

Chapter
3

Chapter 3: Research Methodology

Customer Value Added (CVA) Primer

3.1 CVA - What is it and why do we want it?

Econometric analysis has consistently shown that customers choose products and services which they perceive as offering them the highest value, or, maximum satisfaction, for the price they pay. **Customer Value Added (CVA)** is a measure of customers' perception of the value of Network System's (NS) products and services relative to the value of competitors' products and services for a defined market. It provides an analysis of and an ability to create greater customer-perceived value in the marketplace for NS products and services versus those of the competitors.

CVA is integrally related to Economic Value Added (EVA) because it directly measures the drivers of purchasing behaviour. It has been shown with empirical data that changes in CVA drive changes in market share. It has also been shown that the higher the CVA score, the higher the market share.

3.2 CVA - How is it Measured and Calculated?

The perception of product or service value in the marketplace can be measured through surveys which ask customers, "considering the quality and price of NS's products and services, how would you rate them on being worth what you paid for them"? Worth-what-paid-for (WWPF) is synonymous with value.

CVA is a measure of the degree to which the perceived value of products and services differ from the perceived value provided by competitors. CVA is calculated by dividing the NS value score by the competitive, or Best other Vendor (BOV) value score. This comparison is made by calculating a ratio as shown below :

$$\text{CVA} = \frac{\text{NS WWPF/Value Mean Score (CSA)}}{\text{Competitors' WWPF/Value Mean Score}}$$

If CVA is **greater than 1.0** (or 100), customer satisfaction with NS's value perceived is higher than the satisfaction with the competitors:

Superior Value = Strength to leverage or

If CVA is **equal to 1.0** (or 100), customer satisfaction with NS's perceived value is equal to the perceived value of the competitors

Equal Value = Opportunity to improve or

If CVA is **less than 1.0** (or 100), customer dissatisfaction.

Inferior Value = Opportunity to improve.

See Annex 3 for sample on the calculations.

NS' Operating Standard is to achieve best-in-class customer satisfaction performance and maintain a CVA that is sufficient to hold or gain market share and attain best-in-class.

3.3 Why isn't CVA calculated against the Best-In-Class Competitor?

The reason for using the average Value (WWPF) score of all competitors, rather than the single best-in-class Value (WWPF) score is because of the market share predictive power. Econometricians have shown that using data comprising only one competitor to NS has very little market change predictive power. Rather, using data of all the competitors in the market place, it does correlate with changes in market share very well. Therefore, although NS should strive to be best-in-class and know who the best competitor is, the CVA metric should be calculated against the industry competition and not against just one competitor.

3.4 CVA - What Does it Tell Us?

How does CVA relate to Market Share?

NS data has shown that at any one time, higher CVA scores tend to correlate with higher market shares. Since market share is distributed over all the players in a given market, the actual percent of market share depends not only on the CVA score, but also on the number of players in the market, and how long the company has been in the market. Therefore, while it is not possible to say what share a CVA of 105 would generate versus a CVA of 95,

it is known that a business with a consistent CVA of 105 would have a higher relative market share than a business with CVA of 95. Clearly over time, businesses that continue to have higher CVAs do have higher market share.

3.5 Lucent's Underlying Philosophy

CVA and CSA are two important concepts because :

Customer Value Added (CVA), defined as customers' perception of Value ("worth what paid for") of products, services and offers relative to competitors, is the **fundamental predictive metric of the ability to grow market share**.

Customer Satisfaction Average (CSA), defined as customers' perception of Value ("worth what paid for") of the integrated product and services offers, is a complementary metric that **focuses on continuous improvement** toward delivering excellence to the customers.

The primary reason for collecting Customer Satisfaction feedback in various ways and at several levels is to use the data to identify opportunities for improving the business and customer perception. The CVA ratio is obtained from the value ("worth what paid for") question and represents the customer's perception of doing business with NS relative to aggregate best other vendors. The CSA score is obtained from the value ("worth what paid for") question and represents NS's customers' perceptions of doing business with NS. The perception surveys, which target NS level perceptions, will be used to gather data for calculating CVA and CSA and for determining high-level customer priorities, satisfiers and dissatisfiers.

3.6 How are CVA Scores Calibrated?

Lucent's customer satisfaction committee which was being set up to manage and handle all the customer satisfaction issues globally decided on the CVA scores.

The CVA scores can be clustered into ranges around the parity level. Currently, CVA score calibration is as follows :

- Between 98 and 102 - Parity
- Below 98 - Below Parity
- Between 103 and 110 - Above Parity
- Greater than 110 - World Class

(Source : <http://www-nscva.lucent.com/PRIMER/Overview.htm>)

The length of time a particular CVA score, and the direction and rate of change in CVA are also factors in predicting market success.

3.7 CVA - How Do We Improve It?

The success of Networks Systems in the marketplace is centered on providing world class products and services at competitive prices to the customers. A competitive advantage that can be gained is by adopting a strategic approach to providing customers with what they value most. To improve CVA, a business must manage the various elements which drive the marketplace's perception of **Value**, namely quality received for price paid. Value can be improved by increasing relative perceived quality, reducing relative perceived price, or using some combination of both. Relative perceived quality and price is important because competitive advantage

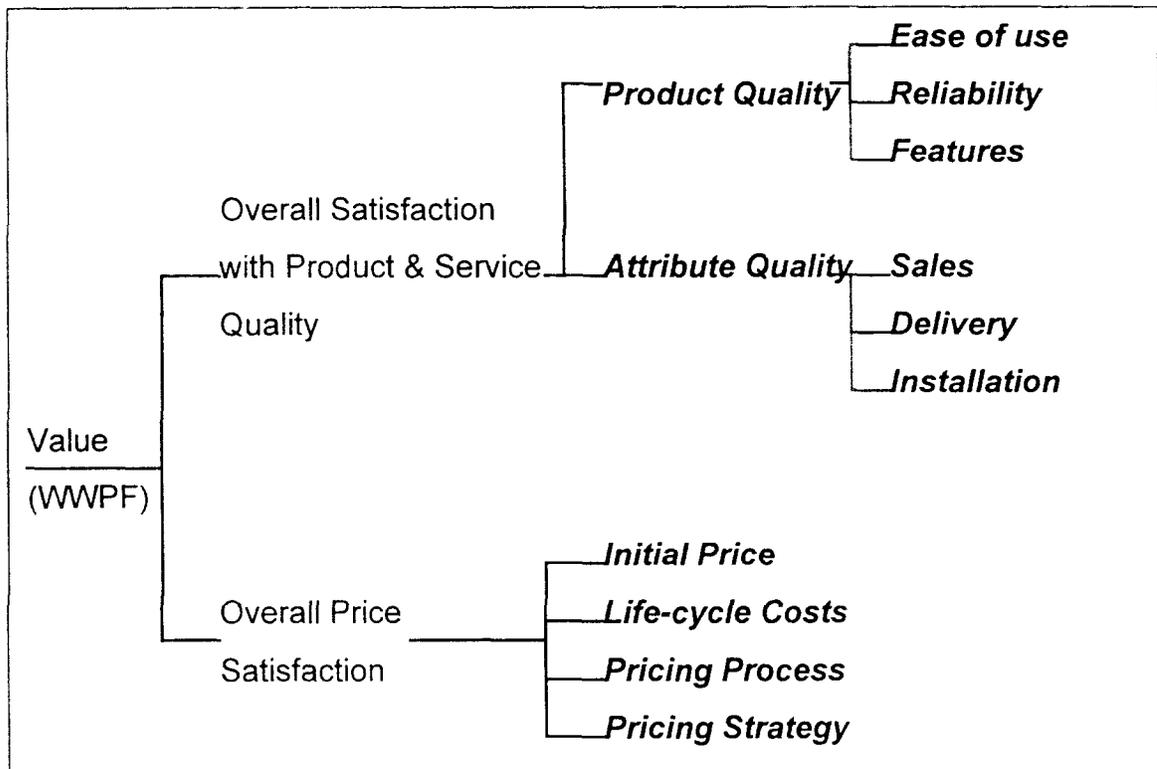
results from significant sustainable difference in either or both, thus affecting perceived value.

The factors which drive overall quality perceptions consist of all the product and service attributes which affect purchase and repurchase decisions (e.g. product reliability, features, functionality, sales support, delivery, installation, and training). Overall quality is a function of the perceived quality of individual product and service attributes. Price perception is influenced by factors such as the initial price of the product and/or service and all subsequent life-cycle costs such as financing, warranty, maintenance, etc.

CVA analysis tools identify and prioritise improvement areas and opportunities which have the highest impact on customer value by highlighting the relationships among factors contributing to purchase decisions. NS uses these data to understand key customer drivers and target critical actions on a by-customer/by-market basis. It is the impetus to defining detailed and actionable business strategies and support plans necessary to achieve breakthrough improvements in customer value.

3.8 Measurements

Figure 3 : Lucent's Measurable Attributes



(Source : Lucent NS CVA Primer)

The attributes and sub-attributes shown in italics are influencers of the overall value. It is being used according to the market requirements. These attributes are important elements of the survey process. The standard questions developed for CVA/CS tools are focused on obtaining data and information at multiple level.

- CVA is calculated from the answers to the Value Question in Customer Surveys

- CSA is calculated from the answers to the NS portion of the Value question (absolute score)
- Relative Overall Quality comes from responses to the Overall Products and Services Quality questions (relative score)
- Relative Overall Price comes from responses to the Overall Price Satisfaction question (relative score)

3.9 Survey Scale

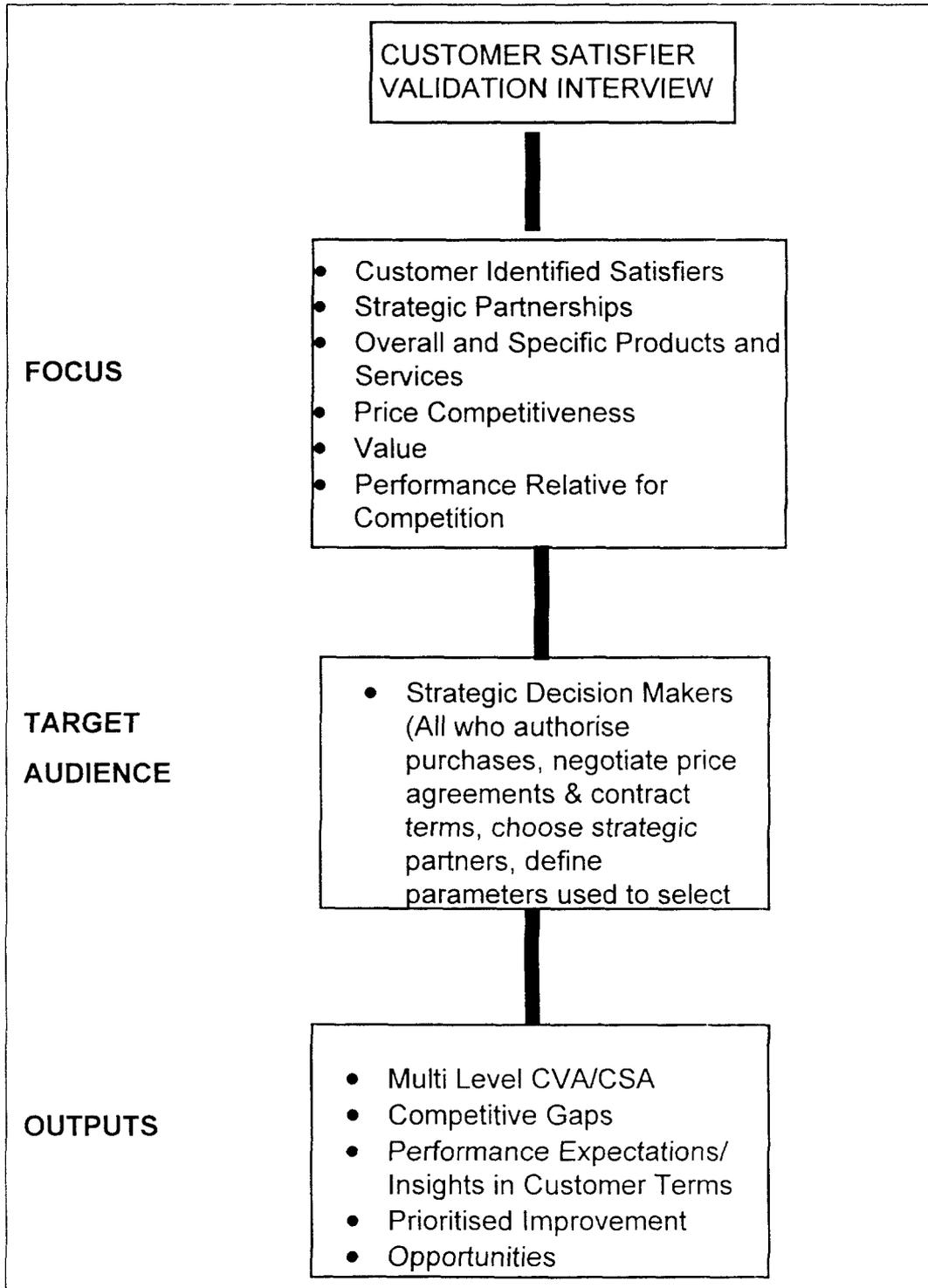
The survey instrument used was a 12 page questionnaire. The questionnaire has 14 attributes which Lucent wants to measure with the aid of the 10 point Likert scale where 1 means poor and a 10 means excellent.

3.10 Sampling Design and Data Collection

The sample was confined to the client of Lucent. It focuses on one major corporate client, that is Celcom. The respondents chosen play a major part in the decision making process and are directly and actively involved in the implementation of the GSM Project nation-wide. However, Lucent is involved only in the GSM business for four (4) regions namely Eastern, Northern, Sabah and Sarawak. Both Celcom and Lucent selected the respondents. Individuals identified are then approached by Lucent's counter-part to be interviewed with a customised questionnaire. Some of the respondents prefer to be interviewed and complete the questionnaire during the interview. Others prefer to fill the questionnaire at a later date and return it to Lucent. A total of 16 sets of questionnaire were sent out but only 14 were completed and returned to Lucent for analysis.

The stages of the data collection tools for the survey used by Lucent are as follows :-

Figure 4 : Lucent's Stages Of Data Collection



(Source : Lucent NS CVA Primer)