B2B customer segmentation

Important considerations when segmenting business customers

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Learn the process of developing a business-to-business customer segmentation, including the challenges of segmenting business customers and important differences from more common consumer segmentations. Consider methodologies and suggestions on how to work closely with business users on implementation.

Introduction

Although customer segmentation certainly cannot be considered a new business practice by any means, the technique has experienced renewed levels of interest as newly introduced technologies have effectively made analyzing huge amounts of data a much quicker and easier task. Even though business-to-business (B2B) companies often times don't face quite the same avalanche of customer data as their business-to-consumer (B2C) counterparts, the process of partitioning business customers into groups with similar needs or characteristics continues to represent an important way to generate additional value for their customers. It's also not a bad way to gain a strategic edge over competitors that may be treating customers in a more "one size fits all" fashion.

The benefits for segmenting business customers traverse many functional domains within an enterprise, including both the demand side and the supply side. Because of the customer-facing nature of marketing and sales, those domains typically represent the early adopters of segmentation schemes to support both planning purposes and tactical operations. For instance, a marketing manager can dramatically improve a cross-sell campaign response rate when he or she knows exactly which customers have the highest propensity to purchase and understands which message or value propositions are most likely to resonate with the target audience. That manager can also make reasonable assumptions with respect to the greater market at large by using key insights from customer segmentation studies, putting these insights into action when it comes to designing new customer acquisition programs.

On the supply side, customer segmentation can help support decision-making within fulfillment, call center operations, and other operational processes that businesses could do more efficiently. Further, designing products to best meet the needs of their customers represents the lifeblood
of many organizations. This especially rings true within dynamic and fast-moving technology markets. Customer segmentation yields frameworks to help place the needs of the customer first and prioritize which customer segments represent the future of the organization and those you should cater to first.

Although these benefits will likely appeal to most organizations selling to business customers, the journey isn't always a leisurely stroll in the park. Deploying an effective segmentation does not come without costs, and each functional unit that embraces the approach will likely have to make changes to either product or processes—sometimes both. To maximize the value of a customer segmentation, the outputs may need to be integrated into transactional systems such as IBM® Unica® PredictiveInsight, which can serve up the segment score to marketers on an on-demand basis. A cost-benefit analysis may be appropriate to determine whether those changes will pay off in the near term or down the road. Segmentation is also not a remedy for all organizational deficiencies and requires substantial commitment from the top down. Executive support makes or breaks the best-laid plans for customer segmentation.

**Common myths around B2B customer segmentations**

Most organizations selling to a reasonable number of businesses find customer segmentation a valuable exercise. The sections that follow offer three common myths that organizations engaging in customer segmentation should be conscious of prior to making a decision.

**Myth 1: Customer segmentation is simply a data-mining technique**

Although the methods for developing B2B customer segmentations vary widely, from grouping customers based on simple industry classifications (Standard Industrial Classification or North American Industry Classification System) to using more advanced methods with behavioral variables (K-Means clustering) at the end of the day, it's important to remember that the outputs have to be actionable. A grouping of customers does not bring value to the organization or customers if you don't make modifications to products and processes.

**Myth 2: Marketing is the only group that can use customer segmentation**

It's true that marketing groups have historically embraced customer segmentation and, in some instances, helped push the adoption of customer segmentations into other functions. However, the benefits of properly executed customer segmentation can be realized across an enterprise and shouldn't be constrained to marketing. In fact, the highest returns are often seen outside of marketing and are multiplied when everyone uses a single segmentation.

**Myth 3: B2B customer segmentations are not as useful as B2C customer segmentations**

This myth, widely held for many years within business-centric industries, is beginning to fade as competitive environments have forced companies to seek new ways to differentiate themselves and these organizations have begun to learn from their B2C counterparts. Although the number of variables available for performing segmentation analysis may not be quite as robust within B2B, the same benefits apply within this environment.
Important considerations when working with B2B data

As with all customer segmentation work and analytical projects in general, it all starts with the data. Beginning with transaction-level records, the process provides a level of flexibility often needed to produce the best outputs. Consolidating data from within the organization stored in various systems pertaining to financials, sales interactions, services provided, product fulfillment, and marketing campaigns can provide a solid foundation on which to segment customers. Specifically, data around the following attributes can yield insightful clusters of customers:

- **Tenure**
  How long has the business been a customer?

- **Recent activity**
  When was the last purchase? When was the last help ticket generated?

- **Revenue**
  How much total revenue has the customer generated?

- **Product or service usage**
  Has the customer been using our product or service?

- **Geography**
  Is the customer geographically dispersed?

The answers to these questions represent a fraction of the customer-related data that can be assembled from within an organization, but combining this information with demographic sources for businesses usually yields the most powerful results.

Demographic data, sometimes called *firmographic data* within the B2B world, consists of key pieces of information that characterize the business similar to how you would an individual or household. The most common firmographic variables include company size (measured by annual revenue or employee counts) and vertical classification. Many analysts make the mistake of basing customer segmentations purely on these two variables, which doesn't consider rich behavioral data sources often available internally and assumes that every customer within a certain size band and vertical classification behaves the same. You can obtain other useful firmographic variables around a business's credit history; its growth rates; and the presence of certain technologies, assets, office locations, and organizational structure from providers such as Dun & Bradstreet, Equifax, Experian, and Harte-Hanks. Each provider has its own strengths and weaknesses and, depending on the requirements, may offer unique firmographic or behavioral characteristics that could help define segments.

Although the size of the datasets to work with may be substantially smaller in B2B environments, the complexity can often be greater. Contributing to this complexity is defining what actually comprises a business customer. Sounds easy, no doubt, but the analyst must make a decision early on whether to define a customer at the headquarters level, site level, or some hybrid of the two.

For companies that sell primarily to small and medium businesses (SMB), this doesn't usually represent too much trouble. However, if your company sells to large multinational businesses, the approach to this question becomes critical from the start. The product mix your company sells...
can also complicate matters. Consider this example: A manufacturer of copier printers called ABC Copiers obtains an order for three copiers from a customer headquartered in New York, ships one printer to New York, one to Miami (a site office), and one to Toronto (another site office). All three printers were sold with three-year maintenance contracts, and the company works directly with each individual office to provide service accordingly.

When building customer segmentations for sales and marketing purposes, the question most often posed stems from the source of the buying decision. In the case of ABC Copiers, the purchasing decision was most likely made in New York, the headquarters. However, service decisions could be made at the site offices. Each business customer or transaction could be different, and sometimes assumptions have to be made based on experiences from the past. It's important to make those decisions up front after obtaining consensus from the appropriate stakeholders. When working with global data, choosing the headquarters within a given country often strikes the right balance between too high a level and an overwhelming amount of detail. Again, it depends on the business situation.

The Dun & Bradstreet DUNS number provides a nine-digit identification number for each location of a company and captures the legal hierarchy of that organization. When attempting to aggregate or disaggregate an organization to the optimal level, the DUNS number can help provide an automated way to do so. Although the DUNS number is a frequently used identifier across B2B data providers, several alternatives are emerging, and a few companies have been brave enough to establish their own unique keys. Regardless, you need some type of unique identifier to begin the segmentation analysis process.

Methodological considerations

There are many different approaches to segmentation, such as factor analysis, latent class analysis, and response-based techniques consisting of discriminate analysis, logistic regression, and decision tree-based methods. However, the most frequently used method by practitioners today remains cluster analysis. This exploratory data-analysis technique attempts to reveal natural groupings within a dataset by partitioning the data observations—in this case, business customers—into homogeneous groups based on their proximity to each other. To put it simply, how similar are customers to each other given the behaviors and characteristics available in the dataset? You can apply cluster analysis to different classes of B2B data, including all of those mentioned thus far in this article.

Given the fact that many B2B segmentation studies start with a small number of records or cases (generally a few hundred), hierarchical clustering methods such as between-groups, average linkage, and complete linkage tend to do well. By default, IBM SPSS® software uses the between-groups average method (baverage), which makes it easy from the start. Another option would be to take a random sample of the larger data set using the SPSS Sample function. The sample could then be fed into any one of the hierarchal clustering mentioned above.

In situations where the use of a larger dataset (hundreds of thousands of records) makes the most sense (perhaps where the company is selling to SMB customers), I recommend using the nonhierarchal method called K-Means clustering. This common method requires you to pre-
set the number of clusters before running the analysis. SPSS offers a nice feature that allows you to apply the results of other segmentation studies to the definition of clusters. An option is available where you can provide starting values for each cluster, much like group means of the clusters, allowing the procedure to base the analysis on them. This allows you to quickly learn from previous runs.

Although not as popular as K-Means cluster analysis (though certainly as powerful), you can also use a neural network method sometimes referred to as Kohonen network analysis. This technique can be performed in IBM SPSS Modeler (formerly SPSS Clementine) and is discussed in detail in the Introduction to IBM SPSS Modeler and Data Mining: Modeling training courses (see Related topics). Although this approach could suit your B2B data well while producing solid results, it’s wise to consider your stakeholders’ tolerance of techniques that are slightly less opaque and can often resemble a black box. My experience with B2B clients has shown that they have typically been less accepting of approaches that lack clarity.

**Conclusion**

After you create your B2B segmentation and assign clever names to each segment, you can begin the critical work of implementation. Integrating the segment scores with transactional systems allows users to execute against plans and brings the segmentation to life. Some business functions may require data appends or even slight structural changes to the segmentation. For instance, marketing and sales will find it critical to have contact names available for each business customer within a given segment.

Although sometimes challenging given smaller numbers of customers to work with, testing remains an important way to validate the existence of segments and continually refine approaches to those segments. Testing will allow an organization to keep its finger on the pulse of the customer segments and understand how they are performing while offering signals as to when it’s time to go back and refresh.
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