

**SCE Bill Calculator**  
**Addressing March 1, 2013 Modification Requests**  
**March 8, 2013**

**Summary of DECA Requests Relevant to SCE:**

*DECA comments here narrowly on the subject of being able to apply functions such as minimum bills, demand charges, or similar recurring monthly fees only after a trigger condition has been met.*

*While this trigger condition should be applied in such a way that it is modular, DECA is particularly interested in the ability to exclude the application of such fees based on an algorithmic assessment of the shape and magnitude of an individual customer's monthly load profile. DECA proposes that the algorithm be adjustable, but for benchmarking purposes it be based on the percentage of a customer's monthly average load during the coincident peak and coincident valley as compared to the peak and valley of their customer class. In particular DECA proposes capturing customers who use 50% less on peak power and 50% more on valley power for purposes of avoiding these charges.*

*As a clarification DECA is suggesting that the bill impact models should be able to reflect a possible rate structure that says generally "If a customer's net load reflects a significant reduction in contribution to coincident peak or similarly contributes to a more stable baseload by having shifted their load to the hours of the diurnal load valley, there should be a vehicle for reducing or eliminating connection fees as a result of their net contribution to the efficient operation of the grid."*

**In reviewing DECA's request SCE determined adding this functionality would be extremely labor intensive given the time constraints. The additional number of underlying variables and assumptions would be significant in addition to formulating a version of the algorithm described.**

**Summary of Sierra Club Requests Relevant to SCE:**

***Specifying Tier Differentials***

*The calculators are inflexible in setting differentials between tiers, and are therefore not able to specify user requests. Namely, in the PG&E calculator allows setting the 1-2, 3-4, and 4-5 tier differential, and solves for the 2-3 differential. The SCE calculator allows only the 1-2 differential and top 2 tiers differential, solving for intermediate tiers. SDG&E allows the user to specify all tiers except the bottom or the top (user specifies). We understand that the models must use the revenue requirement to solve for one of the tiers, so specifying all of the differentials isn't possible. However, **we need to be able to choose which tiers differentials we want to specify and which the model will solve for.** For example, by only allowing specification of the 3-4*

differential and not the 2-3 differential in PG&E calculator, when we specify a \$0.10 differential between tiers 3-4, we get a rate structure as follows: T1-12.8, T2-14.7, T3-25.0, T4-35.0. There is no way to say that we'd like the 2-3 differential to be 10 cents, and let the model tell me what the T4 rate should be. This renders the calculator somewhat useless, and the fact that each model does it differently creates consistency issues.

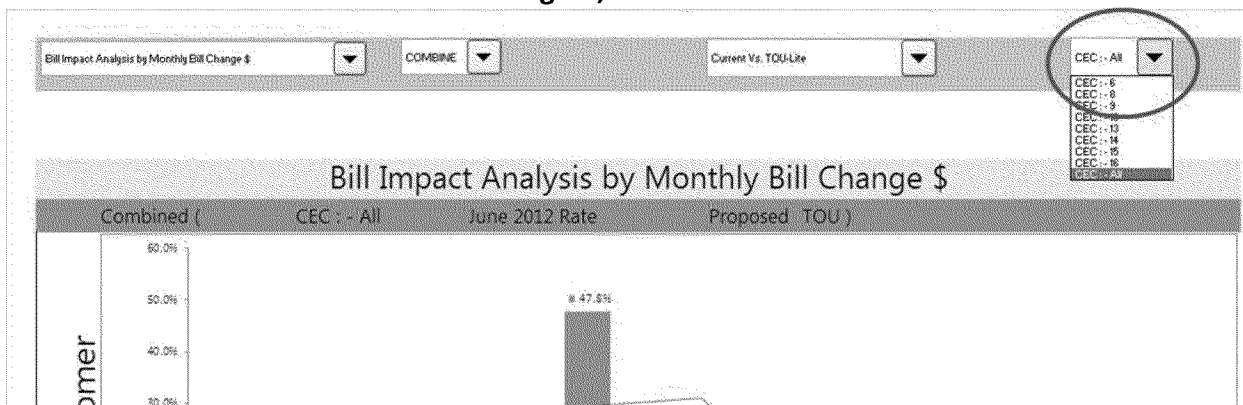
SCE's model includes this flexibility in two parts. First the "Ratio" dropdown must be selected, which will yield a ratio drop down where the user can select the number of tiers and set unbound ratio/tier differentials relative to the first tier:

Non-CARE Tier	Forecast Sales (GWh)	% of Sales	June 2012 Rate	5-Tiers Rate
1	10,282	53%	12.6	15.4
2	2,140	11%	15.5	19.3
3	3,297	17%	24.2	19.3
4	2,082	11%	27.7	23.1
5	1,478	8%	31.2	23.1

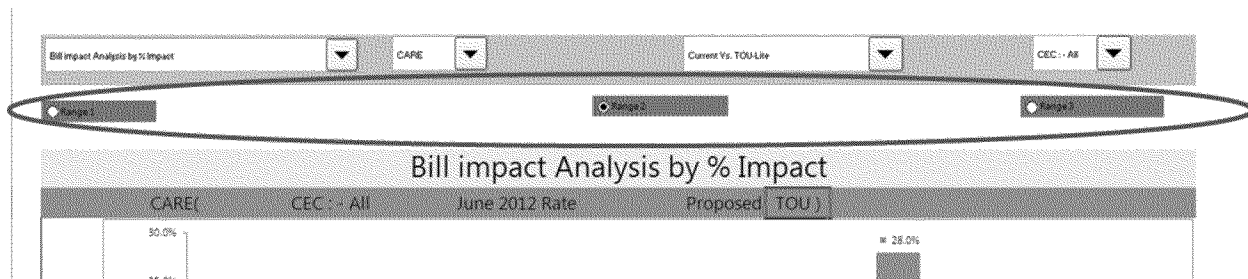
### Bill Impact by Usage Level and Climate Zone

To allow a complete understanding of bill impacts, all calculators should give output on total bill by usage level by climate zone. Currently, the SDG&E calculator is the only one that does this. The SCE calculator does this, but for a very limited set of usage level bins (3 bins), which should be expanded to more bins (~8) that are evenly spaced. The PG&E calculators gives no information on impacts by usage level or by zone.

The "LowMedHigh" tab provides a high level summary of the information shown on "Histogram" Tab. Under the "Histogram" tab a user can select from a variety of impact scenarios for each baseline or climate region, distributed over 9-bins.



To explore usage level bins that can range from 3% to 30% in some cases, simply select "Bill Impact Analysis by % Impact" and the radials to change the usage bins display. However increasing the level of "bins" for each selection was not possible given the time and other requests SCE was working to incorporate. See final DRA response below for a graphic of how to customize impact bins.



### **Baseline Allowance to 60%**

*Baseline allowance percent can only range between 40% and 55% on all three calculators. The range should go from 40-60% to cover what is currently in the statute and allow for modeling a full range of options.*

**SCE is building this functionality in its release on March 11, 2013.**

### **Summary of DRA Requests Relevant to SCE:**

1. *SCE already agreed to enhance the TOU overly option to allow a user to input an on-peak surcharge and the model will calculate a revenue neutral surcredit.*

**This is included in the release on 3/11/13.**

2. *To have user options to put in more recent rates, such as GRC 2 settled results (and properly reflect the associated revenues).*

**SCE will pre-load the model with 2012 GRC settled rates.**

3. *Allow the user to specify the level of costs to be treated as per customer fixed costs, in \$ per customer year or \$ per customer month, and present cost curve based on such user specified fixed cost along with all other model outputs that are driven by SCE's "cost-based rates".*

**Users can change marginal costs under the marginal cost box on the summary page and the adjustments occur to change the "Cost Study" Cost outputs based on the new marginal cost. As discussed in a previous webinar this is not a marginal cost proceeding where marginal costs are the subject of the discussion, but rather the marginal cost box was created for parties with pre-defined marginal costs.**

4. *Allow user specified CARE discount rate for TOU scenarios. The model right now uses the CARE discount from the Non-TOU rate for the TOU scenarios, so the discount for the TOU cannot be changed by the user.*

SCE's model offers a CARE and CARE "lite" function to provide 2 levels of discount to the CARE group. To create this scenario, the model will simply need to be run again if the CARE discount differs from the original input.

5. Bill impact chart presentation should be symmetric. (to allow 5% increment for both bill increase or bill decrease due to new rate option proposal)

This can be accomplished under the "\$% Change" tab where users can define whatever breakpoints they would like.

Y-axis Scale Range: Enter range increment in dollars \$ **3** Y-axis Scale Starting Point \$ **(10)**  
 X-axis Scale Range: Enter range increment in percent **5%** X-axis Scale Starting Point **-10%**

SCE - Residential OIR Bill impact analysis  
 Current Vs. NON-TOU  
 COMBINED  
 CEC : - All

	LE -%10	-%10 to -%5	-%5 to %0	%0 to %5	%5 to %10	%10 to %15	%15 to %20	%20 to %25	GE %25
LE -\$10	14.8%	3.6%	0.0%						
-\$10 to -\$7	0.0%	1.2%	0.2%						
-\$7 to -\$4	0.0%	0.6%	2.0%						
-\$4 to -\$1	0.1%	0.0%	2.6%						
-\$1 to \$2		0.0%	1.0%	2.7%	0.3%	0.4%	0.1%		
\$2 to \$5				3.1%	0.8%	0.2%	1.1%	1.1%	0.0%
\$5 to \$8				0.3%	3.2%	1.0%	0.8%	1.0%	2.3%
\$8 to \$11				0.0%	1.8%	2.2%	0.6%	0.7%	3.3%
GE \$11					0.2%	2.9%	3.6%	4.7%	35.4%