ONE EIGHTY

A new perspective for your enterprise performance

October 2011

Planning Response Functions

Upcoming Event

- CAM-I Fourth Quarter Meeting Austin TX December 11-14

People in the News

- INCAE University professors John Eikes, Susan Clancy, and Julio Sergio Ramirez for sharing their knowledge and expertise with the Inter-American Development Bank

- Professor Roberto Mendoza with INCAE and long time friend and colleague for conducting a tour of Nicaragua for Mary and I.

Links

Marketing Mix Modeling

Sales Force Design

Response functions have been around for decades. **Sales response functions** are used to drive sales force resource optimization, while **marketing response functions** are used in marketing mix modeling.

Response functions link sales or marketing activities to revenue results. Specifically, they relax the assumption of a fixed forecast by predicting revenues at different levels of sales or marketing effort.

These relationships are used to inform critical resource allocation decisions including how big the sales or marketing budget should be, and to which products and/or customers should these resources be allocated. As a result, this process can lead to changes in individual product or customer expenditures.

In these approaches, the objective is to maximize the contribution of the sales and marketing efforts after accounting for the costs of these promotions and a fixed product margin. It is not common to account for changes in margin as a function of the expected product demand. The supply chain is also fixed.

There are a broad range of methods that can be used to estimate response functions, which differ in the time/ effort involved and the precision that can be achieved. A partial list of these methods includes:

- In-market tests to isolate the impact of individual promotions
- Econometric methods that rely on statistical analysis to estimate the sales impact of prior sales and marketing activities
- Expert sessions that provide a structured process to solicit and refine estimates of the impact that a promotion will have

Regardless of how the response functions are derived, they can be compared to actual results and re-calibrated as needed. This is analogous to the financial variance analysis process.

Planning Response functions are an emerging application of these same techniques to maximize the profit of an **entire *unit-based plan*** by:
1) Replacing a fixed contribution margin with profits based on the actual costs for the forecasted demand
2) Using both sales and marketing expenditures as the drivers of the unit-based forecast.

Maximize the profit of your unit-based plan by relaxing the assumption of a fixed forecast with planning response functions

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