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1 **Load and Revenue Forecast**

2 **Ex.3/Tab 1/Sch.1 - Introduction**

3 The evidence presented in this exhibit provides information supporting the revenues derived
4 from activities regulated by the Ontario Energy Board (“The Board”). Actual operating revenues
5 from regulated operations are derived mainly from fixed and variable tariff charges and specific
6 service charges. Revenues are collected from five (5) customer classes: Residential, General
7 Service Less than 50 kW (“GS<50 kW”), General Service Greater than 50 kW (“GS>50” kW),
8 Unmetered Scattered Load (“USL”) and Street Lighting. Wasaga Distribution Inc. (“WDI”) does
9 not anticipate any changes in its customer classes. Although for the purpose of load forecasting,
10 WDI choose to separate Wholesale Market Participant(s) (“WMP”) from the GS> 50 kW
11 customer class to assist with accurately calculating WDI’s Cost of Power. Furthermore, WDI
12 used the forecasted billed kWh for the WMP in Exhibit 9 for the Rate Rider Calculations.

13
14 This exhibit also describes WDI’s load and customer forecasts. The load forecast methodology
15 and assumptions are described in detail within this exhibit.

16
17 The evidence herein is organized according to the following topics:

- 18 1) Revenue and Load Forecast
19 2) Accuracy of Load Forecast and Variance Analysis, and
20 3) Other Revenues

21
22

Ex.3/Tab 1/Sch.2 - Overview of Revenue Forecast

Table 3.1 illustrates WDI's operating revenue for 2012 Board Approved, 2012 Actual, 2013 Actual, 2014 Actual, 2015 Forecast, and the 2016 Test Year. This Exhibit provides a detailed variance analysis by rate class of the operating revenue components. Distribution revenue excludes revenue from commodity sales. This exhibit also provides supporting evidence for the load forecast.

WDI is proposing a total Service Revenue Requirement of \$4,614,578 for the 2016 Test Year. This amount includes a Base Revenue Requirement of \$4,140,201 plus revenue offsets of \$474,377 to be recovered through Other Distribution Revenue.

A summary of all operating revenue is presented and provides a comparison of total revenues from the 2012 OEB approved year to the 2016 Test Year.

Table 3.1 – Distribution Revenue

Distribution Revenue	2012 Board Approved	2012 Actual	2013 Actual	2014 Actual	2015 Bridge Year	2016 Test Year
Residential	2,736,793	2,845,993	2,814,224	2,900,856	2,966,889	3,394,193
GS <50kW	355,201	341,648	335,626	363,519	352,382	410,325
GS>50kW	241,789	244,390	237,426	235,385	247,597	274,877
Streetlights	46,952	11,636	51,147	53,196	54,260	56,720
Unmetered Scattered Load	4,302.00	6,820.00	3,958.00	3,805.00	4,062.00	4,086
Total Distribution Revenue	3,385,037	3,450,487	3,442,381	3,556,761	3,625,190	4,140,201

Other Distribution Revenue	2012 Board Approved	2012 Actual	2013 Actual	2014 Actual	2015 Bridge Year	2016 Test Year
Specific Service Charges	106,012	114,733	107,085	109,995	111,150	113,010
Late Payment Charges	32,000	30,948	28,227	32,120	32,565	32,565
Other Operating Revenues	339,656	350,555	359,141	351,959	357,217	358,254
Other Income or Deductions	105,230	140,061	64,560	37,392	22,225	- 29,452
Total Other Distribution Revenue	582,898	636,297	559,013	531,466	523,157	474,377

Total Operating Revenue	3,967,935	4,086,784	4,001,394	4,088,227	4,148,347	4,614,578
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1 **Ex.3/Tab 1/Sch.3 - Proposed Load Forecast**

2 The following section of the application covers the approach taken to determine the Load
3 Forecast. This section also covers economic assumptions and data sources for customer and
4 load forecasts. It explains wholesale purchases and subsequent adjustments to the wholesale
5 purchases. It also provides the rationale behind each variable used in the regression analysis.
6 Lastly, it presents the regression results and explains how they were used to determine the
7 forecast for the bridge and test year.

8

9 Table 3.2 below presents the 2005-2014 actual and 2015-2016 weather normalized forecast
10 trends for customer/connection counts, kWh consumption and billed kW demand.

11

12

13

1

Table 3.2: Customer and Volume Trend Table

Customer Usage											
Year	Residential	General Service < 50 kW	General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant		General Service > 50 kW - 4999 kW - Wholesale Market Participant		Street lighting		Unmetered Scattered Load	Total	
	kWh	kWh	kWh	kW	kWh	kW	kWh	kW	kWh	kWh	kW
2005	74,670,218	14,537,477	12,388,794	0	994,199	0	1,506,679	0	264,617	104,361,984	0
2006	73,494,501	14,223,774	12,633,564	0	4,233,264	0	1,581,465	0	255,784	106,422,351	0
2007	74,223,887	14,339,658	14,970,174	0	4,141,944	0	1,649,563	0	220,922	109,546,147	0
2008	78,678,925	15,092,313	17,386,049	0	4,099,393	0	1,743,400	0	173,292	117,173,372	0
2009	82,719,010	15,369,940	16,872,488	43,812	4,143,210	7,024	1,723,126	4,963	255,272	121,138,844	55,798
2010	84,575,464	17,287,125	17,629,407	44,116	4,263,663	7,301	1,736,181	4,976	322,731	125,870,964	56,393
2011	84,023,443	16,948,879	17,073,810	45,359	4,201,223	7,186	1,695,783	5,015	310,190	124,310,887	57,559
2012	82,588,039	15,746,950	17,613,528	47,595	3,761,856	6,699	1,731,442	5,203	264,550	121,765,860	59,497
2013	86,276,532	16,432,348	17,691,775	46,867	3,594,884	6,557	1,796,174	5,311	250,496	126,100,943	58,734
2014	87,611,190	16,552,639	17,311,423	45,989	3,453,199	6,080	1,834,663	5,426	247,974	127,068,585	57,496
2015	87,658,890	16,789,532	17,321,372	45,614	3,592,944	6,315	1,222,298	3,604	232,411	126,817,449	55,532
2016	87,540,339	17,037,738	17,364,124	45,726	3,538,626	6,220	611,285	1,802	221,022	126,366,883	53,748

Customer Counts/Customer Connections							
Year	Residential	General Service < 50 kW	General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	General Service > 50 kW - 4999 kW - Wholesale Market Participant	Street lighting	Unmetered Scattered Load	Total
2005	9,440	743	42	1	2,182	53	12,460
2006	9,858	747	41	1	2,260	47	12,952
2007	10,274	754	36	1	2,340	42	13,446
2008	10,659	757	31	1	2,422	40	13,909
2009	10,919	767	30	1	2,473	33	14,222
2010	11,120	777	31	1	2,483	37	14,448
2011	11,371	781	33	1	2,494	42	14,720
2012	11,609	786	35	1	2,588	39	15,058
2013	11,857	784	35	1	2,694	43	15,413
2014	12,082	783	36	1	2,738	41	15,681
2015	12,256	786	37	1	2,777	40	15,897
2016	12,440	789	37	1	2,819	40	16,126

2

1 **Ex.3/Tab 1/Sch.4 - Overview of Load Forecast Methodology**

2
3 The purpose of weather normalization is to predict future customer consumption based on
4 normal weather conditions. To achieve this goal, the relationship between weather change and
5 customer consumption must be defined. WDI reviewed the various processes used by earlier
6 Cost of Service applicants and is proposing to adopt a weather normalization methodology
7 using Multifactor Regression (MR) for its load forecast. WDI is proposing to adopt a weather
8 normalization forecasting method similar to WDI's 2012 Cost of Service (EB-2011-0103)
9 In summary, WDI has used the regression analysis methodology to determine a prediction
10 model. With regards to the overall process of load forecasting, it is WDI's view that conducting a
11 regression analysis on historical purchases to produce an equation that will predict energy
12 purchases is appropriate. WDI knows by month the exact number of kWh's purchased from the
13 IESO for use by customers of WDI. With a regression analysis these purchases can be related
14 to other monthly explanatory variables such as heating degree days and cooling degree days
15 which occur in the same month. The result of the regression analysis produces an equation that
16 predicts the purchases based on the explanatory variables. This prediction model is then used
17 as the basis to forecast the total level of weather normalized purchases for WDI for the bridge
18 and test year, which is converted to Billed kWh by rate class. A detail explanation of the process
19 is provided later in this Exhibit.

20
21 WDI choose not to use a regression analysis on an individual rate class basis as WDI does not
22 have reliable data available prior to 2010, WDI intends to test a rate class specific approach in
23 their next cost of service. WDI has decided, based on past cost of services and since the
24 board has accepted the wholesale purchase approach in the past; to prepare the regression
25 analysis based on wholesale purchase volumes.

26
27 The following Tables provide the material to support the weather normalized load forecast used
28 by WDI in this application. Tables 3.3, 3.4, and 3.5 below provide a summary of the weather
29 normalized load and customer/connection forecast used in this section for the 2015 and 2016
30 Forecast periods. WDI has provided 2005-2014 Actual Data, unless otherwise noted.
31 The years 2005 to 2014 are weather actual while 2015 and 2016 is weather normalized and
32 adjusted by projected CDM savings.

1 WDI currently does not have a process to adjust weather actual data to a weather normal basis
 2 since it is WDI understanding there is not a Board approved method to weather normalize actual
 3 data. However, based on the process outlined in this Exhibit, a process to forecast energy on a
 4 weather normalized basis has been developed and used in this application.

5
 6 Total Customers and Connections are annual averages calculated adding the beginning counts
 7 as of January 1 and the ending counts as of December 31 and then dividing in half.

8
 9 **Table 3.3: Summary of Load and Customer/Connection Forecast**

Year	Billed (kWh)	Growth (kWh)	Percentage Change %	Customer/ Connection Count	Average Growth	Percentage Change %
2005	104,361,984			12,460		
2006	106,422,351	2,060,367	1.97%	12,952	492	3.95%
2007	109,546,147	3,123,796	2.94%	13,446	494	3.81%
2008	117,173,372	7,627,224	6.96%	13,909	463	3.44%
2009	121,083,046	3,909,674	3.34%	14,222	314	2.25%
2010	125,814,571	4,731,525	3.91%	14,448	226	1.59%
2011	124,253,328	- 1,561,243	-1.24%	14,720	273	1.89%
2012	121,706,363	- 2,546,965	-2.05%	15,058	338	2.30%
2013	126,042,209	4,335,846	3.56%	15,413	355	2.36%
2014	127,011,123	968,914	0.77%	15,681	268	1.74%
2015	126,817,449	-193,640	-0.15%	15,897	216	1.38%
2016	126,313,135	- 504,314	-0.40%	16,126	229	1.44%

10
 11 On a rate class basis, actual and forecasted billed amount and number of customers are shown
 12 in Table 3.4. WDI choose to separate Wholesale Market Participant(s) from the GS> 50 kW
 13 customer class to assist with the calculation of Cost of Power.

14
 15

Table 3.4: Billed Energy and Number of Customers by Rate Class

Year	Residential	General Service < 50 kW	General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	General Service > 50 kW - 4999 kW - Wholesale Market Participant	Streetlights	Unmetered Scattered Load	Total
	kWh	kWh	kWh	kWh	kWh	kWh	kWh
2005	74,670,218	14,537,477	12,388,794	994,199	1,506,679	264,617	104,361,984
2006	73,494,501	14,223,774	12,633,564	4,233,264	1,581,465	255,784	106,422,351
2007	74,223,887	14,339,658	14,970,174	4,141,944	1,649,563	220,922	109,546,147
2008	78,678,925	15,092,313	17,386,049	4,099,393	1,743,400	173,292	117,173,372
2009	82,719,010	15,369,940	16,872,488	4,143,210	1,723,126	255,272	121,138,844
2010	84,575,464	17,287,125	17,629,407	4,263,663	1,736,181	322,731	125,870,964
2011	84,023,443	16,948,879	17,073,810	4,201,223	1,695,783	310,190	124,310,887
2012	82,588,039	15,746,950	17,613,528	3,761,856	1,731,442	264,550	121,765,860
2013	86,276,532	16,432,348	17,691,775	3,594,884	1,796,174	250,496	126,100,943
2014	87,611,190	16,552,639	17,311,423	3,453,199	1,834,663	248,008	127,068,619
2015	87,658,890	16,789,532	17,321,373	3,592,944	1,222,298	232,411	126,817,449
2016	87,540,339	17,037,738	17,364,124	3,538,626	611,285	221,022	126,366,883

Table 3.5: Number of Customers/Connections (Average)

Customer Counts					
Year	Residential	General Service < 50 kW	General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	Streetlighting	Total
2005	9,440	743	42	2,182	12,460
2006	9,858	747	41	2,260	12,952
2007	10,274	754	36	2,340	13,446
2008	10,659	757	31	2,422	13,909
2009	10,919	767	30	2,473	14,222
2010	11,120	777	31	2,483	14,448
2011	11,371	781	33	2,494	14,720
2012	11,609	786	35	2,588	15,058
2013	11,857	784	35	2,694	15,413
2014	12,082	783	36	2,738	15,681
2015	12,256	786	37	2,777	15,897
2016	12,440	789	37	2,819	16,126

1 **Ex.3/Tab 1/Sch.5 - Load Forecast Details**

2

3 The following section outlines details of the proposed Load Forecast:

4

5

1 **Ex.3/Tab 1/Sch.6 - Economic Overview**

2

3 WDI is projecting customer numbers to increase (growth) in the residential class, GS< 50 kW
4 class and street light class (connections). The utility projects virtually no change in the USL and
5 GS>50 kW class. Overall, the trend table shows a slow yet stable growth in customers.

6

7 Economic conditions remain relatively unchanged from the past. WDI continues to evolve into a
8 retirement community. With approximately 50% of the population over the age of 15 either
9 looking for or actively in the workforce suggests the other 50% is retired. In addition, the Town
10 of Wasaga Beach remains a seasonal tourist town.

11

12 Housing market activity will largely reflect economic conditions and population growth. Low
13 mortgage rates are expected during the forecast and will underpin housing sales and housing
14 prices. Housing sales are forecast to slide lower while the average MLS® sale price holds near
15 current levels. A modest decline in new housing construction appears in the cards.

16

Ex.3/Tab 1/Sch.7 - Overview of Wholesale Purchases

WDI purchases its power from the IESO. Table 3.6 outlines the unadjusted monthly wholesale purchases:

Table 3.6: Unadjusted Wholesale Purchases 2005-2014 (kWh)

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
January	12,104,125	10,835,452	11,595,904	12,264,015	13,812,327	12,974,016	13,147,420	12,612,652	12,427,125	14,009,823
February	10,041,249	10,170,032	11,366,145	11,804,844	11,477,623	11,255,506	11,441,074	11,066,207	11,414,727	12,185,867
March	10,294,288	10,248,021	10,718,300	11,812,299	11,420,342	10,543,146	11,489,559	10,220,161	11,410,610	12,555,380
April	7,950,802	7,986,665	9,069,276	8,938,098	9,511,235	8,706,001	9,665,080	9,355,929	9,843,369	10,082,469
May	8,058,228	8,225,607	8,773,721	9,217,345	9,272,872	9,621,863	9,490,857	9,317,976	9,607,316	9,562,256
June	9,423,396	8,533,586	9,407,320	9,719,413	9,226,969	9,378,111	9,581,971	10,449,654	10,146,123	9,968,997
July	11,465,909	11,494,679	10,922,926	11,318,218	10,435,322	12,682,926	13,572,193	13,026,266	12,627,370	11,153,255
August	10,420,620	10,408,518	11,518,806	11,136,208	11,413,704	12,322,091	11,921,214	11,876,916	11,481,798	11,362,434
September	8,236,530	8,062,480	8,972,619	8,954,031	9,257,157	9,496,039	9,672,771	9,554,623	9,549,656	9,514,381
October	8,141,870	8,803,941	8,837,911	9,569,483	9,872,214	9,470,083	9,746,408	9,583,543	9,762,325	9,761,647
November	8,754,703	9,102,265	10,240,247	10,428,769	9,731,721	10,196,091	9,838,068	10,377,144	11,051,534	11,117,967
December	11,491,781	10,949,116	12,689,471	13,033,020	12,546,812	12,858,198	12,118,289	12,029,428	13,539,377	12,637,824
Total	116,385,506	114,822,368	124,114,653	128,197,751	127,980,307	129,506,081	131,686,916	129,472,511	132,863,343	133,914,314

WDI's usage has increased over the past 10 years, with wholesale purchases increasing by approximately 15% from 2005 to 2014. This increase is mainly due to the increase in residential new construction and a couple of larger supermarkets driven by the residential growth. These annual increases are being reduced by energy conservation initiatives being undertaken by WDI's customer base.

In order to better represent the trend in wholesale purchases, WDI has adjusted its base wholesale purchases prior to running the regression analysis. The purpose of the adjustment was to normalize the data as best as possible. The following adjustments were made to the wholesale purchases:

- WDI adjusted the wholesale purchases to add CDM activity including persistence as reported by the OPA/IESO (WDI adjusted for losses) as if no programs ever existed (this will be discussed later on in the exhibit) from 2006 to 2014.
- WDI adjusted the wholesale purchases to add back all Microfit Generation.
- WDI adjusted the wholesale purchases to add in a GS>50 kW customer that transitioned to a Wholesale Market participant as of April 2012. This customer usage was added after April 2012; instead of being deducted prior to April 2012 to wholesale purchases. WDI felt this was the better approach to normalize the data.

The adjustments that were added to the actual wholesale purchases by month are illustrated in Table 3.7, 3.8 and 3.9 by month. The final results are summarized in Table 3.10 as the adjusted wholesale purchases used in the regression analysis.

Table 3.7: CDM Wholesale Adjustment (kWh)

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
January		2,580	124,114	166,469	172,172	199,975	205,922	219,982	301,002	269,309
February		7,741	124,625	164,187	173,975	197,901	205,191	222,307	297,970	272,993
March		12,902	125,136	161,905	175,778	195,827	204,459	224,632	294,939	276,677
April		18,063	125,647	159,623	177,581	193,753	203,727	226,957	291,908	280,361
May		23,223	126,158	157,342	179,384	191,679	202,995	229,282	288,876	284,045
June		28,384	126,669	155,060	181,187	189,605	202,263	231,606	285,845	287,729
July		33,545	127,180	152,778	182,990	187,531	201,531	233,931	282,814	291,413
August		38,706	127,692	150,497	184,793	185,457	200,799	236,256	279,782	295,097
September		43,866	128,203	148,215	186,596	183,383	200,067	238,581	276,751	298,781
October		49,027	128,714	145,933	188,399	181,309	199,336	240,906	273,720	302,465
November		54,188	129,225	143,651	190,202	179,235	198,604	243,230	270,688	306,149
December		59,349	129,736	141,370	192,005	177,161	197,872	246,010	267,657	309,833

Table 3.8: Wholesale Market Participant Wholesale Adjustment (kWh)

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
January									307,495	303,234
February									277,230	268,666
March									304,671	295,672
April								134,588	299,946	288,782
May								320,941	332,852	315,008
June								352,274	344,375	331,978
July								388,111	373,121	351,350
August								379,875	370,017	367,425
September								321,736	339,083	324,983
October								315,316	327,404	309,084
November								300,793	293,879	285,215
December								327,425	315,997	291,511

Table 3.8: Microfit Generation Wholesale Adjustment (kWh)

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
January							363	1,956	3,020	1,529
February							1,438	4,206	2,961	3,679
March							3,253	11,809	17,416	13,601
April							4,012	17,354	21,274	23,341
May							3,939	22,002	29,336	30,231
June						1,453	5,861	22,701	27,674	29,666
July						1,857	8,238	25,320	27,702	31,088
August						1,579	6,800	22,219	26,339	26,764
September						1,090	6,941	19,510	20,249	21,496
October						1,080	5,825	11,302	13,494	12,808
November						1,537	4,886	6,987	5,211	4,238
December						119	2,351	2,886	1,504	3,728

1

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Table 3.10: Adjusted Wholesale Purchases for 2005-2014

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
January	12,104,125	10,838,032	11,720,018	12,430,484	13,984,499	13,173,991	13,353,706	12,834,590	13,038,233	14,583,352
February	10,041,249	10,177,773	11,490,770	11,969,031	11,651,598	11,453,407	11,647,702	11,292,720	11,992,480	12,729,579
March	10,294,288	10,260,923	10,843,436	11,974,204	11,596,120	10,738,973	11,697,271	10,456,602	12,027,226	13,138,619
April	7,950,802	8,004,728	9,194,923	9,097,721	9,688,816	8,899,754	9,872,819	9,734,828	10,456,088	10,671,157
May	8,058,228	8,248,830	8,899,879	9,374,687	9,452,256	9,813,542	9,697,791	9,890,201	10,257,972	10,186,659
June	9,423,396	8,561,970	9,533,989	9,874,473	9,408,156	9,569,169	9,790,095	11,056,235	10,803,608	10,612,406
July	11,465,909	11,528,224	11,050,106	11,470,996	10,618,312	12,872,314	13,781,963	13,673,629	13,310,597	11,820,056
August	10,420,620	10,447,224	11,646,498	11,286,705	11,598,497	12,509,127	12,128,813	12,515,266	12,157,527	12,043,586
September	8,236,530	8,106,346	9,100,822	9,102,246	9,443,753	9,680,512	9,879,780	10,134,448	10,185,331	10,150,422
October	8,141,870	8,852,968	8,966,625	9,715,416	10,060,613	9,652,472	9,951,569	10,151,067	10,376,535	10,375,700
November	8,754,703	9,156,453	10,369,472	10,572,420	9,921,923	10,376,863	10,041,557	10,928,155	11,620,905	11,702,181
December	11,491,781	11,008,465	12,819,207	13,174,390	12,738,817	13,035,478	12,318,512	12,605,750	14,124,126	13,230,424
Total	116,383,501	115,191,937	125,635,745	130,042,773	130,163,357	131,775,602	134,161,577	135,273,491	140,350,628	141,244,140

3

4

1 **Ex.3/Tab 1/Sch.8 – Conservation and Demand Management Impact**

2 WDI has proceeded to follow a similar methodology that was used in Oakville Hydro's 2014
3 Cost of Service application (EB-2013-0159), which was developed based on previous board
4 decisions. WDI has isolated CDM savings from wholesale purchases by adding back net CDM
5 savings including persistence as reported by the IESO (formally OPA) to Wholesale Purchases
6 for the years 2006-2014. The purpose to this approach is to show what actual wholesale
7 purchases would have been if CDM initiatives never existed. WDI gathered this information
8 from the 2006-2010 WDI's final CDM results, WDI's 2011 final CDM results, WDI's 2012 Gross-
9 Net Savings, WDI's 2013 Gross-Net Savings, and WDI's 2011-2014 Final CDM Results Report.
10 These documents were provided by the IESO which included persistence savings up to and
11 beyond the year 2025. The IESO did not provide WDI with a 2011 Gross-Net Savings
12 document that would have included persistence savings, Consequently, WDI has applied the
13 identical lifecycle approach that was applied to 2012 Gross-Net Savings for the persistence.
14 WDI has also applied the 2013 persistence lifecycle to WDI's 2014 CDM results.

15
16 Since the IESO provided annual savings instead of monthly savings which are needed for the
17 purpose of predicated monthly wholesale purchases, WDI choose to adopt a similar approach
18 used in Oakville Hydro's Cost of Service application adopted from previous applications in
19 calculating monthly changes, including adopting a half-year rule.

1 **Ex.3/Tab 1/Sch.9 - Overview of Variables Used**

2 In WDI's case, variation in monthly electricity consumption is influenced by six main factors –
3 weather (e.g. heating and cooling), which is by far the most dominant effect for most systems;
4 growth factors (increases or decreases in customer count); seasonality, in this case, spring/ fall
5 flag factor, the number of days per month and lastly WDI has used a variable that looks at
6 identifying the impact increased pricing has on customer usage. All but the later were used in
7 WDI's 2012 COS application (EB-2011-0103) Specifics relating to each variable used in the
8 regression analysis are presented below.

9
10 **Heating and Cooling:**

11 In order to determine the relationship between observed weather and energy consumption,
12 monthly weather observations describing the extent of heating or cooling required within the
13 month are necessary. Environment Canada publishes monthly observations on heating degree
14 days (HDD) and cooling degree days (CDD) for selected weather stations across Canada.
15 Heating degree days for a given day are the number of Celsius degrees that the mean
16 temperature is below 18°C. Cooling degree-days for a given day are the number of Celsius
17 degrees that the mean temperature is above 18°C. For WDI the monthly HDD and CDD as
18 reported at Collingwood, Ontario were used.

19
20 WDI has adopted the 20 year average from 1995 to 2014 as the definition of weather normal.
21 The view is that a twenty-year average based on the most recent twenty calendar years
22 available is a reasonable compromise that likely reflects the “average” weather experienced in
23 recent years. Other LDCs have also adopted this definition for the purposes of cost-of-service
24 rebasing. Table 3.11 outlines the monthly weather data used in the regression analysis
25 including the 10 and 20 year average, and 20 year trend calculation.

Table 3.11: HDD and CDD as reported at Collingwood, ON

HDD	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	10 year average	20 year average	20 year Trend
Jan	764.1	752.8	672.3	737.1	717.5	657.9	570.2	805.3	865.2	780.6	573.5	668.8	622.1	816.5	725.8	777.5	633.7	638.9	826.1	706.4	716.1	714.10
Feb	693.7	596.9	564.0	550.2	581.5	554.0	542.9	743.3	652.2	627.9	630.6	729.3	688.6	620.1	625.3	645.3	551.6	647.8	740.1	650.7	630.8	669.04
Mar	645.5	611.7	535.6	565.8	442.2	528.8	571.5	611.0	525.0	646.4	555.3	559.9	630.2	556.5	485.0	610.8	362.4	582.2	730.0	571.9	566.1	566.29
Apr	428.8	397.6	347.4	326.5	375.0	242.6	342.7	426.4	371.4	358.2	323.8	402.3	280.4	352.0	265.0	334.7	377.9	368.7	389.7	345.3	353.2	340.66
May	237.5	291.0	94.1	127.0	138.5	129.4	236.5	231.3	205.5	234.3	160.9	185.5	238.1	232.5	139.0	175.6	133.5	163.7	174.6	183.8	185.7	172.84
Jun	41.1	39.3	72.9	31.9	59.4	63.6	59.7	70.9	64.2	18.5	46.1	45.6	35.2	98.2	51.7	58.4	40.8	73.3	57.2	52.5	54.1	59.52
Jul	17.9	19.3	5.2	3.1	30.0	19.8	3.8	4.3	14.0	1.6	2.5	13.4	9.5	21.5	7.7	0.7	0.2	6.3	29.7	9.3	11.1	8.83
Aug	6.6	24.5	7.8	8.7	23.1	0.6	5.0	3.9	22.9	3.7	12.1	17.5	19.4	20.0	6.0	2.7	4.5	13.8	24.1	12.4	11.9	13.07
Sept	78.0	67.3	42.9	45.6	106.8	93.9	30.3	56.5	49.7	30.2	98.2	50.4	72.7	75.8	93.2	72.3	90.2	103.5	86.3	77.3	70.7	86.14
Oct	254.1	256.1	237.7	256.3	130.2	230.3	304.4	270.3	223.9	214.8	287.7	141.9	273.0	296.5	238.8	223.0	235.2	189.8	238.8	234.0	237.0	230.59
Nov	507.1	451.8	400.8	351.6	177.7	309.8	375.1	386.0	394.8	392.5	367.5	466.3	444.3	351.5	410.0	336.2	446.0	476.7	460.7	415.2	395.1	424.46
Dec	545.1	584.0	523.0	583.4	748.6	496.0	613.7	581.8	664.1	658.5	503.7	654.1	668.4	619.0	668.7	555.3	524.0	717.5	537.7	610.7	602.5	621.41

CDD	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	10 year average	20 year average	20 year Trend
Jan	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-
Feb	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-
Mar	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.8	0.0	0.0	0.3	0.1	0.49
Apr	0.0	0.0	0.0	0.0	0.0	0.0	10.3	5.2	0.0	1.1	0.0	0.0	0.9	0.5	3.0	0.0	0.0	0.0	0.0	0.6	1.1	0.73
May	8.3	0.0	15.2	28.0	11.1	12.2	2.3	0.0	7.2	1.4	15.6	18.0	0.0	2.8	20.7	14.1	24.4	15.7	4.1	11.7	10.6	12.63
Jun	19.7	56.6	58.3	83.4	33.7	61.5	61.2	32.3	25.3	102.4	44.9	59.8	49.6	16.9	21.9	20.7	77.8	41.0	41.5	47.7	47.8	41.40
Jul	44.6	84.5	84.7	152.0	51.1	85.2	153.9	81.0	63.9	132.5	141.4	64.4	87.9	26.6	136.0	139.9	125.7	96.7	50.3	100.1	94.9	101.87
Aug	65.6	17.8	81.8	64.5	53.8	128.4	102.4	91.4	54.2	106.4	73.6	88.7	50.5	69.1	129.8	88.2	84.0	63.9	45.9	80.0	76.8	82.99
Sept	17.2	9.1	29.5	42.5	32.0	28.1	81.4	19.7	49.4	57.5	9.2	40.9	21.6	10.7	26.8	21.2	24.4	24.1	21.4	25.8	29.8	24.94
Oct	2.1	10.9	1.3	0.0	1.8	1.8	9.5	0.0	1.3	20.0	0.6	22.2	3.7	0.0	0.0	2.8	0.1	0.1	1.2	5.1	4.2	2.85
Nov	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-
Dec	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-

1

2

3

Spring and Fall Flag:

WDI used a spring and fall flag. This utility specific flag was created following the analysis of the Wholesale purchases which showed lower purchases during the spring and fall seasons. The assumption is that consumers are not using as much electricity to heat or cool their homes; and as such would have an impact on the wholesale purchases. The variable applies to the months of March, April, May, September, October and November.

Customer Count:

WDI used a customer count variable. This utility specific variable was used to address the increase in power purchased that has resulted from the growth in WDI's customer base. WDI load mix consists of approximately 70% of usage coming from the residential customer class and 13% from GS<50 customer class. Since WDI does not have significant load attributed to large industrial or large commercial customers, this variable shows a trend that is not skewed from either the addition or subtraction of large users and is significant to explaining wholesale purchases for WDI. Table 3.12 outlines the monthly customer count used in the regression analysis.

Table 3.12: Monthly Customer Count

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Jan	10,118	10,522	10,954	11,324	11,647	11,836	12,106	12,398	12,595	12,874
Feb	10,134	10,582	11,000	11,335	11,662	11,865	12,114	12,410	12,601	12,904
Mar	10,152	10,596	11,049	11,344	11,677	11,882	12,124	12,424	12,613	12,843
Apr	10,212	10,634	11,062	11,358	11,686	11,914	12,140	12,437	12,620	12,852
May	10,233	10,671	11,100	11,377	11,699	11,926	12,177	12,454	12,635	12,850
Jun	10,259	10,710	11,150	11,435	11,722	11,954	12,200	12,473	12,674	12,862
Jul	10,319	10,733	11,184	11,477	11,752	11,987	12,230	12,501	12,715	12,874
Aug	10,335	10,740	11,186	11,527	11,762	12,012	12,272	12,521	12,756	12,938
Sept	10,380	10,815	11,236	11,549	11,789	12,031	12,299	12,538	12,781	12,920
Oct	10,411	10,831	11,253	11,596	11,794	12,052	12,324	12,557	12,808	12,961
Nov	10,464	10,868	11,265	11,631	11,818	12,081	12,349	12,571	12,852	12,977
Dec	10,485	10,902	11,312	11,664	11,836	12,096	12,370	12,582	12,859	13,010

Days per Month:

WDI used a "Days per month" variable. Although the variables did not particularly change the results, it did significantly improve the R-Square and therefore WDI opted to keep it as a variable.

CPI Index of Electricity increase relative to Overall CPI Index (Ontario):

WDI did a comparison of the Consumer Price Index (CPI) for Electricity in Ontario versus the Overall CPI Index in Ontario.

According to Statistics Canada Website, the CPI compares, in percentage terms, prices in any given time period to prices in the official base period which, at present, is 2002, which equals base 100.

Table 3.13: Overall CPI Index compared to Electricity for Ontario

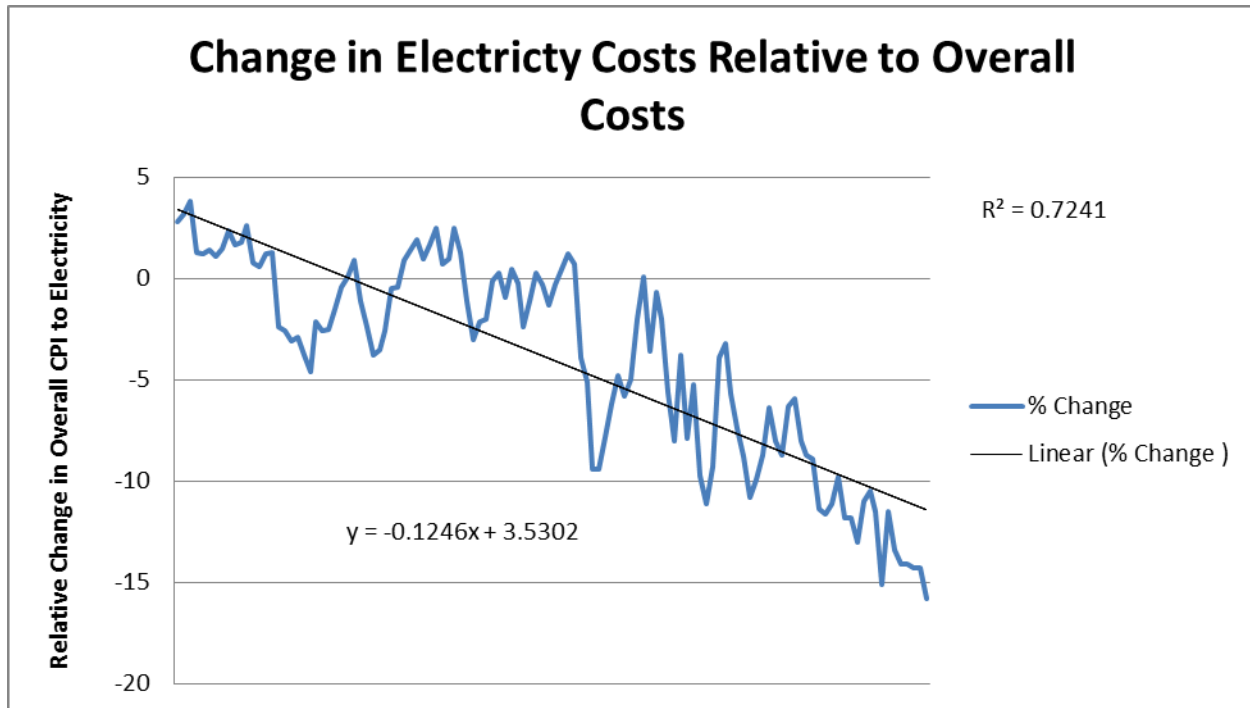
	2005		2006		2007		2008		2009		2010		2011		2012		2013		2014	
	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity	Overall	Electricity
Jan	105.3	102.5	108.2	107.4	109.4	111.9	111.8	110.9	113	115.1	115.1	115.4	117.8	122.8	120.7	131.8	121.3	130	123.1	136.1
Feb	105.7	102.5	108	107.4	110.2	111.7	112.2	110.8	113.8	115.8	115.6	115.1	118.1	120.1	121.2	130.5	122.7	129	124.1	135.1
Mar	106.3	102.5	108.6	107.4	111.1	111.5	112.6	110.7	114	114.1	115.6	114.4	119.4	119.3	121.7	125.6	122.9	128.8	124.8	135.3
Apr	106.6	105.3	109.2	107.9	111.6	111.5	113.5	112.5	113.9	113.6	116	115.3	119.8	123.4	122.2	125.4	122.7	130.7	125.2	136.7
May	106.7	105.5	109.7	112.1	112.1	111.2	114.6	112.9	114.7	115.6	116.3	120.2	120.6	121.3	122.1	127.8	123	131.7	125.8	140.9
Jun	106.9	105.5	109.5	112.1	111.9	113	115.4	112.9	115.1	114.6	116.2	121.3	119.8	121.8	121.6	129	123	131.9	125.9	137.4
Jul	107.1	106	109.6	112.7	112	114.4	115.8	115.1	114.7	114.9	116.8	126.2	120	125.6	121.5	130.3	123.1	134.5	125.7	139.1
Aug	107.5	106	109.8	112.7	111.7	115.5	115.6	114.6	114.7	117.1	116.7	126.1	120.3	128.3	121.8	132.6	123.1	134.7	125.7	139.8
Sept	108.4	106	109.2	113	111.9	115.4	115.7	113.2	114.7	115.8	116.9	124.7	120.6	124.4	122	131.9	123.3	134.4	125.8	139.9
Oct	107.9	106.2	109	113.6	111.6	114.2	114.5	113.2	114.6	114.3	117.4	123.6	120.8	128.7	122.2	130.9	123	132.8	125.9	140.2
Nov	107.7	105.9	109.2	111.3	111.9	112.4	114.1	115.2	115.2	115.5	117.5	122.3	120.9	126.1	121.9	128.3	123	134.8	125.4	139.7
Dec	107.6	105	109.4	112	112	112.4	113.3	116.3	114.8	116.1	117.5	123.3	120.2	129.9	121.2	129.2	122.7	134.5	124.5	140.3
% Increase	2.3	2.5	1.2	4.6	2.6	0.5	1.5	5.4	1.8	1.0	2.4	7.9	2.4	7.1	0.5	-2.6	1.4	4.5	1.4	4.2

As illustrated in Table 3.13, since 2005, the CPI index clearly shows that the cost of electricity is increasing at a greater rate than the overall CPI. Subsequently, WDI felt that a variable was needed to assist in explaining what an impact on cost would have on wholesale purchases (a decreasing trend, beyond CDM). This variable was developed as a means to illustrate that the cost of electricity is impacting the change in customer's usage behaviors. Since WDI, decided to add back CDM to wholesale purchases, as if CDM never occurred, this variable's intent is to explain the "free ridership" and the general awareness through education of WDI's customer base, not specific to CDM, that impacts consumer's behaviors. The variable becomes particularly more relevant for WDI due to WDI's relatively large residential load and the growing senior population on fixed income. Table 3.14 illustrates the growing disparity between the Overall CPI and the cost of Electricity in Ontario. The negative percentage represents the relative increase in the cost of electricity.

Table 3.14: % Growth of Disparity between Overall CPI and Electricity for Ontario

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
	%	%	%	%	%	%	%	%	%	%
Jan	2.8	0.8	-2.5	0.9	-2.1	-0.3	-5	-11.1	-8.7	-13
Feb	3.2	0.6	-1.5	1.4	-2	0.5	-2	-9.3	-6.3	-11
Mar	3.8	1.2	-0.4	1.9	-0.1	1.2	0.1	-3.9	-5.9	-10.5
Apr	1.3	1.3	0.1	1	0.3	0.7	-3.6	-3.2	-8	-11.5
May	1.2	-2.4	0.9	1.7	-0.9	-3.9	-0.7	-5.7	-8.7	-15.1
Jun	1.4	-2.6	-1.1	2.5	0.5	-5.1	-2	-7.4	-8.9	-11.5
Jul	1.1	-3.1	-2.4	0.7	-0.2	-9.4	-5.6	-8.8	-11.4	-13.4
Aug	1.5	-2.9	-3.8	1	-2.4	-9.4	-8	-10.8	-11.6	-14.1
Sept	2.4	-3.8	-3.5	2.5	-1.1	-7.8	-3.8	-9.9	-11.1	-14.1
Oct	1.7	-4.6	-2.6	1.3	0.3	-6.2	-7.9	-8.7	-9.8	-14.3
Nov	1.8	-2.1	-0.5	-1.1	-0.3	-4.8	-5.2	-6.4	-11.8	-14.3
Dec	2.6	-2.6	-0.4	-3	-1.3	-5.8	-9.7	-8	-11.8	-15.8

To create the variable WDI used the growing disparity from Table 3.11 and graphed the results illustrated below:



The graphed results illustrate significant fluctuations both positive and negative, relative to the overall change in CPI compared to electricity. For the variable to be used in the regression WDI

1 felt that using the line of best fit (linear trend results) would illustrate a constant steady declining
 2 trend. The theory behind using the trend as the variable is that as customers behaviors change
 3 and/or there is energy efficient technology uptake (not reflected through CDM net savings)
 4 driven by the increase in the cost of energy; then short term fluctuations would not have an
 5 impact on these changes in consumer behaviors, once changed.

6
 7 The trended formula used to calculate the variable “y” was $y = -0.1246(x) + 3.5302$ with the
 8 variable “x” being the month, using January 2005 as the starting point as a value of 1.
 9 Therefore the “y” variable for January 2005 was 3.41%.

10
 11 The variable used for the regression analysis is shown in Table 3.15.

12
 13 **Table 3.15 CPI Index Electricity relative to Overall CPI Index (Linear Trended) Variable**

	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
	%	%	%	%	%	%	%	%	%	%
Jan	3.41	1.91	0.42	-1.08	-2.58	-4.07	-5.57	-7.06	-8.56	-10.05
Feb	3.28	1.79	0.29	-1.20	-2.70	-4.20	-5.69	-7.19	-8.68	-10.18
Mar	3.16	1.66	0.17	-1.33	-2.82	-4.32	-5.81	-7.31	-8.81	-10.30
Apr	3.03	1.54	0.04	-1.45	-2.95	-4.44	-5.94	-7.43	-8.93	-10.43
May	2.91	1.41	-0.08	-1.58	-3.07	-4.57	-6.06	-7.56	-9.05	-10.55
Jun	2.78	1.29	-0.21	-1.70	-3.20	-4.69	-6.19	-7.68	-9.18	-10.67
Jul	2.66	1.16	-0.33	-1.83	-3.32	-4.82	-6.31	-7.81	-9.30	-10.80
Aug	2.53	1.04	-0.46	-1.95	-3.45	-4.94	-6.44	-7.93	-9.43	-10.92
Sept	2.41	0.91	-0.58	-2.08	-3.57	-5.07	-6.56	-8.06	-9.55	-11.05
Oct	2.28	0.79	-0.71	-2.20	-3.70	-5.19	-6.69	-8.18	-9.68	-11.17
Nov	2.16	0.66	-0.83	-2.33	-3.82	-5.32	-6.81	-8.31	-9.80	-11.30
Dec	2.04	0.54	-0.96	-2.45	-3.95	-5.44	-6.94	-8.43	-9.93	-11.42

14
 15
 16 The intent of this variable was to not specifically identify the price elasticity of demand, but
 17 rather to identify that the cost of electricity has had an impact on wholesale purchases above
 18 and beyond what the impact CDM has had on the reduction of wholesale purchases. This
 19 variable was developed to assist WDI in accurately forecasting usage for the 2016 Test Year
 20 based on trends that are impacting wholesale purchases.

21 Using a combination of wholesale purchases and the variables listed above, a multiple
 22 regression analysis was used to develop an equation describing the relationship between
 23 monthly actual wholesale kWh and the explanatory variables. WDI also used a correlation

1 function to examine the relationship between the variables included in the analysis. The results
2 of the correlation analysis for each scenario can also be found at Tab 6.1 entitled Regression
3 Scenarios of the load forecast model.

4
5 To project the adjusted wholesale purchases for the bridge and test year, the model uses the
6 simple average of the last 20 years of historical data for HDD, CDD. Actual was used for
7 Spring/ Fall Flag, and Days in the Month, however WDI used an average, over 10 years for the
8 month of February, to account for the 2016 Leap Year. WDI has applied a customer growth
9 percentage based on forecasted growth of 1.44% for the Test Year, evenly distributed each
10 month for the customer count variable, and WDI has used a linear trend, consistent with the
11 charted results for the 2015 Bridge Year and 2016 Test Year of the Overall CPI index compared
12 to the CPI index for Electricity for Ontario constructed variable.

13
14 Origin of variables

- 15 • HDD: Stats Canada
- 16 • CDD : Stats Canada
- 17 • Spring Fall Flag: Computed by WDI
- 18 • Customer count: Computed by WDI
- 19 • CPI (Ontario): Stats Canada table 236-000, Computed by WDI
- 20 • Day per Month: Computed by WDI

1 **Ex.3/Tab 1/Sch.10 - Regression Results**

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3 Table 3.16 below presents the regression results used to determine the load forecast.

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Table 3.16: Correlation/Regression Results

<i>Regression Statistics</i>	
Multiple R	0.975448217
R Square	0.951499223
Adjusted R Square	0.948923961
Standard Error	345092.7019
Observations	120

<i>ANOVA</i>					
	<i>df</i>	<i>SS</i>	<i>MS</i>	<i>F</i>	<i>Significance F</i>
Regression	6	2.64004E+14	4.40006E+13	369.4765975	8.47582E-72
Residual	113	1.34571E+13	1.19089E+11		
Total	119	2.77461E+14			

	<i>Coefficients</i>	<i>Standard Error</i>	<i>t Stat</i>	<i>P-value</i>	<i>Lower 95%</i>	<i>Upper 95%</i>
Intercept	-27072961.09	3443835.247	-7.861282306	2.44871E-12	-33895819.84	-20250102.34
Customer Count	2022.592254	295.9572022	6.834070058	4.4078E-10	1436.247658	2608.93685
HDD	5454.082221	202.5751041	26.92375376	5.54907E-51	5052.744404	5855.420039
CDD	27725.88816	1580.779585	17.53937641	4.8931E-34	24594.07869	30857.69763
Spring Fall Flag	-887277.5677	84120.06611	-10.54775167	1.60284E-18	-1053934.59	-720620.5449
CPI Index Electricity Increase Relative to Overall CPI Index (Linear Trended)	210781.5253	56423.61607	3.735696859	0.000295119	98996.16535	322566.8853
Days in Month	427671.9862	40011.36707	10.68876216	7.52673E-19	348402.2516	506941.7208

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1 The resulting regression equation yields an adjusted R-squared of 94.9% when actual annual
 2 wholesale values are compared to annual values predicted by the regression equation; the
 3 mean absolute percentage error (MAPE) is 1.12 per cent.

4
 5 WDI then uses the coefficient from the regression results (line of best fit) to calculate predicted
 6 purchases and forecasted purchases. The resulting equation is:

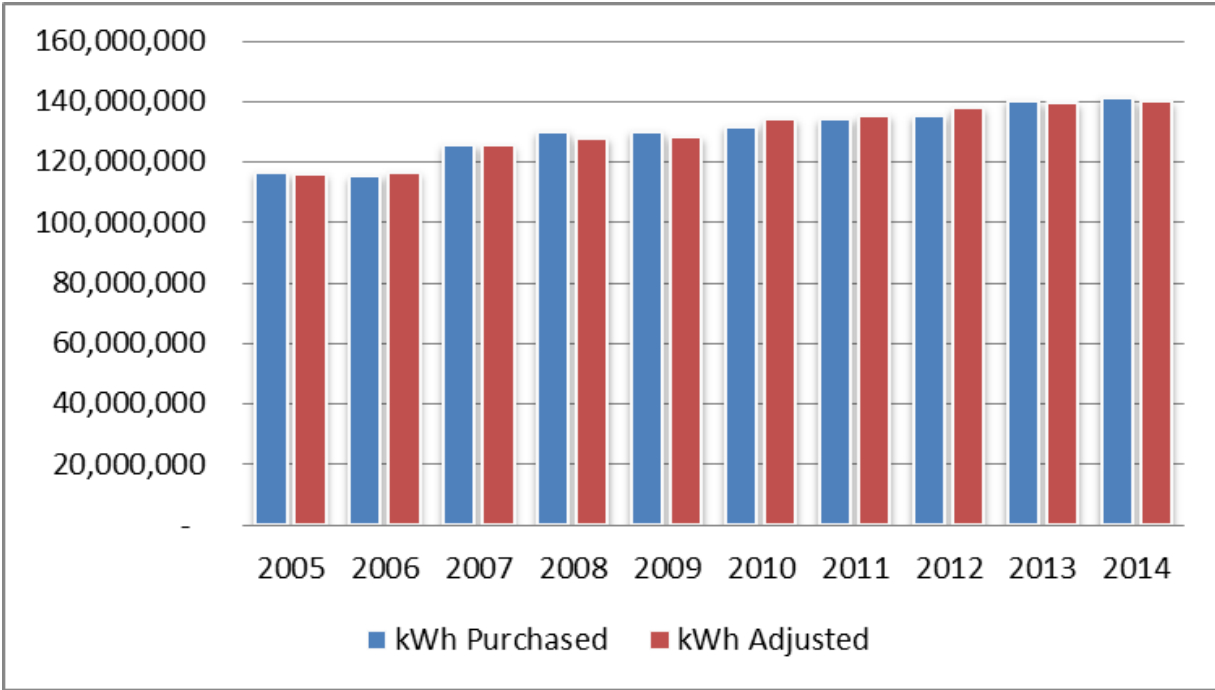
7
 8 Predicted/Forecasted Purchases (Monthly) =
 9 $-27,072,961.09 + 2,022.59*(\text{Customer Count}) + 5,454.08*(\text{HDD}) + 27,725.89*(\text{CDD}) -$
 10 $887,277.57*(\text{Spring Fall Flag}) + 210,781.53*(\text{CPI Index Electricity Relative to Overall CPI}) +$
 11 $427,671.99*(\text{Days in Month})$

12
 13 Table 3.17 as seen below, demonstrates the monthly results by year comparison between the
 14 actual and predicted wholesale purchases from January 1, 2005 – December 31, 2014. Table
 15 3.18 provides a graph showing annual Actual Purchases versus Adjusted Purchases.

16 **Table 3.17: Actual Purchased vs Predicted Purchases**

Year	Actual kWh Purchased	year over year	Predicted kWh	year over year	Purchased Versus Predicted
2005	116,383,501		115,889,998		-0.42%
2006	115,191,937	-1.02%	116,451,494	0.48%	1.09%
2007	125,635,745	9.07%	125,363,223	7.65%	-0.22%
2008	130,042,773	3.51%	127,869,857	2.00%	-1.67%
2009	130,163,357	0.09%	128,179,255	0.24%	-1.52%
2010	131,775,602	1.24%	134,028,817	4.56%	1.71%
2011	134,161,577	1.81%	135,441,583	1.05%	0.95%
2012	135,273,491	0.83%	137,784,492	1.73%	1.86%
2013	140,355,530	3.76%	139,378,146	1.16%	-0.70%
2014	141,322,230	0.69%	139,918,878	0.39%	-0.99%

Table 3.18: Graphed Actual Purchased Versus Predicted Purchase



In accordance with the Filing Requirements, WDI has provided a 2016 forecast using up to 20 year and 10 year normal weather conditions. Illustrated below, Table 3.19 displays 20 years of historical Heating Degree Days and Cooling Degree Days. WDI has provided forecasted purchases, not weather normalized, and not adjusted for CDM, using a 10 year average, a 20 year average, and a 20 year trend, used to forecasted weather normal wholesale purchases. These are presented at Table 3.20, Table 3.21, and Table 3.22 respectively.

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Table 3.19: 20 year historical Heating and Cooling Degree Days average and trend (Collingwood, ON)

HDD	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	10 year average	20 year average	20 year Trend
Jan	764.1	752.8	672.3	737.1	717.5	657.9	570.2	805.3	865.2	780.6	573.5	668.8	622.1	816.5	725.8	777.5	633.7	638.9	826.1	706.4	716.1	714.10
Feb	693.7	596.9	564.0	550.2	581.5	554.0	542.9	743.3	652.2	627.9	630.6	729.3	688.6	620.1	625.3	645.3	551.6	647.8	740.1	650.7	630.8	669.04
Mar	645.5	611.7	535.6	565.8	442.2	528.8	571.5	611.0	525.0	646.4	555.3	559.9	630.2	556.5	485.0	610.8	362.4	582.2	730.0	571.9	566.1	566.29
Apr	428.8	397.6	347.4	326.5	375.0	242.6	342.7	426.4	371.4	358.2	323.8	402.3	280.4	352.0	265.0	334.7	377.9	368.7	389.7	345.3	353.2	340.66
May	237.5	291.0	94.1	127.0	138.5	129.4	236.5	231.3	205.5	234.3	160.9	185.5	238.1	232.5	139.0	175.6	133.5	163.7	174.6	183.8	185.7	172.84
Jun	41.1	39.3	72.9	31.9	59.4	63.6	59.7	70.9	64.2	18.5	46.1	45.6	35.2	98.2	51.7	58.4	40.8	73.3	57.2	52.5	54.1	59.52
Jul	17.9	19.3	5.2	3.1	30.0	19.8	3.8	4.3	14.0	1.6	2.5	13.4	9.5	21.5	7.7	0.7	0.2	6.3	29.7	9.3	11.1	8.83
Aug	6.6	24.5	7.8	8.7	23.1	0.6	5.0	3.9	22.9	3.7	12.1	17.5	19.4	20.0	6.0	2.7	4.5	13.8	24.1	12.4	11.9	13.07
Sept	78.0	67.3	42.9	45.6	106.8	93.9	30.3	56.5	49.7	30.2	98.2	50.4	72.7	75.8	93.2	72.3	90.2	103.5	86.3	77.3	70.7	86.14
Oct	254.1	256.1	237.7	256.3	130.2	230.3	304.4	270.3	223.9	214.8	287.7	141.9	273.0	296.5	238.8	223.0	235.2	189.8	238.8	234.0	237.0	230.59
Nov	507.1	451.8	400.8	351.6	177.7	309.8	375.1	386.0	394.8	392.5	367.5	466.3	444.3	351.5	410.0	336.2	446.0	476.7	460.7	415.2	395.1	424.46
Dec	545.1	584.0	523.0	583.4	748.6	496.0	613.7	581.8	664.1	658.5	503.7	654.1	668.4	619.0	668.7	555.3	524.0	717.5	537.7	610.7	602.5	621.41

CDD	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014	10 year average	20 year average	20 year Trend
Jan	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-
Feb	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-
Mar	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.8	0.0	0.0	0.3	0.1	0.49
Apr	0.0	0.0	0.0	0.0	0.0	0.0	10.3	5.2	0.0	1.1	0.0	0.0	0.9	0.5	3.0	0.0	0.0	0.0	0.0	0.6	1.1	0.73
May	8.3	0.0	15.2	28.0	11.1	12.2	2.3	0.0	7.2	1.4	15.6	18.0	0.0	2.8	20.7	14.1	24.4	15.7	4.1	11.7	10.6	12.63
Jun	19.7	56.6	58.3	83.4	33.7	61.5	61.2	32.3	25.3	102.4	44.9	59.8	49.6	16.9	21.9	20.7	77.8	41.0	41.5	47.7	47.8	41.40
Jul	44.6	84.5	84.7	152.0	51.1	85.2	153.9	81.0	63.9	132.5	141.4	64.4	87.9	26.6	136.0	139.9	125.7	96.7	50.3	100.1	94.9	101.87
Aug	65.6	17.8	81.8	64.5	53.8	128.4	102.4	91.4	54.2	106.4	73.6	88.7	50.5	69.1	129.8	88.2	84.0	63.9	45.9	80.0	76.8	82.99
Sept	17.2	9.1	29.5	42.5	32.0	28.1	81.4	19.7	49.4	57.5	9.2	40.9	21.6	10.7	26.8	21.2	24.4	24.1	21.4	25.8	29.8	24.94
Oct	2.1	10.9	1.3	0.0	1.8	1.8	9.5	0.0	1.3	20.0	0.6	22.2	3.7	0.0	0.0	2.8	0.1	0.1	1.2	5.1	4.2	2.85
Nov	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-
Dec	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-

Table 3.20: Forecast using a ten year average weather normalization (excluding CDM)

Date	Customer Count	HDD (10 Year)	CDD (10 Year)	Spring and Fall Flag	CPI Index Electricity Relative to CPI Overall	Days in Month	Adjusted kWh	Yearly Total
2015- January	13,025	706.35	-	-	- 11.55	31.00	13,947,595	13,947,595
2015-February	13,040	650.66	-	-	- 11.67	28.20	12,450,222	26,397,817
2015-March	13,055	571.87	0.28	1.00	- 11.80	31.00	12,342,344	38,740,161
2015-April	13,070	345.27	0.55	1.00	- 11.92	30.00	10,690,179	49,430,340
2015-May	13,085	183.77	11.68	1.00	- 12.04	31.00	10,549,556	59,979,895
2015-June	13,099	52.50	47.65	-	- 12.17	30.00	11,294,489	71,274,384
2015-July	13,114	9.31	100.14	-	- 12.29	31.00	12,945,950	84,220,335
2015-August	13,129	12.38	80.01	-	- 12.42	31.00	12,408,626	96,628,961
2015-September	13,144	77.28	25.78	1.00	- 12.54	30.00	9,948,161	106,577,122
2015-October	13,159	233.95	5.07	1.00	- 12.67	31.00	10,660,244	117,237,366
2015-November	13,175	415.17	-	1.00	- 12.79	30.00	11,084,548	128,321,914
2015-December	13,190	610.69	-	-	- 12.92	31.00	13,470,073	141,791,987
2016-January	13,205	706.35	-	-	- 13.04	31.00	13,997,319	13,997,319
2016-February	13,221	650.66	-	-	- 13.17	28.20	12,501,646	26,498,966
2016-March	13,237	571.87	0.28	1.00	- 13.29	31.00	12,395,471	38,894,437
2016-April	13,253	345.27	0.55	1.00	- 13.42	30.00	10,745,012	49,639,449
2016-May	13,268	183.77	11.68	1.00	- 13.54	31.00	10,606,099	60,245,548
2016-June	13,284	52.50	47.65	-	- 13.66	30.00	11,352,746	71,598,294
2016-July	13,300	9.31	100.14	-	- 13.79	31.00	13,005,925	84,604,219
2016-August	13,316	12.38	80.01	-	- 13.91	31.00	12,470,321	97,074,540
2016-September	13,332	77.28	25.78	1.00	- 14.04	30.00	10,011,579	107,086,119
2016-October	13,347	233.95	5.07	1.00	- 14.16	31.00	10,725,390	117,811,509
2016-November	13,363	415.17	-	1.00	- 14.29	30.00	11,151,426	128,962,935
2016-December	13,379	610.69	-	-	- 14.41	31.00	13,538,685	142,501,620

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Table 3.21: Forecast using a twenty year average weather normalization (excluding CDM)

Date	Customer Count	HDD (20 Year)	CDD (20 Year)	Spring and Fall Flag	CPI Index Electricity Relative to CPI Overall	Days in Month	Adjusted kWh	Yearly Total
2015-January	13,025	716.1	-	-	- 11.55	31.00	14,000,772	14,000,772
2015-February	13,040	630.8	-	-	- 11.67	28.20	12,341,933	26,342,705
2015-March	13,055	566.1	0.15	1.00	- 11.80	31.00	12,307,168	38,649,873
2015-April	13,070	353.2	1.11	1.00	- 11.92	30.00	10,748,911	49,398,784
2015-May	13,085	185.7	10.58	1.00	- 12.04	31.00	10,529,758	59,928,541
2015-June	13,099	54.1	47.82	-	- 12.17	30.00	11,307,841	71,236,382
2015-July	13,114	11.1	94.86	-	- 12.29	31.00	12,809,147	84,045,530
2015-August	13,129	11.9	76.84	-	- 12.42	31.00	12,318,405	96,363,935
2015-September	13,144	70.7	29.83	1.00	- 12.54	30.00	10,024,604	106,388,539
2015-October	13,159	237.0	4.18	1.00	- 12.67	31.00	10,652,116	117,040,655
2015-November	13,175	395.1	-	1.00	- 12.79	30.00	10,974,941	128,015,597
2015-December	13,190	602.5	-	-	- 12.92	31.00	13,425,146	141,440,742
2016-January	13,205	716.10	-	-	- 13.04	31.00	14,050,497	14,050,497
2016-February	13,221	630.81	-	-	- 13.17	28.20	12,393,357	26,443,854
2016-March	13,237	566.09	0.15	1.00	- 13.29	31.00	12,360,295	38,804,148
2016-April	13,253	353.22	1.11	1.00	- 13.42	30.00	10,803,744	49,607,893
2016-May	13,268	185.71	10.58	1.00	- 13.54	31.00	10,586,301	60,194,194
2016-June	13,284	54.11	47.82	-	- 13.66	30.00	11,366,098	71,560,292
2016-July	13,300	11.08	94.86	-	- 13.79	31.00	12,869,122	84,429,414
2016-August	13,316	11.94	76.84	-	- 13.91	31.00	12,380,100	96,809,514
2016-September	13,332	70.73	29.83	1.00	- 14.04	30.00	10,088,023	106,897,537
2016-October	13,347	236.99	4.18	1.00	- 14.16	31.00	10,717,262	117,614,799
2016-November	13,363	395.07	-	1.00	- 14.29	30.00	11,041,819	128,656,618
2016-December	13,379	602.45	-	-	- 14.41	31.00	13,493,758	142,150,375

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Table 3.22: Forecast using a twenty year trended weather normalization (excluding CDM)

Date	Customer Count	HDD (20 Year)	CDD (20 Year)	Spring and Fall Flag	CPI Index Electricity Relative to CPI Overall	Days in Month	Adjusted kWh	Yearly Total
2015-January	13,025	714.10	-	-	- 11.55	31.00	13,989,864	13,989,864
2015-February	13,040	669.04	-	-	- 11.67	28.20	12,550,468	26,540,332
2015-March	13,055	566.29	0.49	1.00	- 11.80	31.00	12,317,732	38,858,065
2015-April	13,070	340.66	0.73	1.00	- 11.92	30.00	10,670,026	49,528,091
2015-May	13,085	172.84	12.63	1.00	- 12.04	31.00	10,516,282	60,044,373
2015-June	13,099	59.52	41.40	-	- 12.17	30.00	11,159,490	71,203,863
2015-July	13,114	8.83	101.87	-	- 12.29	31.00	12,991,298	84,195,161
2015-August	13,129	13.07	82.99	-	- 12.42	31.00	12,495,013	96,690,174
2015-September	13,144	86.14	24.94	1.00	- 12.54	30.00	9,973,194	106,663,368
2015-October	13,159	230.59	2.85	1.00	- 12.67	31.00	10,580,367	117,243,735
2015-November	13,175	424.46	-	1.00	- 12.79	30.00	11,135,217	128,378,951
2015-December	13,190	621.41	-	-	- 12.92	31.00	13,528,541	141,907,492
2016-January	13,205	714.10	-	-	- 13.04	31.00	14,039,588	14,039,588
2016-February	13,221	669.04	-	-	- 13.17	28.20	12,601,892	26,641,481
2016-March	13,237	566.29	0.49	1.00	- 13.29	31.00	12,370,860	39,012,340
2016-April	13,253	340.66	0.73	1.00	- 13.42	30.00	10,724,860	49,737,200
2016-May	13,268	172.84	12.63	1.00	- 13.54	31.00	10,572,826	60,310,026
2016-June	13,284	59.52	41.40	-	- 13.66	30.00	11,217,747	71,527,773
2016-July	13,300	8.83	101.87	-	- 13.79	31.00	13,051,272	84,579,045
2016-August	13,316	13.07	82.99	-	- 13.91	31.00	12,556,708	97,135,753
2016-September	13,332	86.14	24.94	1.00	- 14.04	30.00	10,036,613	107,172,366
2016-October	13,347	230.59	2.85	1.00	- 14.16	31.00	10,645,513	117,817,878
2016-November	13,363	424.46	-	1.00	- 14.29	30.00	11,202,094	129,019,973
2016-December	13,379	621.41	-	-	- 14.41	31.00	13,597,153	142,617,125

1 **Ex.3/Tab 1/Sch.11 - Determination of Customer Forecast**

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3 Historic customer counts and projected customer counts and for 2015 and 2016 are presented
4 in Table 3.23.

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6 Customer Counts are presented as an average between January 1 and December 31 of the
7 given year for the 2015 Bridge Year and 2016 Test Year.

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Table 3.23: Customer Forecast

Date	Residential		General Service < 50 kW		Unmetered Scattered Load		Sentinel Lighting		General Service > 50 kW - 4999 kW - Excluding		General Service > 50 kW - 4999 kW - Wholesale		Streetlighting	
	Customers or Connections	Growth Rate	Customers or Connections	Growth Rate	Customers or Connections	Growth Rate	Customers or Connections	Growth Rate	Customers or Connections	Growth Rate	Customers or Connections	Growth Rate	Customers or Connections	Growth Rate
2005	9,440		743		53		-		42		1		2,182	
2006	9,858	1.0442	747	1.0054	47	0.8857	-	0.0000	41	0.9643	1	1.0000	2,260	1.0358
2007	10,274	1.0422	754	1.0094	42	0.8925	-	0.0000	36	0.8889	1	1.0000	2,340	1.0356
2008	10,659	1.0375	757	1.0033	40	0.9639	-	0.0000	31	0.8611	1	1.0000	2,422	1.0348
2009	10,919	1.0244	767	1.0139	33	0.8125	-	0.0000	30	0.9677	1	1.0000	2,473	1.0213
2010	11,120	1.0184	777	1.0124	37	1.1231	-	0.0000	31	1.0333	1	1.0000	2,483	1.0040
2011	11,371	1.0226	781	1.0058	42	1.1370	-	0.0000	33	1.0484	1	1.0000	2,494	1.0042
2012	11,609	1.0210	786	1.0064	39	0.9398	-	0.0000	35	1.0769	1	1.0000	2,588	1.0379
2013	11,857	1.0214	784	0.9975	43	1.0897	-	0.0000	35	1.0000	1	1.0000	2,694	1.0408
2014	12,082	1.0190	783	0.9987	41	0.9647	-	0.0000	36	1.0286	1	1.0000	2,738	1.0165
<i>Geomean</i>	(5 year)	1.0205	(5 year)	1.0041	(5 year)	1.0476		0.0000	(5 year)	1.0371		1.0000	(5 year)	1.0206
2015	12,329		786		43		-		37		1		2,794	
2016	12,581		789		45		-		39		1		2,852	

Total Customers	
Customers & Connections	Growth Rate
12,460	
12,952	1.0395
13,446	1.0381
13,909	1.0344
14,222	1.0225
14,448	1.0159
14,720	1.0189
15,058	1.0230
15,413	1.0236
15,681	1.0174
	1.0259
15,991	
16,307	

In the section below, LDCs can adjust the computed customer count for the Bridge and Test Year for special circumstance such as new subdivision or loss of customer or other utility specific reasons.

Adjusted														
2015	12,256	1.0144	786	1.0038	40	0.9756	-	0.0000	37	1.0278	1	1.0000	2,777	1.0144
2016	12,440	1.0150	789	1.0038	40	1.0000	-	0.0000	37	1.0000	1	1.0000	2,819	1.0150

Adjusted	
Customers & Connections	Growth Rate
15,897	1.0138
16,126	1.0144

Note: The model computes an average customer count. Utility may chose to overwrite the customer/connection count if a year end count is more appropriate.

FINAL ADJUSTED NUMBERS														
2015	12,256	1.0144	786	1.0038	40	0.9756	-	0.0000	37	1.0278	1	1.0000	2,777	1.0144
2016	12,440	1.0150	789	1.0038	40	1.0000	-	0.0000	37	1.0000	1	1.0000	2,819	1.0150

Adjusted	
Customers & Connections	Growth Rate
15,897	1.0138
16,126	1.0144

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1 **Residential Customers:**

2 The residential customer class has been increasing steadily during the last 10 years. Growth
3 rates, using average customers throughout the year, have declined in recent years to about 2%
4 per year over the last 5 years. However, WDI's 2014 residential customer growth was 1.38%
5 and for 2015 year to date new construction service orders as of August 20th 2015 are slightly
6 over 100 service orders well below the orders necessary to maintain a 2% growth. Additionally,
7 there is currently a large troubled residential development that may be an indication of slowing
8 growth. Therefore, WDI has revised the growth rate to 1.5% to reflect growth rates that WDI is
9 experiencing and expected to experience for the 2016 Test Year. The Town of Wasaga Beach
10 attracts seasonal, retirement, and young families alike and there is no foreseeable change in
11 that regard.

12

13 **GS < 50 kW Customers:**

14 WDI does not forecast significant growth within the GS<50 kW class. However, WDI is aware
15 that as the town's residential population continues to grow then it is reasonable to assume the
16 business community will grow as well, which would be consistent with past trends. WDI has
17 forecasted less than ½ percent per year growth rate for 2015 and 2016 which is consistent with
18 the 5 year geometric mean.

19

20 **GS > 50 kW Customers:**

21 WDI has not forecasted growth within the GS>50 kW class. WDI has not been contacted by
22 any development suggesting a GS>50 kW customer will be added within the next two years.
23 Furthermore, WDI is aware that there is at least one customer with usage barely exceeding the
24 minimum threshold of demand greater than 50kW within a billing cycle that has recently
25 participated in a CDM program. There is a high likelihood of this customer being reclassified to
26 the GS < 50 kW customer class. Recent additions, within the last 10 years to this customer
27 class include two large supermarkets and large chain restaurants. For 2014, WDI reclassified a
28 GS<50 kW customer to this class and a new Dairy Queen opened.

29

30 **Unmetered Scattered Load:**

31 WDI had adjusted the 5-year average growth rate for this customer class to remain at 40
32 customers. WDI intends to meter all customers going forward.

33

1 **Streetlights:**

2 This customer class is based on connections and follows the same methodology in applying
3 growth as the residential customer class. This customer class also follows the same historical
4 growth trends as the residential customer class.

5

6

1 **Ex.3/Tab 1/Sch.12 - Determination of Weather Normalized Forecast**

2 Allocation to specific weather sensitive rate classes (Residential, GS<50, GS>50, including
3 WDI's Wholesale Market Participant) is based on the share of each classes' actual retail
4 (metered) kWh (exclusive of distribution losses) and a share of actual wholesale kWh, adjusted
5 for CDM (metered). Weather normalized wholesale kWh, for historical years, are allocated to
6 these classes based on these historical shares.

7
8 **Calculation of Average Consumption per Rate Class for 2015 Bridge and 2016 Test Year:**

9 WDI has applied a % of change using the last year actual (2014) average kWh per customer for
10 each rate class to determine the 2015 and 2016 average forecasted consumption per customer
11 prior to weather normalization. (*i.e. 2015 average customer usage per class is equal to the % of*
12 *Change * 2014 average kWh per customer class*).

13
14 WDI calculated the % of Change, using the geometric mean based on the average metered
15 kWh per customer class. For each class WDI used:

- 16 • A 9 year geometric mean for the Residential Class
- 17 • A 9 year geometric mean for the GS<50 kW Cass
- 18 • A 6 year geometric mean for the GS>50 kW Class
- 19 • A 8 year geometric mean for the GS>50 kW – WMP
- 20 • A 9 year geometric mean for the Street Lighting Class
- 21 • A 5 year geometric mean for the Unmetered Scattered Load Class

22
23 Different years were used based on the accuracy of the data available.

24
25 Prior to calculating the % of change, WDI adjusted the average metered kWh per customer
26 class by CDM activity. This approach normalizes the consumption trends as if CDM never
27 occurred and is consistent with WDI's treatment of CDM on wholesale purchases.

28
29 CDM data was extracted from the same data WDI used for the adjustment to wholesale
30 purchases, as provided by the IESO. However, CDM adjustments to metered consumption
31 were not loss adjusted. Furthermore, WDI manually identify CDM activity by customer class
32 which was made possible due to the limited GS>50 kW customers in WDI's service territory.

1

2 For those rate classes that use kW consumption as a billing determinant, sales for these
3 customer classes are then converted to kW based on the historical volumetric relationship
4 between kWh and kW.

5

6 The Average kWh per customer per customer class is illustrated in Table 3.24.

7

Table 3.24 Average Customer Usage (excluding CDM)

Residential					GEOMEAN AVERAGE YEARS		9.00
Year	Metered kWh	CDM Adjustment	Total Adjusted Consumed kWh	Average Customer	Average kWh/Customer	% of Change	
2005	74,670,218	0	74,670,218	9,440	7,910		
2006	73,494,501	344,370	73,838,871	9,858	7,491	94.70%	
2007	74,223,887	1,067,214	75,291,101	10,274	7,329	97.84%	
2008	78,678,925	1,671,908	80,350,833	10,659	7,539	102.87%	
2009	82,719,010	1,667,861	84,386,871	10,919	7,729	102.52%	
2010	84,575,464	1,744,923	86,320,386	11,120	7,763	100.44%	
2011	84,023,443	1,338,783	85,362,226	11,371	7,507	96.71%	
2012	82,588,039	1,469,726	84,057,765	11,609	7,241	96.45%	
2013	86,276,532	1,542,583	87,819,115	11,857	7,407	102.29%	
2014	87,611,190	1,779,053	89,390,243	12,082	7,399	99.89%	
2015					7,344	99.26%	
2016					7,290		

General Service < 50 kW					GEOMEAN AVERAGE YEARS		9.00
Year	Metered kWh	CDM Adjustment	Total Adjusted Consumed kWh	Average Customer	Average kWh/Customer	% of Change	
2005	14,537,477	-	14,537,477	743	19,566		
2006	14,223,774	0	14,223,774	747	19,041	97.32%	
2007	14,339,658	0	14,339,658	754	19,018	99.88%	
2008	15,092,313	0	15,092,313	757	19,950	104.90%	
2009	15,369,940	238,207	15,608,147	767	20,350	102.00%	
2010	17,287,125	608,597	17,895,722	777	23,047	113.25%	
2011	16,948,879	765,764	17,714,643	781	22,682	98.42%	
2012	15,746,950	795,741	16,542,690	786	21,047	92.79%	
2013	16,432,348	860,862	17,293,210	784	22,058	104.80%	
2014	16,552,639	955,996	17,508,636	783	22,361	101.38%	
2015					22,695	101.49%	
2016					23,034		

Unmetered Scattered Load					GEOMEAN AVERAGE YEARS		5.00
Year	Metered kWh	CDM Adjustment	Total Adjusted Consumed kWh	Average Customer	Average kWh/Customer	% of Change	
2005	264,617	-	264,617	53	5,040		
2006	255,784	0	255,784	47	5,501	109.13%	
2007	220,922	0	220,922	42	5,323	96.78%	
2008	173,292	0	173,292	40	4,332	81.38%	
2009	255,272	0	255,272	33	7,855	181.30%	
2010	322,731	0	322,731	37	8,842	112.57%	
2011	310,190	0	310,190	42	7,474	84.53%	
2012	290,376	0	290,376	39	7,446	99.61%	
2013	264,550	0	264,550	43	6,225	83.60%	
2014	250,496	0	250,496	41	6,110	98.15%	
2015					5,810	95.10%	
2016					5,526		

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General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participi					GEOMEAN AVERAGE YEARS	6.00
Year	Metered kWh	CDM Adjustment	Total Adjusted Consumed kWh	Average Customer	Average kWh/Customer	% of Change
2005	12,388,794	-	12,388,794	42	294,971	
2006	12,633,564	-	12,633,564	41	311,940	105.75%
2007	14,970,174	-	14,970,174	36	415,838	133.31%
2008	17,386,049	-	17,386,049	31	560,840	134.87%
2009	16,872,488	-	16,872,488	30	562,416	100.28%
2010	17,629,407	-	17,629,407	31	568,691	101.12%
2011	17,073,810	15,546	17,089,357	33	525,826	92.46%
2012	17,613,528	101,572	17,715,100	35	506,146	96.26%
2013	17,691,775	192,151	17,883,926	35	510,969	100.95%
2014	17,311,423	262,204	17,573,627	36	488,156	95.54%
2015					476,993	97.71%
2016					466,085	

General Service > 50 kW - 4999 kW - Wholesale Market Participant					GEOMEAN AVERAGE YEARS	8.00
Year	Metered kWh	CDM Adjustment	Total Adjusted Consumed kWh	Average Customer	Average kWh/Customer	% of Change
2005	994,199	-	994,199	1	994,199	
2006	4,233,264	-	4,233,264	1	4,233,264	425.80%
2007	4,141,944	-	4,141,944	1	4,141,944	97.84%
2008	4,099,393	-	4,099,393	1	4,099,393	98.97%
2009	4,143,210	-	4,143,210	1	4,143,210	101.07%
2010	4,263,663	-	4,263,663	1	4,263,663	102.91%
2011	4,201,223	-	4,201,223	1	4,201,223	98.54%
2012	3,761,856	143,505	3,905,361	1	3,905,361	92.96%
2013	3,594,884	488,371	4,083,255	1	4,083,255	104.56%
2014	3,453,199	610,204	4,063,403	1	4,063,403	99.51%
2015					4,042,656	99.49%
2016					4,022,014	

Streetlighting					GEOMEAN AVERAGE YEARS	9.00
Year	Metered kWh	CDM Adjustment	Total Adjusted Consumed kWh	Average Customer	Average kWh/Customer	% of Change
2005	1,506,679	-	1,506,679	2,182	691	
2006	1,581,465	-	1,581,465	2,260	700	101.34%
2007	1,649,563	-	1,649,563	2,340	705	100.72%
2008	1,743,400	-	1,743,400	2,422	720	102.13%
2009	1,723,126	-	1,723,126	2,473	697	96.78%
2010	1,736,181	-	1,736,181	2,483	699	100.35%
2011	1,695,783	-	1,695,783	2,494	680	97.26%
2012	1,731,442	-	1,731,442	2,588	669	98.37%
2013	1,796,174	-	1,796,174	2,694	667	99.68%
2014	1,834,663	-	1,834,663	2,738	670	100.48%
2015					668	99.66%
2016					666	

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Calculation of Non-Weather Billed (metered) Consumption by Rate Class:

From Table 3.24 WDI used the Average kWh per customer for the 2015 Bridge and 2016 Test Year and multiplied that by the forecasted average customer in that rate class for the 2015 Bridge and 2016 Test Year, illustrated previously in Table 3.23 (Ex. 3/Tab 1/Sch. 11). The Non-Weather Billed Consumption by rate class is illustrated in Table 3.25:

Table 3.25 Non-Weather Billed Consumption

Non-Weather		Residential	General Service < 50 kW	Unmetered Scattered Load	General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	Service > 50 kW - 4999 kW - Wholesale Market	Streetlighting	Total
2015	131,784,556	90,006,761	17,838,423	232,411	17,809,468	4,042,656	1,854,838	131,784,556
2016	133,024,192	90,682,160	18,174,157	221,022	18,048,474	4,022,014	1,876,365	133,024,192

Calculation of Weather Corrected Billed (metered) Consumption:

Total weather corrected billed kWh is calculated from the predicted/forecasted wholesale purchase calculated from line of best fit as determined by the regression analysis and presented in Ex. 3/Tab 1/Sch. 10 and divided by the proposed loss factor of 8.02% as presented in Ex. 8/Tab 1/Sch. 11. Total predicted/forecasted wholesale purchases calculated for the 2015 Bridge Year and 2016 Test Year is 141,440,742 kWh, and 142,150,375 kWh (using 20 year average HDD and CDD average), respectively. The total Weather Corrected Billed (metered) kWh for the 2015 Bridge Year and 2016 Test Year are 130,937,741 kWh and 131,594,678 kWh, respectively.

Calculation of Weather Corrected Billed (metered) Consumption by Rate Class:

The difference between non-weather normalized and weather normalized forecast is assumed to be the amount related to moving the forecast to a weather normal basis. WDI used the weather normalization work completed by Hydro One for WDI for its 2007 Cost Allocation Study as a starting point and has shown its weather sensitivity by rate class illustrated in Table 3.26.

Table 3.26 – Weather Sensitivity

Weather Sensitivity				
Residential	GS<50 kW	GS >50 kW	Street Lighting	Unmetered Scattered Load
94%	94%	87%	0%	0%

1 WDI has reviewed previous rate applications and has noted the concern of Intervenor that the
 2 Residential and GS <50kW classes are not 100% weather sensitive. WDI has, thus, applied a
 3 weather sensitivity factor of 94%, which is the mid-point between the 100% HONI reported for
 4 these two classes and the GS >50 kW sensitivity factor of 87%. None of the other rate classes
 5 were assumed to be weather sensitive.

6
 7 As a result, any differences in 2015 kWh and 2016 kWh has been assigned on a prorated basis
 8 to each rate classes based on the above level of weather sensitivity. Table 3.27 outlines how
 9 the weather sensitive rate classes have been adjusted to align the non-normalized forecast with
 10 the normalized forecast.

Table 3.27 Alignment of Non-Normal to Weather Normal Forecast

Average kWh Usage Per Customer/Connection (CDM excluded)	Residential	General Service < 50 kW	Unmetered Scattered Load	General Service > 50 kW - 4999 kW - Excluding WMP	General Service > 50 kW - 4999 kW - WMP	Street lighting
2015	7,344	22,695	5,810	476,993	4,042,656	668
2016	7,290	23,034	5,526	466,085	4,022,014	666

Non-Normal Weather Billed Energy Forecast (kWh)	Residential	General Service < 50 kW	Unmetered Scattered Load	General Service > 50 kW - 4999 kW - Excluding WMP	General Service > 50 kW - 4999 kW - WMP	Street lighting	Total
2015	90,006,761	17,838,423	232,411	17,809,468	4,042,656	1,854,838	131,784,556
2016	90,682,160	18,174,157	221,022	18,048,474	4,022,014	1,876,365	133,024,192

Adjustment for Weather (kWh)	Residential	General Service < 50 kW	Unmetered Scattered Load	General Service > 50 kW - 4999 kW - Excluding WMP	General Service > 50 kW - 4999 kW - WMP	Street lighting	Total
2015	-594,403	-117,805	0	-109,706	-24,903	0	-846,816
2016	-1,001,456	-200,708	0	-185,918	-41,431	0	-1,429,514

Weather Normalized Billed Energy Forecast (kWh)	Residential	General Service < 50 kW	Unmetered Scattered Load	General Service > 50 kW - 4999 kW - Excluding WMP	General Service > 50 kW - 4999 kW - WMP	Street lighting	Total
2015	89,412,358	17,720,618	232,411	17,699,763	4,017,753	1,854,838	130,937,741
2016	89,680,703	17,973,449	221,022	17,862,555	3,980,583	1,876,365	131,594,678

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Ex.3/Tab 1/Sch.13 - Load Forecast by Class.

The following section presents class specific historic and forecast values for all rate classes. Historic class specific kWh consumption is allocated based on each class' share in wholesale kWh, exclusive of distribution losses. Forecast Weather Normalized Billed class values are presented in 3.27 (Tab Ex. 3/Tab 1/Sch. 12).

Tables 3.28 to 3.32 show historical and forecasted details for each customer class.

Table 3.28: Residential Forecast

Residential					
Year	Residential Metered kWh	Normalized Purchases	<i>Ratio% *</i>	Normalized Consumption	Per customer
2005	74,670,218	115,889,998	64.16%	74,353,593	7,876
2006	73,494,501	116,451,494	63.80%	74,298,121	7,537
2007	74,223,887	125,363,223	59.08%	74,062,884	7,209
2008	78,678,925	127,869,857	60.50%	77,364,260	7,258
2009	82,719,010	128,179,255	63.55%	81,458,110	7,461
2010	84,575,464	134,028,817	64.18%	86,021,609	7,736
2011	84,023,443	135,441,583	62.63%	84,825,092	7,460
2012	82,588,039	137,784,492	61.05%	84,121,072	7,246
2013	86,276,532	139,378,146	61.47%	85,675,734	7,226
2014	87,611,190	139,956,575	61.97%	86,729,335	7,178
2015		141,440,742		89,412,358	7,295
2016		142,150,375		89,680,703	7,208

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Table 3.29: General Service <50 kW Forecast

General Service < 50 kW					
Year	General Service < 50 kW Metered kWh	Normalized Purchases	Ratio% *	Normalized Consumption	Per customer
2005	14,537,477	115,889,998	12.49%	14,475,834	19,483
2006	14,223,774	116,451,494	12.35%	14,379,302	19,249
2007	14,339,658	125,363,223	11.41%	14,308,553	18,977
2008	15,092,313	127,869,857	11.61%	14,840,132	19,617
2009	15,369,940	128,179,255	11.81%	15,135,653	19,734
2010	17,287,125	134,028,817	13.12%	17,582,716	22,644
2011	16,948,879	135,441,583	12.63%	17,110,584	21,909
2012	15,746,950	137,784,492	11.64%	16,039,251	20,406
2013	16,432,348	139,378,146	11.71%	16,317,919	20,814
2014	16,552,639	139,956,575	11.71%	16,388,028	20,930
2015		141,440,742		17,720,618	22,545
2016		142,150,375		17,973,449	22,780

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Table 3.30: General Service >50 Demand (kW)

General Service > 50 kW - 999 kW - Excluding Wholesale Market Participant							
Year	kWh	kWh	kW	Customer/ Connection	kWh per connection	KW per connection	KW/kWh Ratio
2005	12,388,794	12,388,794	0	42	-	-	-
2006	12,633,564	12,633,564	0	41	-	-	-
2007	14,970,174	14,970,174	0	36	-	-	-
2008	17,386,049	17,386,049	0	31	-	-	-
2009	16,872,488	16,872,488	43,812	30	562,416	1,460.390	0.00260
2010	17,629,407	17,629,407	44,116	31	568,691	1,423.087	0.00250
2011	17,073,810	17,073,810	45,359	33	525,348	1,395.646	0.00266
2012	17,613,528	17,613,528	47,595	35	503,244	1,359.856	0.00270
2013	17,691,775	17,691,775	46,867	35	505,479	1,339.046	0.00265
2014	17,311,423	17,311,423	45,989	36	480,873	1,277.477	0.00266
2015	17,699,763	17,699,763	46,610	37	478,372	1,259.728	
2016	17,862,555	17,862,555	47,039	37	482,772	1,271.315	
Average Years =		5.00			516,727	1,359.022	0.00263

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General Service > 50 kW - 999 kW - Wholesale Market Participant							
Year	kWh	kWh	kW	Customer/ Connection	kWh per connection	KW per connection	KW/kWh Ratio
2005	994,199	994,199	0	1	-	-	-
2006	4,233,264	4,233,264	0	1	-	-	-
2007	4,141,944	4,141,944	0	1	-	-	-
2008	4,099,393	4,099,393	0	1	-	-	-
2009	4,143,210	4,143,210	7,024	1	4,143,210	7,024.260	0.00170
2010	4,263,663	4,263,663	7,301	1	4,263,663	7,300.800	0.00171
2011	4,201,223	4,201,223	7,186	1	4,201,223	7,185.600	0.00171
2012	3,761,856	3,761,856	6,699	1	3,761,856	6,698.910	0.00178
2013	3,594,884	3,594,884	6,557	1	3,594,884	6,556.560	0.00182
2014	3,453,199	3,453,199	6,080	1	3,453,199	6,080.470	0.00176
2015	4,017,753	4,017,753	7,062	1	4,017,753	7,061.697	
2016	3,980,583	3,980,583	6,996	1	3,980,583	6,996.366	
Average Years =		5.00			3,854,965	6,764.468	0.00176

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Table 3.31- Unmetered Scattered Load

Unmetered Scattered Load					
Year	Unmetered Scattered Load Metered kWh	Weather Normalized	Ratio% *	Weather Normal	Per customer
2005	264,617	115,889,998	0.23%	263,495	5,019
2006	255,784	116,451,494	0.22%	258,581	5,561
2007	220,922	125,363,223	0.18%	220,443	5,312
2008	173,292	127,869,857	0.13%	170,396	4,260
2009	255,272	128,179,255	0.20%	251,381	7,735
2010	322,731	134,028,817	0.24%	328,249	8,993
2011	310,190	135,441,583	0.23%	313,149	7,546
2012	290,376	137,784,492	0.21%	295,766	7,584
2013	264,550	139,378,146	0.19%	262,707	6,181
2014	250,496	139,918,878	0.18%	248,008	6,049
2015		141,440,742		232,411	5,810
2016		142,150,375		221,022	5,526

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Table 3.32- Street Lighting

Street lighting							
Year	kWh	kWh	kW	Customer/ Connection	kWh per connection	KW per connection	KW/kWh Ratio
2005	1,506,679	1,506,679	0	2,182	-	-	-
2006	1,581,465	1,581,465	0	2,260	-	-	-
2007	1,649,563	1,649,563	0	2,340	-	-	-
2008	1,743,400	1,743,400	0	2,422	-	-	-
2009	1,723,126	1,723,126	4,963	2,473	696.78	2.007	0.00288
2010	1,736,181	1,736,181	4,976	2,483	699.23	2.004	0.00287
2011	1,695,783	1,695,783	5,015	2,494	680.08	2.011	0.00296
2012	1,731,442	1,731,442	5,203	2,588	669.03	2.010	0.00300
2013	1,796,174	1,796,174	5,311	2,694	666.86	1.972	0.00296
2014	1,834,663	1,834,663	5,426	2,738	670.07	1.982	0.00296
2015	1,854,838	1,854,838	5,469	2,777	667.82	1.969	
2016	1,876,365	1,876,365	5,532	2,819	665.58	1.962	
Average Years =		5.00			677.05	1.996	0.00295

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Ex.3/Tab 1/Sch.14 - Final Normalized Load Forecast

Table 3.33 below present's historical and projected weather normalized Load Forecast by customer class. Table 3.33 does not include the CDM adjustment for adding back persistence savings from CDM programs related to the 2006-2014 CDM programs to the 2015 Bridge Year and 2016 Test year as discussed in Ex. 3/Tab 1/Sch. 8. Additionally, forecasted CDM savings for the 2015 Bridge Year and 2016 Test year are not included.

Table 3.33: Final Load Forecast (not CDM adjusted)

	Year	2012	2013	2014	2015	2016
Residential-WN	Cust/Conn	11,609	11,857	12,082	12,256	12,440
	kWh	82,588,039	86,276,532	87,611,190	89,412,358	89,680,703
	kW	-	-	-	-	-
General Service < 50 kW-WN	Cust/Conn	786	784	783	786	789
	kWh	15,746,950	16,432,348	16,552,639	17,720,618	17,973,449
	kW	-	-	-	-	-
General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant-Non-WN/kW	Cust/Conn	35	35	36	37	37
	kWh	17,613,528	17,691,775	17,311,423	17,699,763	17,862,555
	kW	47,595	46,867	45,989	46,610	47,039
General Service > 50 kW - 4999 kW - Wholesale Market Participant-Non-WN/kW	Cust/Conn	1	1	1	1	1
	kWh	3,761,856	3,594,884	3,453,199	4,017,753	3,980,583
	kW	6,699	6,557	6,080	7,062	6,996
Streetlighting-Non-WN/kW	Cust/Conn	2,588	2,694	2,738	2,777	2,819
	kWh	1,731,442	1,796,174	1,834,663	1,854,838	1,876,365
	kW	5,203	5,311	5,426	5,469	5,532
Unmetered Scattered Load-WN	Cust/Conn	39	43	41	40	40
	kWh	264,550	250,496	247,974	232,411	221,022
	kW	-	-	-	-	-
Total	Cust/Conn	15,058	15,413	15,681	15,897	16,126
	kWh	121,706,363	126,042,209	127,011,089	130,937,741	131,594,678
	kW	59,497	58,734	57,496	59,141	59,567

Impact and Persistence from Historical CDM Programs

Ex.3/Tab 2/Sch.1 - Load Forecast CDM Adjustments

2006-2014 CDM Activity:

As discussed in Ex. 3/Tab 1/Sch. 8. WDI added back the impact of CDM from 2006 to 2014 (adjusted for losses) back to the actual wholesale purchases (loss adjusted). Furthermore, WDI added back CDM kWh savings on metered consumption (not loss adjusted) as discussed in Ex. 3/Tab 1/Sch. 12. So far this Exhibit has presented a forecast that was presented in Ex. 3/Tab 1/Sch. 14 that has, in theory, removed the overall impact of CDM using the data that was prepared for WDI from the IESO.

For the purpose of presenting a reasonable forecast for Billed kWhs for the 2015 Test and 2016 Bridge Year. WDI has made an adjustment to subtract CDM activity (the persistence) for the 2015 Bridge and 2016 Test Year relating to CDM activity specific to the years 2006-2014. This is to align with WDI's CDM treatment within this load forecasting model. To do this WDI has subtracted the persistence from the Final Normalized Load Forecast presented in Table 3.33 (Ex. 3/Tab 1/Sch. 14) for the CDM saving achieved during the year 2006 to 2014 for the 2015 Bridge and 2016 Test Year. Persistence savings from 2006-2016 is presented in from the data illustrated in Table 3.34.

Table 3.34: 2006-2014 CDM kWh savings and persistence

	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
2006	688,739	688,739	688,739	688,739	119,619	119,619	109,419	109,419	102,816	102,816	97,138
2007	-	756,950	418,365	376,089	376,089	376,089	365,749	365,749	365,749	132,423	97,627
2008	-	-	452,437	387,504	387,504	387,504	353,525	353,418	318,146	291,795	218,102
2009	-	-	-	693,054	659,271	659,271	658,281	643,657	572,126	556,272	555,926
2010	-	-	-	-	416,265	335,469	334,445	334,443	322,292	230,658	226,868
2011	-	-	-	-	-	293,579	293,574	293,574	213,327	195,744	131,735
2012	-	-	-	-	-	25,014	626,024	624,544	624,544	550,311	540,814
2013	-	-	-	-	-	-	2,342	226,046	225,051	221,728	201,191
2014	-	-	-	-	-	-	14,341	4,535	799,955	786,430	688,332
Total CDM	688,739	1,445,689	1,559,541	2,145,387	1,958,748	2,196,544	2,757,700	2,955,385	3,544,006	3,068,176	2,757,734
Persistence	-	688,739	1,107,104	1,452,332	1,542,483	1,877,951	2,140,007	2,741,487	2,762,927	3,068,176	2,757,734

Total persistence related to CDM programs from 2006-2014 is subtracted from Final Normalized Load Forecast presented in Table 3.33 (Ex. 3/Tab 1/Sch. 14) for the 2015 Bridge and 2016 Test Year is 3,068,176 kWh for the 2015 Bridge Year, and 2,757,734 kWh for the 2016 Test Year.

1 WDI gathered this information, provided by the IESO from WDI's 2006-2010 Final CDM results,
 2 WDI's 2011-2014 Final CDM results, WDI's 2012 Gross-Net Savings and WDI's 2013 Gross-
 3 Net Savings documents for the CDM lifecycle used for persistence. These documents included
 4 persistence savings up to and beyond the year 2025. The IESO did not provide WDI with a
 5 2011 or 2014 Gross-Net Savings document that would have included persistence savings.
 6 Therefore, WDI has applied the identical lifecycle approach that was applied to 2012 Gross-Net
 7 Savings for persistence for 2011 and WDI applied the identical lifecycle approach that was
 8 applied in 2013 for 2014.

9
 10 CDM persistence savings for the 2015 Bridge and 2016 Test Year related to 2006-2014 CDM
 11 programs is illustrated by customer class in Table 3.35. WDI has manually separated the CDM
 12 kWh savings by class which was possible due to the limited quantity of larger commercial
 13 projects for the retrofit programs for GS > 50 kW customers.

Table 3.35: Persistence savings by Rate Class

	2015	2016
GS<50	876,404	771,668
Residential	1,457,170	1,251,463
GS>50	321,201	326,868
GS>50 - WMP	413,401	407,734
Total CDM	3,068,176	2,757,734

17
 18
 19 WDI has adjusted the Final Normalized Load Forecast presented in Table 3.33 (Ex. 3/Tab 1/Sch.
 20 14) for the persistence savings by Rate Class as illustrated in Table 3.35. This is discussed
 21 further in Ex. 3/Tab 2/Sch. 2.

2015-2020 CDM Activity:

22
 23
 24 WDI's 2015-2020 assigned CDM target is 6,300,000 kWh. To achieve this WDI has allocated
 25 1/6th of the target for each of the years less the expected LED street light conversion project of
 26 1,265,080 kWh. Therefore, WDI is forecasting CDM savings of 839,253 kWh per year from
 27 2015-2020 with an additional savings of 1,265,080 kWh occurring in 2015/2016 resulting from a
 28 LED street light conversion. Table 3.36 illustrates WDI's 2015-2020 CDM Targets.

Table 3.36: 2015-2020 CDM Targets

6 Year (2015-2020) kWh Target:							
6,300,000							
	2015	2016	2017	2018	2019	2020	Total
	%						
2015 CDM Programs	0.00%						0.00%
2016 CDM Programs		13.32%					13.32%
2017 CDM Programs			13.32%				13.32%
2018 CDM Programs				13.32%			13.32%
2019 CDM Programs					13.32%		13.32%
2020 CDM Programs						13.32%	13.32%
Total in Year	0.00%	13.32%	13.32%	13.32%	13.32%	13.32%	66.60%
kWh							
2015 CDM Programs		2,104,233					2,104,233.33
2016 CDM Programs		839,153					839,153.35
2017 CDM Programs			839,153				839,153.35
2018 CDM Programs				839,153			839,153.35
2019 CDM Programs					839,153		839,153.35
2020 CDM Programs						839,153	839,153.35
Total in Year	-	2,943,386.68	839,153.35	839,153.35	839,153.35	839,153.35	6,300,000.08

WDI's Weight Factors presented in Table 3.37 have been chosen because of the methodology WDI has applied to CDM persistence savings for 2006-2014 CDM programs. If WDI had chosen the default values, WDI would have double counted a half year in 2014.

Table 3.27: Weight Factor for Inclusion in CDM Adjustment to 2016 Load Forecast

	2011	2012	2013	2014	2015	2015	
Weight Factor for each year's CDM program impact on 2014 load forecast	0	0	0	0	1	0.5	Distributor can select "0", "0.5", or "1" from drop-down list
Default Value selection rationale.	<i>Full year persistence of 2011 CDM programs on 2015 load forecast. Full impact assumed because of 50% impact in 2011 (first year) but full year persistence impact on 2012 and 2013, and thus reflected in base forecast before the CDM adjustment.</i>	<i>Full year persistence of 2012 CDM programs on 2015 load forecast. Full impact assumed because of 50% impact in 2012 (first year) but full year persistence impact on 2013, and thus reflected in base forecast before the CDM adjustment.</i>	<i>Default is 0, but one option is for full year impact of 2013 CDM programs on 2015 load forecast, but 50% impact in base forecast (first year) impact of 2013 CDM programs on 2013 load forecast, which is part of the load forecast.</i>	<i>Default is 0, but one option is for full year impact of 2014 CDM programs on 2014 load forecast, but 50% impact in base forecast (first year) impact of 2014 CDM programs on 2014 actuals, which is part of the data for the load forecast.</i>	<i>Full year impact of 2015 programs on 2015 load forecast. 2015 CDM program impacts are not in the base forecast.</i>	<i>Only 50% of 2016 CDM programs are assumed to impact the 2016 load forecast based on the "half-year" rule.</i>	

1 **Street Lights:**

2 WDI has been in talks with the Town of Wasaga Beach, regarding a municipal street light LED
 3 conversion project. Currently, there is an application that has been submitted from the Town of
 4 Wasaga Beach seeking an incentive for CDM activities scheduled to be completed prior to 2015
 5 (kWh savings were 1,373,891 kWh). Although WDI has further been in discussion and it is felt,
 6 that although the project will not be 100% completed by the end of 2015, the conversion is
 7 expected to be completed within the 1st quarter of 2016. For the forecast WDI has used the kWh
 8 savings identified through an investment grade audit prepared August 14th, 2015 for the Town of
 9 Wasaga Beach identifying 1,265,080 kWh of energy savings which is the most recent data
 10 available.

11
 12 Table 3.38 illustrates the CDM adjustments made for the load forecast and the proposed
 13 LRAMVA threshold.
 14

15 **Table 3.38 CDM Impact and LRAMVA Threshold**

	2011 kWh	2012 kWh	2013 kWh	2014 kWh	2015 kWh	2016 kWh	Total for 2016
Amount used for CDM threshold for LRAMVA (2014)	286,933.00	616,213.00	227,322.00	781,079.00			
forecast (per Board Decision in distributor's most recent Cost of Service Application) (enter as negative)	-	802,000.00	- 802,000.00	- 802,000.00			
Amount used for CDM threshold for LRAMVA (2016)					2,104,233.33	839,153.35	2,943,386.68
Manual Adjustment for 2016 Load Forecast (billed basis)	-	-	-	-	2,104,233.33	419,576.68	2,523,810.01
Proposed Loss Factor (TLF)	8.02%						
Manual Adjustment for 2016 Load Forecast (system purchased basis)	-	-	-	-	2,272,992.84	453,226.72	2,726,219.57

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 17

1 **Ex.3/Tab 2/Sch.2 – Allocation of CDM Results**

2 The overall CDM adjustment for 2015 and 2016 is shown in Table 3.38 (Ex.3/Tab 2/Sch. 1). The
3 manual adjustment used for the load forecast (target) is allocated on pro-rata basis using the
4 2016 kWh forecast provided in Table 3.33, (Ex 3.3/Tab1/Sch. 14) per class excluding the
5 forecasted LED Streetlight conversion project and the USL class. All residual amounts were
6 allocated to the Residential Customer Class.

7

8 Table 3.39 below illustrates the method behind WDI's allocation of CDM reduction in
9 consumption per class which includes the adjustment to the 2006-2014 persistence, included in
10 the manual reallocation column and discussed in Ex. 3/Tab 2/Sch. 1, and the manual
11 adjustment for the load forecast for CDM results for 2015 and 2016 were included in the target
12 column. kW's were allocated on kWh to kW ratio basis using actual 2016 load forecasted
13 provided in Table 3.33 (Ex. 3/Tab 1/Sch. 14).

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Table 3.39: CDM Adjustments to Load Forecast

kWh	2015				
	Share	Target	Adjusted (kWh)	Manual Reallocation	Final Adjusted (kWh)
Residential	28.16%	296,298	89,116,059	1,457,169	87,658,890
General Service < 50 kW	5.20%	54,682	17,665,936	876,404	16,789,532
General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	5.44%	57,189	17,642,574	321,201	17,321,373
General Service > 50 kW - 4999 kW - Wholesale Market Participant	1.08%	11,408	4,006,346	413,401	3,592,944
Streetlighting	60.12%	632,540	1,222,298	-	1,222,298
Unmetered Scattered Load	0.00%	0	232,411	-	232,411
Total	100.00%	1,052,117	129,885,624	3,068,176	126,817,449

2016				
Share	Target	Adjusted (kWh)	Manual Reallocation	Final Adjusted (kWh)
35.22%	888,902	88,791,802	1,251,463	87,540,339
6.50%	164,043	17,809,406	771,668	17,037,738
6.80%	171,563	17,690,993	326,868	17,364,124
1.36%	34,223	3,946,360	407,734	3,538,626
50.13%	1,265,080	611,285	-	611,285
0.00%	0	221,022	-	221,022
100.00%	2,523,810	129,070,868	2,757,734	126,313,135

	Adjusted (kWh)	Manual Reallocation	Final Adjusted (kWh)
Residential	0	0	0
General Service < 50 kW	0	0	0
General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	46,459	846	45,614
General Service > 50 kW - 4999 kW - Wholesale Market Participant	7,042	727	6,315
Streetlighting	3,604	0	3,604
Unmetered Scattered Load	0	0	0
Total	57,105	1,572	55,532

Adjusted (kWh)	Manual Reallocation	Final Adjusted (kWh)
0	0	0
0	0	0
46,587	861	45,726
6,936	717	6,220
1,802	0	1,802
0	0	0
55,325	1,577	53,748

1 WDI intends to use the 2016 LRAMVA threshold by customer class by kWh and kW presented
 2 in Table 3.40.

3

4

Table 3.40: 2016 LRAMVA Thresholds by Customer Class

Customer Class	LRAMVA Threshold (kWh)	LRAMVA Threshold (kW)
Residential	1,185,200	-
General Service < 50 kW	218,725	-
General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	228,751	602
General Service > 50 kW - 4999 kW - Wholesale Market Participant	45,631	80
Street Lighting	1,265,080	3,730
Unmetered Scattered Load	-	-
Total	2,943,387	4,412

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Final Weather Adjusted Load Forecast

Ex.3/Tab 3/Sch.1 - Final Weather Adjusted Load Forecast

Table 3.41 provides details of the final average customer during the year and final volume load forecast for the 2015 Bridge and 2016 Test Year. Additionally, Table 3.41 provides the 2012-2014 actual average customers during the year and actual load. This summary of the billing determinants by rate class will be used to develop WDI's proposed rates.

Table 3.41: Final Customer and Volume Load Forecast

Year	2012	2013	2014	2015	2016	
Residential	Cust/Conn	11,609	11,857	12,082	12,256	12,440
	kWh	82,588,039	86,276,532	87,611,190	87,658,890	87,540,339
	kW	-	-	-	-	-
General Service < 50 kW	Cust/Conn	786	784	783	786	789
	kWh	15,746,950	16,432,348	16,552,639	16,789,532	17,037,738
	kW	-	-	-	-	-
General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant	Cust/Conn	35	35	36	37	37
	kWh	17,613,528	17,691,775	17,311,423	17,321,373	17,364,124
	kW	47,595	46,867	45,989	45,614	45,726
General Service > 50 kW - 4999 kW - Wholesale Market Participant	Cust/Conn	1	1	1	1	1
	kWh	3,761,856	3,594,884	3,453,199	3,592,944	3,538,626
	kW	6,699	6,557	6,080	6,315	6,220
Streetlighting	Cust/Conn	2,588	2,694	2,738	2,777	2,819
	kWh	1,731,442	1,796,174	1,834,663	1,222,298	611,285
	kW	5,203	5,311	5,426	3,604	1,802
Unmetered Scattered Load	Cust/Conn	39	43	41	40	40
	kWh	264,550	250,496	247,974	232,411	221,022
	kW	-	-	-	-	-
Total	Cust/Conn	15,058	15,413	15,681	15,897	16,126
	kWh	121,706,363	126,042,209	127,011,089	126,817,449	126,313,135
	kW	59,497	58,734	57,496	55,532	53,748

Accuracy of Load Forecast and Variance Analysis

Ex.3/Tab 4/Sch.1 - Variance Analysis of Load Forecast

Table 3.42 below shows the yearly change in the average change in customer and consumption for the Residential class.

Table 3.42: Residential Variance

Residential				
Year	Customer	% Change	kWh	% Change
2005	9,440		74,670,218	
2006	9,858	4.4%	73,494,501	-1.6%
2007	10,274	4.2%	74,223,887	1.0%
2008	10,659	3.7%	78,678,925	6.0%
2009	10,919	2.4%	82,719,010	5.1%
2010	11,120	1.8%	84,575,464	2.2%
2011	11,371	2.3%	84,023,443	-0.7%
2012	11,609	2.1%	82,588,039	-1.7%
2013	11,857	2.1%	86,276,532	4.5%
2014	12,082	1.9%	87,611,190	1.5%
2015	12,256	1.4%	87,658,890	0.1%
2016	12,440	1.5%	87,540,339	-0.1%

The residential customer class has been growing steadily since 2005. The class has grown approximately 2.8% per year since, with the most recent 5 year growth trending closer to 2%. WDI has adjusted the growth as described in Ex. 3/Tab 1/Sch. 11. With the addition of 174 and 184 average customers projected for 2015 and 2016. WDI is expecting the increase in growth from addition of new customers to be offset by the allocated CDM savings based on the 2015-2020 target assigned by the IESO.

1 Table 3.43 below shows the yearly change in consumption for the GS<50 kW class.

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Table 3.43: GS < 50 kW Variance

General Service < 50 kW				
Year	Customer	% Change	kWh	% Change
2005	743		14,537,477	
2006	747	0.5%	14,223,774	-2.2%
2007	754	0.9%	14,339,658	0.8%
2008	757	0.3%	15,092,313	5.2%
2009	767	1.4%	15,369,940	1.8%
2010	777	1.2%	17,287,125	12.5%
2011	781	0.6%	16,948,879	-2.0%
2012	786	0.6%	15,746,950	-7.1%
2013	784	-0.3%	16,432,348	4.4%
2014	783	-0.1%	16,552,639	0.7%
2015	786	0.4%	16,789,532	1.4%
2016	789	0.4%	17,037,738	1.5%

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The number of customers in the GS<50 kW class have been steadily increasing over the past few years. WDI anticipates this trend to continue. A portion of the difference is attributable to reclassification of customers from GS<50 to GS>50 and vice versa. A primary reason for this is customers that are just either slightly over the demand requirements or slightly below. Conservation initiatives are having an impact on the change in reclassification. WDI anticipates an increase of 3 GS<50 customer for 2015 and another 3 customers in 2016. The methodology behind the projections for 2015 and 2016 are explained at Ex. 3/Tab 1/Sch. 11.

1 Table 3.44 below shows the yearly change in consumption and customer count for the GS>50
 2 kW class.

Table 3.44: GS>50 kW Variance

General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant						
Year	Customer	% Change	kWh	% Change	kW	% Change
2005	42		12,388,794		0	
2006	41	-3.6%	12,633,564	2.0%	0	0.0%
2007	36	-11.1%	14,970,174	18.5%	0	0.0%
2008	31	-13.9%	17,386,049	16.1%	0	0.0%
2009	30	-3.2%	16,872,488	-3.0%	43,812	0.0%
2010	31	3.3%	17,629,407	4.5%	44,116	0.7%
2011	33	4.8%	17,073,810	-3.2%	45,359	2.8%
2012	35	7.7%	17,613,528	3.2%	47,595	4.9%
2013	35	0.0%	17,691,775	0.4%	46,867	-1.5%
2014	36	2.9%	17,311,423	-2.1%	45,989	-1.9%
2015	37	2.8%	17,321,373	0.1%	45,614	-0.8%
2016	37	0.0%	17,364,124	0.2%	45,726	0.2%

General Service > 50 kW - 4999 kW - Wholesale Market Participant						
Year	Customer	% Change	kWh	% Change	kW	% Change
2005	1		994,199		0	
2006	1	0.0%	4,233,264	325.8%	0	0.0%
2007	1	0.0%	4,141,944	-2.2%	0	0.0%
2008	1	0.0%	4,099,393	-1.0%	0	0.0%
2009	1	0.0%	4,143,210	1.1%	7,024	0.0%
2010	1	0.0%	4,263,663	2.9%	7,301	3.9%
2011	1	0.0%	4,201,223	-1.5%	7,186	-1.6%
2012	1	0.0%	3,761,856	-10.5%	6,699	-6.8%
2013	1	0.0%	3,594,884	-4.4%	6,557	-2.1%
2014	1	0.0%	3,453,199	-3.9%	6,080	-7.3%
2015	1	0.0%	3,592,944	4.0%	6,315	3.9%
2016	1	0.0%	3,538,626	-1.5%	6,220	-1.5%

5
 6 The customer count for the GS>50 kW class, (which includes a Wholesale Market Participant)
 7 has seen slight growth from the addition of two large supermarkets and a large commercial
 8 development that included large chain restaurants within the last ten years. Although, WDI
 9 does not forecast a change in this account in the test year as there are no commercial
 10 developments currently being constructed within the Town boundaries. WDI is aware of a
 11 couple of GS>50 kW customers currently undertaking CDM projects and it is reasonable to
 12 assume that a decrease is possible once these borderline GS>50 kW customers projects are

1 completed. Therefore WDI felt it was appropriate to assume a stable customer count for the
 2 class.

3
 4 Table 3.45 below shows the yearly change in consumption and connection count for the Street
 5 Light class.

Table 3.45: Street Light Variance

Street lighting						
Year	Connection	% Change	kWh	% Change	kW	% Change
2005	2,182		1,506,679		0	
2006	2,260	3.6%	1,581,465	5.0%	0	0.0%
2007	2,340	3.6%	1,649,563	4.3%	0	0.0%
2008	2,422	3.5%	1,743,400	5.7%	0	0.0%
2009	2,473	2.1%	1,723,126	-1.2%	4,963	0.0%
2010	2,483	0.4%	1,736,181	0.8%	4,976	0.3%
2011	2,494	0.4%	1,695,783	-2.3%	5,015	0.8%
2012	2,588	3.8%	1,731,442	2.1%	5,203	3.8%
2013	2,694	4.1%	1,796,174	3.7%	5,311	2.1%
2014	2,738	1.7%	1,834,663	2.1%	5,426	2.2%
2015	2,777	1.4%	1,222,298	-33.4%	3,604	-33.6%
2016	2,819	1.5%	611,285	-50.0%	1,802	-50.0%

8
 9 WDI projects a slight increase in its Street Lights for both 2015 and 2016 that would coincide
 10 with the expected residential growth.

11
 12 The Town of Wasaga Beach together with WDI is planning a street light retrofit program to
 13 begin during the 4th quarter of 2015. Benefits of the LED light fixtures over High Pressure
 14 Sodium fixtures include:

- 15 • Longevity and decreased energy consumption
- 16 • Control of light dispersion spreads light out evenly and reduces light pollution and
 17 light trespass
- 18 • Reduces CO2 emissions

19 The utility estimates that the conversion from the conventional street lighting to LED technology
 20 will result in power consumption reductions and has incorporated a reduction based on the
 21 application submitted by the Town through the SaveONenergy programs and their Investment
 22 Grade Audit completed August 15th, 2015.

23

1 Table 3.46 below shows the yearly change in consumption and connections for the USL class.

2

3

Table 3.46: USL Variance

Unmetered Scattered Load				
Year	Connections	% Change	kWh	% Change
2005	53		264,617	
2006	47	-11.4%	255,784	-3.3%
2007	42	-10.8%	220,922	-13.6%
2008	40	-3.6%	173,292	-21.6%
2009	33	-18.8%	255,272	47.3%
2010	37	12.3%	322,731	26.4%
2011	42	13.7%	310,190	-3.9%
2012	39	-6.0%	264,550	-14.7%
2013	43	9.0%	250,496	-5.3%
2014	41	-3.5%	248,008	-1.0%
2015	40	-2.4%	232,411	-6.3%
2016	40	0.0%	221,022	-4.9%

4

5 WDI does not anticipate any changes in USL connections. WDI overwrote the model projections
 6 to keep its connections count at the same levels.

7

8 In summary, WDI expects a slight increase in the Residential, GS<50 and Streetlight Class. The
 9 increase is being offset by the decrease in load associated with CDM initiatives including the
 10 Street Light LED conversion. Secondly, additional energy consumption that does not depend on
 11 the weather (often referred to as "baseload" energy consumption) is often offset by the
 12 additional transitioning to energy efficient lighting, appliances and other energy efficient changes.

13 Table 3.47 below provides details of the variances by rate class.

14

Table 3.47: Variance Analysis by Class

	Year	2015	2016	Variance
Residential	Cust/Conn	12,256	12,440	184
	kWh	87,658,890	87,540,339	- 118,551
	kW	-	-	-
General Service < 50 kW	Cust/Conn	786	789	3
	kWh	16,789,532	17,037,738	248,206
	kW	-	-	-
General Service > 50 kW - 4999 kW	Cust/Conn	37	37	-
	kWh	17,321,373	17,364,124	42,752
	kW	45,614	45,726	113
General Service > 50 kW - 4999 kW	Cust/Conn	1	1	-
	kWh	3,592,944	3,538,626	- 54,318
	kW	6,315	6,220	- 95
Streetlighting	Cust/Conn	2,777	2,819	42
	kWh	1,222,298	611,285	- 611,013
	kW	3,604	1,802	- 1,802
Unmetered Scattered Load	Cust/Conn	40	40	-
	kWh	232,411	221,022	- 11,389
	kW	-	-	-
Total	Cust/Conn	15,897	16,126	229
	kWh	126,817,449	126,313,135	- 504,314
	kW	55,532	53,748	- 1,784

Table 3.48 below presents the actual average use per customer, by customer class, and historical and adjusted forecast average use per customer generated using the load forecast. As can be seen from the results below, the predicted use per customer follows the trend created from its historical usage per customer. WDI has also presented Board Appendix 2-IA in Table 3.49

Table 3.48: Average per customer use

Year	Residential		General Service < 50 kW		General Service > 50 kW - 4999 kW - Excluding Wholesale Market Participant		General Service > 50 kW - 4999 kW - Wholesale Market Participant		Street lighting		Unmetered Scattered Load	
	per cust kWh	per cust kW	per cust kWh	per cust kW	per cust kWh	per cust kW	per connection kWh	per connection kW	per cust kWh	per cust kW	per cust kWh	per cust kW
2005	7,910	0	19,566	0	294,971	0	994,199	-	691	0.00	5,040	0
2006	7,456	0	19,041	0	311,940	0	4,233,264	-	700	0.00	5,501	0
2007	7,225	0	19,018	0	415,838	0	4,141,944	-	705	0.00	5,323	0
2008	7,382	0	19,950	0	560,840	0	4,099,393	-	720	0.00	4,332	0
2009	7,576	0	20,039	0	562,416	1,460	4,143,210	7,024	697	2.01	7,855	0
2010	7,606	0	22,263	0	568,691	1,423	4,263,663	7,301	699	2.00	8,842	0
2011	7,390	0	21,702	0	525,348	1,396	4,201,223	7,186	680	2.01	7,474	0
2012	7,114	0	20,034	0	503,244	1,360	3,761,856	6,699	669	2.01	6,783	0
2013	7,276	0	20,960	0	505,479	1,339	3,594,884	6,557	667	1.97	5,894	0
2014	7,251	0	21,140	0	480,873	1,277	3,453,199	6,080	670	1.98	6,049	0
2015	7,152	0	21,361	0	468,145	1,233	3,592,944	6,315	440	1.30	5,810	0
2016	7,037	0	21,594	0	469,301	1,236	3,538,626	6,220	217	0.64	5,526	0

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Table 3.49: OEB Appendix 2-IA Summary and Variances of Actual and Forecast Data

	2012 Board Approved	2012	2013	2014	2015 Bridge	2016 Test
Residential						
# of Customers	11,614	11,609	11,857	12,082	12,256	12,440
kWh	85,253,972	85,253,972	85,253,972	85,253,972	87,658,890	87,540,339
kW						
Variance Analysis						
# of Customers		-0.04%	2.09%	4.03%	5.53%	7.11%
kWh		0.00%	0.00%	0.00%	2.82%	2.68%
kW		0.00%	0.00%	0.00%	0.00%	0.00%
GS < 50 kW						
# of Customers	791	791	791	791	786	789
kWh	17,532,074	17,532,074	17,532,074	17,532,074	16,789,532	17,037,738
kW						
Variance Analysis						
# of Customers		0.00%	0.00%	0.00%	-0.63%	-0.25%
kWh		0.00%	0.00%	0.00%	-4.24%	-2.82%
kW		0.00%	0.00%	0.00%	0.00%	0.00%
GS > 50 kW						
# of Customers	34	36	36	37	38	38
kWh	20,862,622	21,375,383	21,286,659	20,764,622	20,914,317	20,902,751
kW	52,968	52,968	52,968	52,968	51,929	51,946
Variance Analysis						
# of Customers		5.88%	5.88%	8.82%	11.76%	11.76%
kWh		2.46%	2.03%	-0.47%	0.25%	0.19%
kW		0.00%	0.00%	0.00%	-1.96%	-1.93%
Streetlighting						
# of Connections	2,525	2,588	2,694	2,738	2,777	2,819
kWh	1,691,769	1,731,442	1,796,174	1,834,663	1,222,298	611,285
kW	4,771	5,203	5,311	5,426	3,604	1,802
Variance Analysis						
# of Connections		2.50%	6.67%	8.44%	10.00%	11.65%
kWh		2.35%	6.17%	8.45%	-27.75%	-63.87%
kW		9.05%	11.31%	13.73%	-24.46%	-62.22%
USL						
# of Customers	45	39	43	41	40	40
kWh	297,067	264,550	250,496	247,974	232,411	221,022
kW						
Variance Analysis						
# of Customers		-13.33%	-5.56%	-8.89%	-11.11%	-11.11%
kWh		-10.95%	-15.68%	-16.53%	-21.76%	-25.60%
kW		0.00%	0.00%	0.00%	0.00%	0.00%

Totals

Customers / Connections	15,009	15,063	15,420	15,689	15,897	16,126
kWh	125,637,504	126,157,421	126,119,375	125,633,306	126,817,449	126,313,135
kW from applicable classes	57,739	58,171	58,279	58,394	55,532	53,748

Totals - Variance

Customers / Connections		0.36%	2.74%	4.53%	5.92%	7.44%
kWh		0.41%	0.38%	0.00%	0.94%	0.54%
kW from applicable classes		0.75%	0.93%	1.13%	-3.82%	-6.91%

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1 **Other Revenues**

2 **Ex. 3/Tab 5/Sch. 1 - Overview of Other Revenue**

3

4 Other Distribution Revenues are revenues that are distribution related but are sourced from
5 means other than distribution rates. For this reason, other revenues are deducted from WDI's
6 proposed revenue requirement. Further details on the derivation of the Revenue Requirement
7 are presented at Exhibit 6.

8

9 Other Distribution Revenues includes items such as:

- 10 • Specific Service Charges
- 11 • Late Payment Charges
- 12 • Other Distribution Revenues
- 13 • Other Income and Expenses

OEB Appendix 2-F Other Operating Revenues:

A detailed breakdown by USoA account is shown in Table 3.50 - OEB Appendix 2-H. Year over year variance analysis follow at Ex.3/Tab 1/Sch. 2.

Table 3.50: OEB Appendix 2-H Other Operating Revenue

USoA #	USoA Description	Actual Year ²	Actual Year ²	Actual Year ²	Actual Year ²	Bridge Year ²	Test Year
		2012	2013	2014	2014	2015	2016
<i>Reporting Basis</i>		CGAAP	CGAAP	CGAAP	MIFRS	MIFRS	MIFRS
4235	Specific Service Charges	114,733	107,085	109,995	109,995	111,150	113,010
4225	Late Payment Charges	30,948	28,227	32,120	32,120	32,565	32,565
4082	Retail Services Revenues	9,278	7,342	8,941	8,941	9,000	9,000
4084	Service Transaction Requests	354	458	250	250	450	300
4086	SSS Administration	39,354	37,143	37,943	37,943	39,655	40,359
4210	Rent from Electric Property	296,023	308,202	304,539	304,539	306,112	306,595
4215	Other Utility Operating	5,546	5,996	286	286	2,000	2,000
4355	Gain on Disposition	8,741	6,051	7,997	7,997	-	7,500
4360	Loss on Disposition	-	-	-	-	-	-
		59,739	7,607	5,676	5,676	38,737	51,952
4390	Miscellaneous Non-Operating	70,259	4,053	711	711	25,962	-
4405	Interest and Dividend	120,800	62,063	34,360	34,360	35,000	15,000
Specific Service Charges		114,733	107,085	109,995	109,995	111,150	113,010
Late Payment Charges		30,948	28,227	32,120	32,120	32,565	32,565
Other Operating Revenues		350,555	359,141	351,959	351,959	357,217	358,254
Other Income or Deductions		140,061	64,560	37,392	37,392	22,225	-
Total		636,297	559,013	531,466	531,466	523,157	474,377

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Account 4235 - Specific Service Charges	2012 Actual	2013 Actual	2014 Actual	2014 Actual	Bridge Year²	Test Year
					2015	2016
Reporting Basis	CGAAP	CGAAP	CGAAP	MIFRS	MIFRS	MIFRS
Miscellaneous Charges	-	-	1	1	-	-
Disconnect/Reconnect - Regular	5,460	10,140	9,230	9,230	10,000	10,000
Disconnect/Reconnect - After Hours	3,330	185	-	-	925	925
Disconnect/Reconnect - At Pole	370	370	185	185	185	185
Occupancy Charges	40,380	39,510	37,500	37,500	40,000	40,000
Collection Charges	51,930	49,440	56,400	56,400	53,000	53,000
Reference Letters	75	135	150	150	180	180
NSF Charges	4,500	4,075	3,950	3,950	4,000	4,000
Lawyer Letters	234	324	180	180	300	300
Account History Charges	763	1,380	828	828	1,000	1,000
Late Payment Penalty Recovery	6,394	-	-	-	-	-
Meter Dispute Charges	30	30	60	60	60	60
Micro-Fit Service Charges	1,267	1,496	1,511	1,511	1,500	3,360
Total	114,733	107,085	109,995	109,995	111,150	113,010

Account 4225 - Late Payment Charges	2012 Actual	2013 Actual	2014 Actual	2014 Actual	Bridge Year²	Test Year
					2,015	2,016
Reporting Basis	CGAAP	CGAAP	CGAAP	MIFRS	MIFRS	MIFRS
Residential	23,049	22,225	25,432	25,432	26,000	26,000
GS<50	6,252	5,363	5,039	5,039	5,500	5,500
GS>50	1,532	338	1,397	1,397	750	750
USL	116	301	-	-	315	315
Total	30,948	28,227	31,868	31,868	32,565	32,565

Account 4210 - Rent form Electric Property	2012 Actual	2013 Actual	2014 Actual	2014 Actual	Bridge Year²	Test Year
					2,015	2,016
Reporting Basis	CGAAP	CGAAP	CGAAP	MIFRS	MIFRS	MIFRS
Pole Rentals	125,829	127,668	123,985	123,985	125,000	125,000
Building Rental - Affiliate	144,162	152,130	152,130	152,130	152,130	152,130
Land Lease Rental - Affiliate	23,232	23,604	23,625	23,625	24,182	24,666
Bell Mobility Wi-Fi Rental	2,800	4,800	4,800	4,800	4,800	4,800
Total	296,023	308,202	304,539	304,539	306,112	306,595

Account 4405 - Interest and Dividend Income	2012 Actual	2013 Actual	2014 Actual	2014 Actual	Bridge Year²	Test Year
					2,015	2,016
Reporting Basis	CGAAP	CGAAP	CGAAP	MIFRS	MIFRS	MIFRS
Regulatory Interest Income	28,131	-	-	-	-	-
Interest on investments	68,980	48,561	21,682	21,682	20,000	-
Interest on Bank Balances	23,688	13,502	12,677	12,677	15,000	15,000
Total	120,800	62,063	34,360	34,360	35,000	15,000

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Ex.3/Tab 5/Sch.2 - Other Revenue Variance Analysis

Table 3.51 to 3.56 below presents year over year variances of other operating revenues:

Table 3.51: Variance Analysis of Other Operating Revenues

	<i>Reporting Basis</i>	CGAAP	CGAAP	Variance	Variance
		2012	2012	\$	%
	USoA Description	Board Approved			
4235	4235-Miscellaneous Service Revenues	106,012	114,733	8,721	8.23%
4225	4225-Late Payment Charges	32,000	30,948	-1,052	3.29%
4082	4082-Retail Services Revenues	9,355	9,278	-77	0.82%
4084	4084-Service Transaction Requests (STR) Revenues	452	354	-98	-21.68%
4086	4086-SSS Administration Revenue	37,455	39,354	1,899	5.07%
4210	4210-Rent from Electric Property	292,394	296,023	3,629	1.24%
4215	4215-Other Utility Operating Income	0	5,546	5,546	
4355	4355-Gain on Disposition of Utility and Other Property	0	8,741	8,741	
4360	4360-Loss on Disposition of Utility and Other Property	0	-59,739	-59,739	
4390	4390-Miscellaneous Non-Operating Income	5,000	70,259	65,259	1305.18%
4405	4405-Interest and Dividend Income	100,230	120,800	20,570	20.52%
	Total	582,898	636,297	53,399	9.16%

	Specific Service Charges	106,012	114,733	8,721	8.23%
	Late Payment Charges	32,000	30,948	-1,052	3.29%
	Other Distribution/Operating Revenues	339,656	350,555	10,899	3.21%
	Other Income or Deductions	105,230	140,061	34,831	33.10%
	Total	582,898	636,297	53,399	9.16%

Variance between 2012 Board Approved (CGAAP) and 2012 Actual (CGAAP):

Between The 2012 Board Approved and 2012 Actual, Account 4360 and 4390 were over forecasted. WDI wrote off a prior year balance in 2012 that was reflected in account 4390. Account 4360 balance was attributed to a one time Smart Meter write off of first generation commercial meters that was not forecasted for in WDI's 2012 COS. Additionally, Account 4405 includes approximately \$30,000 in interest from regulatory variance dispositions.

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Table 3.52: Variance Analysis of Other Operating Revenues

	Reporting Basis	CGAAP	CGAAP	Variance	Variance
		2012	2013	\$	%
	USoA Description				
4235	4235-Miscellaneous Service Revenues	114,733	107,085	-7,648	6.67%
4225	4225-Late Payment Charges	30,948	28,227	-2,721	8.79%
4082	4082-Retail Services Revenues	9,278	7,342	-1,936	20.87%
4084	4084-Service Transaction Requests (STR) Revenues	354	458	104	29.38%
4086	4086-SSS Administration Revenue	39,354	37,143	-2,211	5.62%
4210	4210-Rent from Electric Property	296,023	308,202	12,179	4.11%
4215	4215-Other Utility Operating Income	5,546	5,996	450	8.11%
4220	4220-Other Electric Revenues	0	0	0	
4355	4355-Gain on Disposition of Utility and Other Property	8,741	6,051	-2,690	30.77%
4360	4360-Loss on Disposition of Utility and Other Property	-59,739	-7,607	52,132	87.27%
4390	4390-Miscellaneous Non-Operating Income	70,259	4,053	-66,206	94.23%
4405	4405-Interest and Dividend Income	120,800	62,063	-58,737	48.62%
	Total	636,297	559,015	-77,282	12%

	Specific Service Charges	114,733	107,085	-7,648	6.67%
	Late Payment Charges	30,948	28,227	-2,721	8.79%
	Other Distribution/Operating Revenues	350,555	359,141	8,586	2.45%
	Other Income or Deductions	140,061	64,562	-75,499	53.90%
	Total	636,297	559,015	-77,282	12.15%

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3 **Variance between 2012 Actual (CGAAP) and 2013 Actual (CGAAP):**

4 The overall variances between 2012 and 2013 were mostly related to the decrease in interest
 5 and dividend revenue. As noted in previous year WDI had approximately \$30,000 in interest
 6 from regulatory variance dispositions that did not reoccur in 2013. Interest income has
 7 decreased with the decrease in cash the corporation has experienced with the disposition of
 8 deferral accounts that had been in credit positions. With the returning of these funds through
 9 rate riders WDI experienced decreased cash causing decreased investments and
 10 corresponding decreased interest.

11

12 In 2013, the balances WDI wrote off in 2012 that were reflected in account 4390 and account
 13 4360, attributed to a one time Smart Meter write off of first generation commercial meters did
 14 not reoccur.

Table 3.53: Variance Analysis of Other Operating Revenues

	Reporting Basis	CGAAP	CGAAP	Variance	Variance
		2013	2014	\$	%
	USoA Description				
4235	4235-Miscellaneous Service Revenues	107,085	109,995	2,910	2.72%
4225	4225-Late Payment Charges	28,227	32,120	3,893	13.79%
4082	4082-Retail Services Revenues	7,342	8,941	1,599	21.78%
4084	4084-Service Transaction Requests (STR) Revenues	458	250	-209	45.52%
4086	4086-SSS Administration Revenue	37,143	37,943	800	2.15%
4210	4210-Rent from Electric Property	308,202	304,539	-3,663	1.19%
4215	4215-Other Utility Operating Income	5,996	285	-5,711	95.25%
4220	4220-Other Electric Revenues	\$0	0	0	
4355	4355-Gain on Disposition of Utility and Other Property	6,051	7,997	1,946	32.15%
4360	4360-Loss on Disposition of Utility and Other Property	-7,607	-5,676	1,931	25.38%
4385	4385-Non-Utility Rental Income	0	0	0	
4390	4390-Miscellaneous Non-Operating Income	4,053	711	-3,342	82.46%
4405	4405-Interest and Dividend Income	62,063	34,360	-27,703	44.64%
	Total	559,015	531,464	-27,550	5%

	Specific Service Charges	107,085	109,995	2,910	2.72%
	Late Payment Charges	28,227	32,120	3,893	13.79%
	Other Distribution/Operating Revenues	359,141	351,958	-7,183	2.00%
	Other Income or Deductions	64,562	37,391	-27,171	42.09%
	Total	559,015	531,464	-27,550	4.93%

Variance between 2013 Actual (CGAAP) and 2014 Actual (CGAAP):

Variations between 2013 and 2014 showed very little change except for account 4405 which shows a change of 44.64%. This is mostly due to interest earned on short term investments.

Interest income has decreased with the decrease in cash the corporation has experienced with the disposition of deferral accounts that had been in credit positions. With the returning of these funds through rate riders WDI experienced decreased cash causing decreased investments and corresponding decreased interest. Additionally WDI continues to incur capital expenditures greater than current amortization which has resulted in the use of cash reserves.

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Table 3.54: Variance Analysis of Other Operating Revenues

	Reporting Basis	CGAAP	MIFRS	Variance	Variance
		2014	2014	\$	%
	USoA Description				
4235	4235-Miscellaneous Service Revenues	109,995	109,995	-	-
4225	4225-Late Payment Charges	32,120	32,120	-	-
4082	4082-Retail Services Revenues	8,941	8,941	-	-
4084	4084-Service Transaction Requests (STR) Revenues	250	250	-	-
4086	4086-SSS Administration Revenue	37,943	37,943	-	-
4210	4210-Rent from Electric Property	304,539	304,539	-	-
4215	4215-Other Utility Operating Income	285	285	-	-
4220	4220-Other Electric Revenues	0	0	-	-
4355	4355-Gain on Disposition of Utility and Other Property	7,997	7,997	-	-
4360	4360-Loss on Disposition of Utility and Other Property	-5,676	-5,676	-	-
4385	4385-Non-Utility Rental Income	0	0	-	-
4390	4390-Miscellaneous Non-Operating Income	711	711	-	-
4405	4405-Interest and Dividend Income	34,360	34,360	-	-
	Total	531,464	531,464	-	-

	Specific Service Charges	109,995	109,995	-	-
	Late Payment Charges	32,120	32,120	-	-
	Other Distribution/Operating Revenues	351,958	351,958	-	-
	Other Income or Deductions	37,391	37,391	-	-
	Total	531,464	531,464	-	-

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3 **Variance between 2014 Actual (CGAAP) and 2014 Actual (MIFRS):**

4 Variances between 2014 CGAAP and 2014 MIFRS showed no change.

5

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Table 3.55: Variance Analysis of Other Operating Revenues

<i>Reporting Basis</i>		CGAAP	CGAAP	Variance	Variance
		2014	2015	\$	%
USoA Description		(Bridge)			
4235	4235-Miscellaneous Service Revenues	109,995	111,150	1,155	1.05%
4225	4225-Late Payment Charges	32,120	32,565	445	1.39%
4082	4082-Retail Services Revenues	8,941	9,000	59	0.66%
4084	4084-Service Transaction Requests (STR) Revenues	250	450	201	80.36%
4086	4086-SSS Administration Revenue	37,943	39,655	1,712	4.51%
4210	4210-Rent from Electric Property	304,539	306,112	1,573	0.52%
4215	4215-Other Utility Operating Income	285	2,000	1,715	601.83%
4220	4220-Other Electric Revenues	0	0	0	
4355	4355-Gain on Disposition of Utility and Other Property	7,997	0	-7,997	100.00%
4360	4360-Loss on Disposition of Utility and Other Property	-5,676	-38,737	-33,061	582.43%
4385	4385-Non-Utility Rental Income	0	0	0	
4390	4390-Miscellaneous Non-Operating Income	711	25,962	25,251	3552.50%
4405	4405-Interest and Dividend Income	34,360	35,000	640	1.86%
	Total	531,464	523,157	-8,307	2%

	Specific Service Charges	109,995	111,150	1,155	1.05%
	Late Payment Charges	32,120	32,565	445	1.39%
	Other Distribution/Operating Revenues	351,958	357,217	5,259	1.49%
	Other Income or Deductions	37,391	22,225	-15,166	40.56%
	Total	531,464	523,157	-8,307	1.56%

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3 **Variance between 2014 Actual (MIFRS) and 2015 Actual (MIFRS):**

4 Variances between 2014 and 2015 showed very little change overall. General ledger account
 5 4360 includes the loss on disposition of approximately \$33,000 related to the disposal of 450 first
 6 generation smart meters that were discussed in Exhibit 2, and documented in WDI's Distribution
 7 System Plan. General ledger account 4390 variance is a result of one-time incentives earned
 8 from 2011-2014 CDM programs.

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Table 3.56: Variance Analysis of Other Operating Revenues

	<i>Reporting Basis</i>	CGAAP	CGAAP	Variance	Variance
		2015	2016	\$	%
	USoA Description	(Bridge)	(Test)		
4235	4235-Miscellaneous Service Revenues	111,150	113,010	1,860	1.67%
4225	4225-Late Payment Charges	32,565	32,565	0	0.00%
4082	4082-Retail Services Revenues	9,000	9,000	0	0.00%
4084	4084-Service Transaction Requests (STR) Revenues	450	300	-150	33.33%
4086	4086-SSS Administration Revenue	39,655	40,359	704	1.78%
4210	4210-Rent from Electric Property	306,112	306,595	483	0.16%
4215	4215-Other Utility Operating Income	2,000	2,000	0	0.00%
4355	4355-Gain on Disposition of Utility and Other Property	0	7,500	7,500	
4360	4360-Loss on Disposition of Utility and Other Property	-38,737	-51,952	-13,215	34.11%
4390	4390-Miscellaneous Non-Operating Income	25,962	\$0	-25,962	100.00%
4405	4405-Interest and Dividend Income	35,000	15,000	-20,000	57.14%
	Total	523,157	474,377	-48,780	9%

	Specific Service Charges	111,150	113,010	1,860	1.67%
	Late Payment Charges	32,565	32,565	0	0.00%
	Other Distribution/Operating Revenues	357,217	358,254	1,037	0.29%
	Other Income or Deductions	22,225	-29,452	-51,677	232.52%
	Total	523,157	474,377	\$48,780	9.32%

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Variance between 2015 Actual (MIFRS) and 2016 Actual (MIFRS):

Variations between 2015 and 2016 showed very little change except for General ledger account 4405 which shows a change of 56% and General ledger account 4390. This is mostly due to interest earned on short term investments and one-time income earned from CDM incentives from the 2011-2014 CDM framework.

Interest income has decreased with the decrease in cash the corporation has experienced with the disposition of deferral accounts that had been in credit positions. With the returning of these funds through rate riders WDI experienced decreased cash causing decreased investments and corresponding decreased interest. In addition Carrying Charges on Deferral Accounts were recorded in this account.

1 **Ex. 3/Tab 5/Sch. 3 – Proposed Specific Service Charges**

2 WDI is proposing no changes to the current specific services charges except for the microFIT
3 service charge. WDI incurs a \$10.00 monthly fee per microFIT meter point from WDI's vendor
4 Utilismart and would like to pass this charge onto its microFIT customers. This increase in the
5 customer charge from \$5.40 to \$10.00 was also agreed to in St. Thomas Energy Inc. (EB-2014-
6 0113) Cost of Service Application. WDI has provided for this increase in revenue in WDI's 2016
7 revenue offsets.

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