

Customer Database – Content and Possibilities of its Usage for Needs of Differentiated CRM

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Abstract Systematic knowledge about customers, competition and markets are particularly important as starting point for realization of differentiated CRM strategy. Requirements on form of database with consideration on specifics of companies are determinate in this paper on the base of theoretical approaches and analysis of concrete database content. Further possibilities of database exploitation for needs of differentiated CRM are indicated.

Keywords - Customer database. Data. Information. Key account management. Customer relationship management. Industrial enterprise.

I. INTRODUCTION

Knowledge and information are recently becoming the crucial success factor. The enterprise that is able to collect, properly classify, analyse and use information strengthens its competitive position while increasing its performance efficiency. Systematic knowledge of customers, competition and markets plays an extraordinarily important role in a successful entrepreneurship. Companies need to have maximum information about their customers at their disposal allowing them to implement modern approaches towards the market, or as the case may be, the differentiated CRM. The primary base for such information lies with properly created databases on customers. These provide information that may significantly facilitate, speed up, simplify and cheapen the following transactions. The article deals with determination of such database fundamental, with the contents of a particular database in a selected industrial enterprise while discussing possible ways of applying information provided by the customer database.

II. CONCEPT OF DATABASE AND DATA SOURCES TO FILL IT

Databases present data files collected in a certain organized way that are subsequently used for modelling some types of organizational structures or processes [1]. Database system may be viewed as a computerized system administering the records filed therein. According to Hernandez [1], databases may be divided into operational and analytic.

- Operational systems secure realization of everyday contacts with customers. Data keep changing continually and reflect the current situation. These are, for instance, systems securing operation of telephone centres, order transaction automation or electronic sale. They allow the companies to customize products and services.
- Analytic systems secure online analytic processing [1]. They integrate data from operational systems and include tools to analyze them as well. The result is better information, e.g. on customers' profitability, their profiles and probable future behaviour [2]. Analytic database thus saves statistic data which do not change or just very rarely. They serve to support strategic decision-making and to reveal hidden information for facile comprehension of customers' needs and behaviour.

In the analytic part of CRM, special technologies and Business Intelligence (BI) application are used at work with data. BI deals with collecting, processing and storing data in a proper structure aiming to achieve better comprehension and better responses to changes that the organization faces [3]. The base for business intelligence is the data warehouse (DWH). It may be defined as integrated one (data are stored within the entire enterprise and not only within particular divisions), subject-oriented (data are divided by the type, not by applications in which these were created), permanent (data are not created by manual acquisition and cannot be altered by any user's tools) and deferred data total (data carry information on time dimension) [4].

Real data stored in the data warehouses establish an immense potential for the business management in all its areas. The extraction process of relevant, beforehand unknown or undefined information from these large databases is called Data Mining [1]. The aim of data mining is to automatically or semi-automatically analyze and find important information therein [3].

The prerequisite for constructing a working database for CRM needs is a complete and accurate list of customers and information on them. Most of companies, however, consider establishing of such list to be a difficult and demanding process [5]. For systematic collection of information on customers, it is necessary, according to Peppers, to take the following steps [5]:

- To find out what information on customers the company has currently at its disposal.
- To make use of all the data available in any electronic form, i.e. on the Internet, in the call centre database, etc.
- To locate all the data and information available in the company in the paper form only and, if valuable, to save

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them in the computer database where they could be better available and secured against any misuse.

Then the company may approach expanding portfolio of current data and information on customers, e.g. on their shopping habits, payment behaviour or marketing promotion.

Among the main sources of these data and information belong partly external databases, e.g. registers of addresses, municipalities, telephone books, databases of bad payers, and partly data acquired in primary surveys being aided with written, personal or telephone inquiries, group interviews or observations [6]. Primary data may be classified in three categories by customer's behaviour data (e.g. frequency of purchases, shopping habits, communication channels, language used, consumption of products, corporate share), by subjective data (reflecting attitudes towards the products, satisfying quality, desirable shape of the product, brand preferences, social and personal values, opinions, etc.) and demographic data (e.g. age, wage, education received, marital status, number of members in the household, sex, property, etc.) [5].

Data and information on customers may be stored in various forms. The current CRM systems feature customer-centric knowledge base since it is neither effective nor possible anymore to keep several customer databases in particular subsidiaries. Customer Information File (CIF) may be an effective tool for storing such data and, at the same time, tool for selecting suitable strategies to serve particular customers [5]. It features particular customers (not segments) in the lines, and that is existing and potential. The columns consist of acquired data on customers being classified in three categories:

- Customer characteristics - demographic data that are independent on the strength of the company-customer relation.
- Response to firm decisions – data based on the level of communication between the firm and customers, on perception of preferences, e.g. pricing sensitivity, shopping behaviour, when, where, how and why the customers go shopping.
- Purchase history – information based on fixed and actual transactions with the customers, data on products the customers purchased, incomes and costs assigned to these purchases.

In the last CIF column, potential profit to be realized by a particular customer in a selected period is assigned. If the actual profit is known, this information is applied to choose a suitable service strategy.

Databases in particular enterprises will, however, be always specific with respect namely to the nature of markets (B2B, B2C), nature of products and also the branch of industry where the company conducts its business.

III. PARTICULAR CUSTOMER DATABASE ANALYSIS

A. Database Contents

The primary survey carried out at our workplace was focused on comprehension of customer information database

contents in one concrete Strategic Business Unit (SBU) of the industrial enterprise. Since the enterprise has already been operating on B2B markets, the customers are namely distributors and other product processors [7]. In the company, several information systems and tools are utilized. Among them belongs the SAP R/3) system; electronic notice board; Excel customer database; Lotus Notes customer demo database; internal marketing system; corporate, product and territorial reports.

Some data and information are still stored in a paper form, most of them are nowadays continuously stored in the electronic information systems, or in the both forms at the same time.

In the beginning of 2007, the company approached implementation of the Key Account Management (KAM) aimed to strengthen market positions of particular SBU's of the company and to achieve the desired profit especially through providing a special care in the field of marketing, administration and services. For the needs of KAM implementation, these pieces of information were identified as necessary:

1. New information on key customers based on data in the following structure:

- corporate data: SAP number, www address, code of the state, relation (key customer affiliation, firm affiliation, distributor, competitors),
- economic data: revenues/year, EBIT/year, verbal evaluation,
- marketing data: key customer's market position, SBU share in the total key customer's purchase (share increasing potential, way of share increasing),
- competition: the name of the competitor, www address of the competitor, its products and reasons of his preferences over the firm's products.

2. New information on employees with the key customer with whom SBU negotiates on the basis of the following data:

- personal data on the key customer's employees: name, surname, date of birth, degrees, phone, fax, mobile phone, e-mail, photos,
- corporate data: performed functions with the key customer, what department they operate in, function carried out with the key customer, description of responsibility, relation to the enterprise observed, possibility to influence mutual relations,
- other data: hobbies, interests, pieces of knowledge from negotiations with him, a comment to a person acquired from a third party, professional curriculum vitae.

The company subsequently started to collect these data and information on other customers as well. Therefore, a need arose to fill in information of the importance category and customer's significance with particular customers.

To allow making use of the data for the needs of CRM, it was necessary to introduce a new information system that would be able to cooperate with them in a suitable way. Though the company makes use of the SAP systems, it did not make use of mySAP CRM product particularly due to its expensiveness and impossibility to adjust it following its introduction. On the basis of good experience and knowledge

of the work with Lotus Notes application used for the internal marketing system, the firm again demanded formation of this system in this application. The System is supposed to have this following application structure.

The operational part of CRM should meet requirements as offered by Sales Force Automation. It is particularly business activity management, customer relation management, generation of offers, allocations of territories and traders and its adjustment according to the business results. Other activities, such as ordering, orders or business activity statements, are provided in the company by the SAP system. If interconnected, however, increase in efficiency of these activities may come. Most activities provided by the Enterprise Marketing Automation and Customer Service and Support are also secured by the SAP system.

With the analytic part of CRM, centralization of information on customers is necessary. It serves especially to support the strategic decision-making and providing information to reveal customers' needs and behaviour. The firm shall not have a single central database at its disposal but one of the future CRM system requirements is its networking with other IS used in the firm.

The cooperative part of CRM is to be secured especially by the support to the communication via Web and e-mail. The firm does not intend to establish a customer call centre with respect to the relatively small number of customers and to the good knowledge of their specific needs.

To create data on information, Business Intelligence is used along with commercial databases, as well as databases freely available on the Internet. In data processing, built-in operations in IS SAP are used, or as the case may be, Excel is used for some types of computations. The company aims to obtain the required information from the data for analysis supporting decision-making. For business decision-making, however, it has been utilizing since 2005 also a marketing database system in the Lotus Notes application.

The data are obtained from primary as well as secondary sources. As for the primary sources, these are particularly reports from negotiations with customers and business trips. Secondary sources are quite large including public databases, news, literary sources and paid databases. The firm keeps files of all the data related to the customers while dividing them into the business and financial ones. Also information on the lost customers is registered and stored. The company also aims to identify its potential customers.

B. Analysis of the Database

It emerged from the database in the company under study:

1. The company lacks data in its database related to purchases by current and potential customers with the competition, the competition's prices and information on the current and new products that the customers require for their activities. However, such information is hard to find without establishing mutual close relations. There is a lack of price and demand records. The competition's price record keeping is only in its beginnings.
2. Product managers as well as agents and marketing department employees still keep most of their reports, e-mails and necessary documents in the paper form as well.

3. Some data are so commonplace that it is not necessary for the product managers and agents to keep records about them.
4. Recently, the given SBU does not dispose of any database that would include all the consolidated data from all the available information systems which are currently being used. Its introduction is not intended in the future either.
5. The original database became rather disorganized and misarranged due to its simple basic structure and growing number of the data stored. Thus, a demo version of Lotus Notes customer database has recently been used instead. It was created on the basis of their users' needs and requirements, i.e. particularly the top management, individual SBU management, marketing, sales department, product managers and businessmen. Its principal target lies with creating a concept, partial utilization and design of possible future improvements for the real customer database.

C. Customer Database Benefits

Data from the mentioned customer databases are currently utilized only by marketing staff, product managers and sales managers during their negotiations with the customers. Aided by individual customers' cards, they have, however, all the obtained data and information about the particular ones at their disposal. The customer database is expected to allow the following functionalities at the company:

- option to divide customers by the agent dealing with them,
 - option to release a certain kind of reminder from the company intended for only some of the customers.
- Towards the future, however, it is intended to allow:
- data storing,
 - data sharing with all the users of the system,
 - data storage,
 - active data interconnection with the Lotus Notes electronic communication environment in the company,
 - access to data from Internet in a secured way,
 - records of the working campaigns in relation to particular partners – phone, e-mail, fax, trip report, minutes of meetings,
 - records of campaigns – Christmas, New Year campaigns, gift items, business trips, etc.,
 - records of campaigns outside the company – company campaigns, projects, etc.,
 - output of the stored data for various analysis, correspondence and others by the criteria entered

The future principal users of the system would also appreciate a backward searching of e-mails exchanged between the company and the customer, trip and negotiation reports and minutes and tasks subsequently resulted.

Information and data provided by the database may, however, be applied not only in the field of marketing and sales activities. The company has already been using the stored data for planning, decision-making support, financial controlling, and monthly economic reports for the management and sellers and customer relations management. As for the outlook for the future, it may be imaginable that the given information will be used in other corporate processes, such as production or purchase that may impact the value

level to be generated to particular customers. The thing is that the competent employees should have the relevant required activity-related information at their disposal while speeding it up increase its efficiency and assisting in support to their decisions and heading towards the most efficient satiation of customers' needs and that is in the moment of their actual need.

IV. CONCLUSION

The basic assumption for a successful customer database creating is customers' trust. It is the relations based on the customer's willingness to provide and share the given information with the company on one hand and the customer's privacy protection and customized information security provision on the other hand, that are the critical problem related to the CRM implementation. Most of the customers are not, however, willing to provide information. Therefore, it is necessary to declare how the information obtained shall be used for tangible benefit of both partners and how such information shall be secured against any misuse. If these matters are solved, a customer database may be established with a range of benefits to the company. In the company where a qualitative survey was carried out the established database has already yielded first benefits arising from the application of the data. It is namely giving a better ear to the customers and better comprehension of their needs, better mutual communication including more friendly treatment in the course of the trading process and improvement in the mutual relations. At the same time, it is necessary to build an information support for establishing the most efficient customer relations management with all the company's clients. As a final result, the company is able not only to improve its image but also strengthen its competitiveness.

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