,559	6.060%
Less 2/2017	97,691,445	112,692,655	110,634	(15,111,844)	
Plus 2/2018	106,221,213	134,644,210	130,449	(28,553,446)	
For 2/2018	1,280,911,998	1,216,199,965	1,050,076	63,661,957	4.970%
Less 3/2017	104,931,983	91,878,130	114,756	12,939,097	
Plus 3/2018	115,121,223	96,662,637	125,377	18,333,209	
For 3/2018	1,291,101,238	1,220,984,472	1,060,697	69,056,069	5.349%
Less 4/2017	82,926,846	91,117,498	84,023	(8,274,675)	
Plus 4/2018	93,494,750	104,212,585	102,635	(10,820,470)	
For 4/2018	1,301,669,142	1,234,079,559	1,079,309	66,510,274	5.110%
Less 5/2017	89,029,797	79,285,735	88,364	9,655,698	
Plus 5/2018	98,874,671	84,454,068	93,865	14,326,738	
For 5/2018	1,311,514,016	1,239,247,892	1,084,810	71,181,314	5.427%
Less 6/2017	99,894,477	89,379,777	89,083	10,425,617	
Plus 6/2018	107,387,350	99,648,456	89,637	7,649,257	
For 6/2018	1,319,006,889	1,249,516,571	1,085,364	68,404,954	5.186%
Less 7/2017	115,576,511	100,479,356	89,559	15,007,596	
Plus 7/2018	113,979,077	106,999,211	100,557	6,879,309	
For 7/2018	1,317,409,455	1,256,036,426	1,096,362	60,276,667	4.575%
Less 8/2017	105,833,238	107,431,969	97,325	(1,696,056)	
Plus 8/2018	112,539,959	106,201,013	99,455	6,239,491	
For 8/2018	1,324,116,176	1,254,805,470	1,098,492	68,212,214	5.152%
Less 9/2017	88,449,876	94,340,954	88,902	(5,979,980)	
Plus 9/2018	99,290,378	106,679,823	91,958	(7,481,403)	
For 9/2018	1,334,956,678	1,267,144,339	1,101,548	66,710,791	4.997%
Less 10/2017	86,797,682	84,135,935	97,215	2,564,532	
Plus 10/2018	94,618,108	91,232,054	96,345	3,289,709	
For 10/2018	1,342,777,104	1,274,240,458	1,100,678	67,435,968	5.022%

Average Line Loss for the Period from November 1, 2016 to October 31, 2018 is

4.899%

Blue Grass Energy PSC Case No. 2019-00008 Response to Commission Staff's Request Appendix Item 1.b. Page 1 of 1

Request No. 1.b:

Describe the measures that have been taken to reduce line less during the period in review.

Response:

Blue Grass Energy is continuing to upgrade and/or replace aging conductor with in many cases, larger wire size conductor as total system demand increases. Blue Grass continues to replace aging direct bury cable with low loss underground cable.

Blue Grass Energy is working to improve losses through power factor correction. The focus has been on all commercial and industrial sites.

All meters are AMI type meters and most have usage readings collected and stored on a daily basis. This allows Blue Grass Energy to better identify power diversion.

Blue Grass Energy uses electronic data query and physical observation to identify and de-energize and/or remove transformers serving inactive accounts.

New transformers purchased are more energy efficient than ones being replaced and Blue Grass Energy makes a concerted effort to "properly size" transformers thereby reducing line loss.

Blue Grass Energy continues its program of Right-of-Way clearing and is on a six year cycle. In addition, line inspection occurs on a bi-annual basis and those inspectors identify any ROW issues that have occurred since the last ROW trimming.