

1 **Q. Reference: Graph 2-2, Customer Growth Capital**

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3 **Graph 2-2 at page 2-9 breaks down customer growth capital into two components:**  
4 **the portion driven by customer growth and the portion driven by load growth.**

5  
6 **(a) Does this break down reflect the types of capital in that “Customer Growth”**  
7 **capital relates to capital investment to connect new customers, excluding**  
8 **upstream cost to increase capacity; whereas “Load Growth” capital relates**  
9 **to both load growth due to growth in the number of customers and increases**  
10 **in average load per customer. If not, please explain how NP categorizes**  
11 **Customer Growth Capital. If this is the case, please break down Load**  
12 **Growth capital to show the impact on the addition of customers (assuming**  
13 **average use is unchanged) and the impact on capital spending due to**  
14 **increases in average use.**

15  
16 **(b) Please provide a table showing average use per customer by customer class**  
17 **for the period shown in Graph 2-2 (2005 to 2014). Also, please break out the**  
18 **average use for existing customers versus the average use of new customers**  
19 **in each year that is used in developing the energy and demand forecast.**

20  
21 **A. (a) “Customer Growth” capital relates to the capital expenditure associated with**  
22 **providing service to new customers. This would include portions of distribution**  
23 **capital projects such as Extensions, Meters, Services, Street Lighting and**  
24 **Transformers.**

25  
26 “Load Growth” capital relates to the capital expenditure associated with the  
27 amount of electricity delivered by Newfoundland Power to its customers. These  
28 expenditures are required to increase system capacity, particularly power  
29 transformation capacity. This would include portions of distribution, transmission  
30 and substation capital projects. The substation capital project Additions Due to  
31 Load Growth and distribution capital project Feeder Additions for Growth are  
32 examples of Load Growth capital projects.

33  
34 The application of these descriptions does reflect “Customer Growth” capital  
35 relating to capital investment to connect new customers, excluding upstream cost  
36 to increase capacity; whereas “Load Growth” capital relates to both load growth  
37 due to growth in the number of customers and increases in average load per  
38 customer.

39  
40 Newfoundland Power has not studied the relative impact on Load Growth capital  
41 expenditure of the additional customers and changes in average use by existing  
42 customers.

(b) Table 1 provides average use per customer by customer class for the period shown in Graph 2-2 (2005 to 2009).

**Table 1**  
**Average kWh Usage per Customer by Customer Class**  
**2005 to 2009F**

	<b>2005</b>	<b>2006</b>	<b>2007</b>	<b>2008</b>	<b>2009F</b>
<b>Rate 1.1</b>	15,309	15,117	15,241	15,456	15,598
<b>Rate 2.1</b>	8,118	7,835	7,654	7,468	7,470
<b>Rate 2.2</b>	75,919	75,537	75,164	74,931	74,266
<b>Rate 2.3</b>	844,596	837,880	841,804	833,116	825,643
<b>Rate 2.4</b>	6,970,455	6,622,460	6,690,258	6,844,116	6,338,225
<b>Total General Service</b>	94,058	93,085	94,292	94,641	94,308
<b>Rate 4.1</b>	3,756	3,747	3,743	3,700	3,671
<b>Total Company</b>	22,167	21,897	22,069	22,262	22,355

Table 2 provides average use per customer by customer class for the period shown in Graph 2-2 (2010F to 2014F).

**Table 2**  
**Average kWh Usage per Customer by Customer Class**  
**2010F to 2014F**

	<b>2010F</b>	<b>2011F</b>	<b>2012F</b>	<b>2013F</b>	<b>2014F</b>
<b>Rate 1.1</b>	15,569	15,478	15,694	15,783	15,873
<b>Rate 2.1</b>	7,369	7,331	7,425	7,390	7,315
<b>Rate 2.2</b>	73,776	73,460	73,591	73,451	73,163
<b>Rate 2.3</b>	832,285	836,771	841,465	842,041	846,073
<b>Rate 2.4</b>	6,487,179	6,564,326	6,832,554	7,017,705	7,140,789
<b>Total General Service</b>	93,915	94,726	96,800	98,152	99,063
<b>Rate 4.1</b>	3,591	3,511	3,468	3,468	3,468
<b>Total Company</b>	22,313	22,275	22,621	22,792	22,920

1 Newfoundland Power forecasts total domestic average use using an end-  
2 use/econometric model that includes variables such as market share for electric  
3 space heating, personal disposable income and the marginal price of electricity.  
4 Given the interaction between these variables it is not possible to forecast average  
5 use for existing customers versus average use for new customers from the  
6 Company's current forecasting model.