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Model of building relationships with customers via the use of mobile devices

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**Model of building relationships with customers via
the use of mobile devices**

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Model of building relationships with customers via the use of mobile devices

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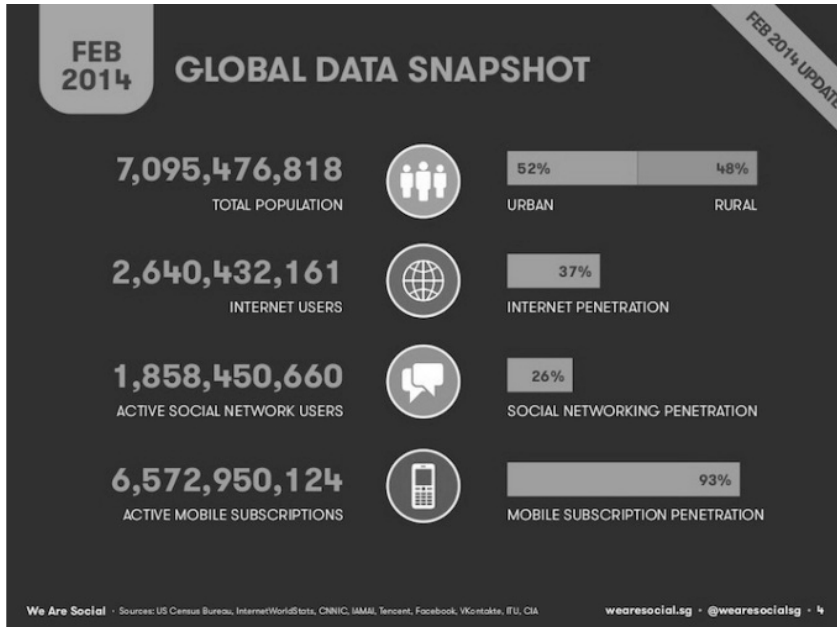
Abstract: In this paper was shown how is possible to build relationship with customers by using mobile devices. There was discussed the various tools and the benefits arising from their use. The author shows examples of the use of mobile devices in building strong and profitable relationships with customers. It was also shown marketing opportunities, that result from the use mobile devices by growing group of customers. This paper is based on practical and theoretical knowledge and experience form Poland and another countries.

Introduction

Dynamic development of mobile technologies and the increasing role of mobile Internet access are currently observed on the global markets. The availability of online products and services becomes more and more widespread. The possibility of using the Internet for marketing activity in a greater extent than before opens for companies. Our era is sometimes called the era of mobility. Nowadays, larger group of customers use mobile devices. According to the report from 2014, around 6.5 billion of various types of mobile devices are active in the world (Figure 1). In Poland, approx. 50% of the population use this type of devices actively (Figure 2).

Almost 50% of Poles over 15 have at least one phone with touch screen, operating system, and the possibility to install applications, and every tenth person uses a tablet and these values increase from year to year (Kolenda, 2014, p.12).

Figure 1. Global population, Internet users, social media and mobile devices users (2014)



Source: Digital & Mobile Worldwide, 2014.

From the report entitled "Mobile Online Development Perspectives in Poland", made available at the conference IAB Forum, it is apparent that in the next few years the time of connection of an average user to the Internet via mobile tools will be longer than in the case of stationary equipment (Miller, 2014).

Figure 2. Polish statistics about activity of users of mobile devices (2014)

Source: Digital & Mobile Worldwide, 2014.

Nowadays mobile devices become a platform for customer - company contact. Companies that will not open to such a contact with customers may soon lose a lot in relation to the competition. Customer relationships can be built in different ways and using different means. A group of customers actively using applications installed on mobile devices is a perfect group to use the tools in the field of customers building relationships. This opportunity is used by various companies in various ways. The aim of these activities is, however, one: the acquisition of a large group of loyal and regular customers.

Methodology of the research

As part of preparation for this article, literature research on mobile devices market and applications as well as the theory on customer building relationships was conducted. The research was based on the possibly latest sources with the use of the Internet sources, as the knowledge contained in them in this topic is the most current.

An observation of selected applications available for a variety of mobile devices was used to determine how to build relationships with customers in the market of mobile devices and applications.

Types of mobile devices used by the customers

One of the definitions of mobile devices says that "... mobile device (portable) is an electronic device allowing processing, receiving and sending data without necessity to maintain a wired connection to the network" (Wyborcza.biz, 2013). Most of the customers have mobile phones. A large part of them allows connecting to the Internet and data transmission. We can distinguish the following mobile devices:

- Palmtop – handheld computer,
- MDA – Mobile Digital Assistant,
- mobile phone,
- smartphone,
- tablet (computer),
- Nintendo DS – portable game console,
- notebook – personal portable computer,
- pocket PC – handheld computer,
- pendrive – portable Flash memory,
- MP3 player,
- MP4/MTV player, PMP,
- PlayStation Portable – portable game console,
- digital camera,
- memory card reader,
- portable GPS navigation devices (Informatyka i komputery, 2013)

Each of these devices works a bit differently, has different functions. Opportunities to build relationships with the MP3 player user are different than in the case of smartphone user. Different tools are to be used to build a profitable and long-lasting bond with such customers. That is why it is important to determine at the very beginning what devices are used by the customers. For example, designing a mobile application for smartphones and tablets, one can direct actions initiating client - company relationships only to the users of these types of devices.

Mobile systems and applications

Among the most common mobile devices on market one can distinguish the following mobile operating systems:

- iOS (Apple),
- Android,
- Windows Mobile,
- Symbian,
- Nokia Operating System.

They not only vary in terms of system functions and solutions providers, but also some details in the field of customer relationship management. Relationships with the clients are affected by, among others, whether a system supplier (as in the case of IOS) determines the shape and quality of offered applications, or whether it is assigned to the application providers (as in the case of Android). In the first case it is much easier to maintain a consistent policy of customer relationship management. Thanks to the solutions used by Apple, customers can expect greater support in the use of the application and submitting a complaint. One could say that it builds greater trust among customers.

Mobile applications can be divided into the following basic groups:

- focusing on solving a specific problem of the user, e.g. weather application InstaWeather, applications to send messages Snapchat, WhatsApp;
- applications concerning the existing services, e.g. Facebook, Spotify, LinkedIn, Twitter;
- banking applications, e.g. mbank;
- games, e.g. Angry Birds;
- supporting business operations, e.g. Starbucks marketing application.

In each of these groups of applications in a different way one can implement the appropriate tools to build relationships with customers. To describe in detail the tools to build relationships with customers via mobile devices, one must first divide these tools into those under operating system and under mobile applications. Tools employing e.g. geolocation work under the operating system. Tools employing e.g. QR codes can work under the mobile applications. Both of these tools will be described further in this article.

Building relationships with customers via mobile devices

Since the 90s of the last century, we have been dealing with a dynamically growing tendency to build lasting relationships with customers. This results, among others, from the fact that it is cheaper to maintain a loyalty than getting a new one, and good relations with regular customer can be really profitable for the company. The natural response to this tendency was the establishment of the concept of customer relationship

management (CRM - Customer Relationship Management). CRM creates two kinds of values: the value of the company for the client and that value of client for the company (Qia et al. 2014). Within the concept of CRM, one can distinguish the tools to build lasting and profitable relationships with the customers. Some of these tools are supported with solutions used in applications dedicated to mobile devices. Any actions that are intended to make contact and to continue dialogue with the customer contribute to build proper and profitable relationships with customers. An example of such activity may be encouragement of mobile devices users to assess the application. Thanks to such solution the software publisher can obtain actual and reliable information on the receipt of his product. Encouragement of the customers to register applications, during which they have to provide their details in order to receive some profits may also be helpful. Data that a company can receive from the customer are the most important in CRM systems. By linking and analysing data one can e.g. receive information about from what linguistic or geographical region customers come from or what is their age, education degree or interests. All this allows customizing new offers and marketing messages. It is also important what the customer gains from building a relationship with the company, because it creates greater tendency to loyalty. Mobile applications offer a number of opportunities for clients, starting from purchasing directly from the application and ending with the performance of medical imaging with a mobile device (Hirschorn et al., 2014).

The company can use different strategies towards to different customers, depending on the expectations of specific customer profitability. It is also connected with the collected in an appropriate manner data. In order to make the customers willing to share their data, they should be encouraged to do so. In addition to the aforementioned techniques, such as an encouragement to register the software or the assessment of the application by the client, one can use different types of loyalty programs. Moreover, mobile devices allow the user location and the connection between the various data stored in the device, e.g. the possibility to upload pictures from the camera to the application of social media like Facebook via an application.

Not without significance is also the possibility to use mobile devices for marketing purposes. Nowadays marketing has usually dimension of relationship marketing, which is directly related to the concept of CRM. Relationship marketing is influenced by such elements as building customer value, social media marketing, mobile marketing or building relationships with business stakeholders (Figure 3). Mobile marketing and

indirectly building relationship through social media are important for consideration of this article.

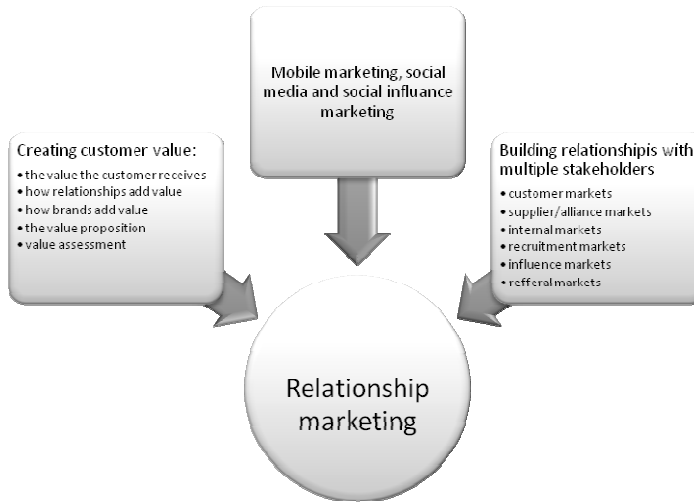
Mobile marketing is one of the most currently used ways to reach the client (Amirkhanpour, 2013). Marketing message often becomes an integral part of the mobile application.

Applications produced by the specific company are often offered to attract customers and strengthen the relationship built with them. Examples of such applications are:

- application Dziennik Maluszka offered by company NIVEA Polska and promoting children's cosmetics;
- application Ikea which is the catalogue of Ikea company;
- application Zara which is the catalogue of Inditex fashion company;
- application Mój Orange offered by Orange Polska company;
- application Netia Player Pilot offered by Netia S.A. company;
- game Cool Cubes offered by Unilever Inc company and promoting Lipton tea.

On the above examples it is easy to see how wide and various can be the use of a mobile application for various companies. Some companies, such as NIVEA or Unilever Inc offer applications that go beyond the scope of their core activity to meet the needs of the customer. These applications create in customers positive associations with the brand. Other applications are used to promote specific products and even allow their purchase via the internet (Zara, Ikea). Applications such as Mój Orange or Netia Player Pilot allow remote management of already purchased service thus extending the functionality of this service.

Figure 3. Creating a relationship marketing



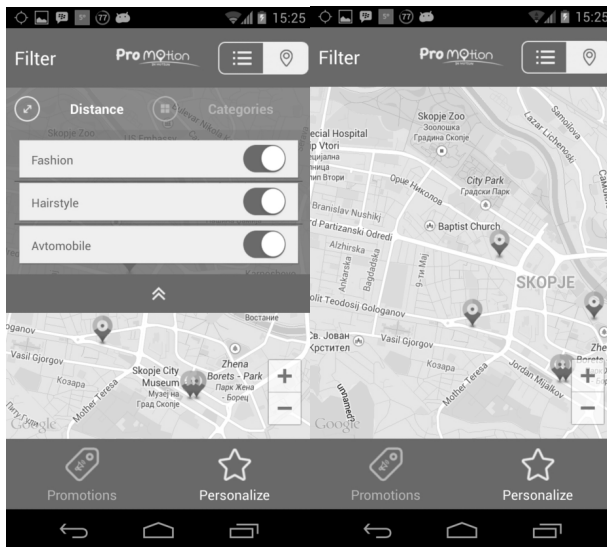
Source: Payne, 2013.

Modern trends in the field of mobile marketing are primarily associated with the use of geolocation services and Quick Response codes (QR) (Kapera, 2012). Geolocation allows users of mobile phones and other mobile devices determining their geographic location using the GPS navigation, and together with this the acquisition of information about local services. This tool is particularly important in the context of a dynamic development of social media, including in particular services that enable users to signal the presence in a certain place. An example of the use of geolocation in mobile application can be Promotion In Motion by ABIX that literally guides the user to a cheaper hairdresser or for a pizza, using geolocation and searching locally promotional offers (Figure 4). The second mentioned technology is based on advanced barcodes, which are recognized by a special application installed on a mobile phone with built-in camera. QR codes can provide users a number of information useful for identifying products and comparing their prices. With these codes companies can very easily make interactions with current or potential customers. An example of a universal application to scan QR codes can be QR Droid Code Scanner (Poland) produced by DroidLa (Figure 5).

Application using QR codes is based on the hardware capabilities offered by the mobile device, in this case this is the camera. Because of the possibility of using the hardware capabilities, the mobile applications can be divided into native, web and hybrid. Native applications are run directly by the operating system and allow the use of hardware resources such as GPS, camera, wi-fi, accelerometer, compass, Bluetooth, microphone,

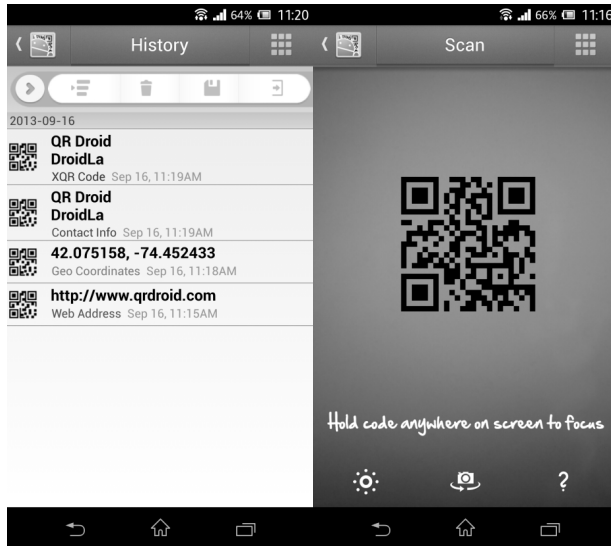
speakers, storage space etc. Web applications allow easy viewing of content on smartphones and tablets. Internet browser installed on the device is enough to run such applications. They must also be tailored to the hardware requirements of individual mobile devices (Stormer, 2005). In contrast, hybrid applications are a combination of native applications, in which web component is responsible for functionality part (Rozwiązania mobilne, 2010). Table 1 presents sample applications from all three groups with specification how relationships with customers are built in each of them.

Figure 4. App Screenshots Promotion In Motion



Source: own elaboration

Figure 5. App Screenshots QR Droid Code Scanner



Source: own elaboration

Table 1. Examples of building relationships with customers via native, web and hybrid applications

	Example	Relationship building with customers
native applications	Panorama 360: The Big Picture	The application allows creating panoramic images with the camera installed on the device; the user can send these photos from the application level to the selected social media and can mark on the map where the photo was taken. Tools used in this application allow the location of the customer and understanding his interests (based on the pictures sent to the sites such as Facebook and Instagram)
	aDyno	The application uses the accelerometer built into a portable device to measure the acceleration of the car. The very installation of this application by the customer shows his interest in the automotive industry, thus he can be addressed (also via the application) the marketing message of properly selected content.
	Restaurant Finder	The application employs GPS to give the user location of the nearest restaurants, as well as hotels, cash machines, grocery stores, etc. On the basis of the data collected in this application, one can determine what the customers are looking for at what hours and days. With this knowledge, one can properly tailor the advertising message to the customer as well as consider the more convenient for client's location of e.g. cash machines.

web applications	Ceneo with Allegro Group	Price comparison adapted to mobile devices. Thanks to it, you can determine which products are most searched by the clients and what parameters they expect from each product. In combination with the geolocation one can undertake analyse in different cities or even in different neighbourhoods. Customers via this application can quickly and easily find suitable offer. Offer messages of many companies may also be presented to the client.
	mBank PL	Mobile electronic banking application. A multitude of functions contained in this application allows making any CRM analysis which is expected by the bank in relation to their clients. It can be determined e.g. how often a client logs on via the mobile application and what actions he performs most frequently. The next step would be the preparation of personalized offer for such a customer e.g. credit. For customers, this application is convenient, as they can conduct bank transactions without using a PC.
	Zooplus.pl	Mobile application of an online store with food and articles for animals. On the base of data on the customers collected from this application one can carry out many analyses, e.g. the frequency and volume of purchases. It can also remind the client about the possibility of re-placing an order. For the customers, this application gives the possibility to make purchases at any time and from anywhere without access to a computer. The customer can also repeat one of the previous orders, which facilitates this process and reduces transaction time.
hybrid applications	Instagram	The application allows using the camera installed on the device and disk space and posting photos on Instagram and Facebook. This application is a convenient tool for customers as far as image processing is concerned. It allows the user's location. For the need of a specific marketing message one can analyse the content posted by the user.
	S Health	Default application of Samsung Galaxy Note 4 employing, among others blood saturation sensor. This application helps the user to care about his health. Thanks to it, one can check the pulse during exercise, the number of steps, type of food, the number of exercises and the amount of sleep during the day. This application makes the customer feel that Samsung cares about him in a special way. On the other hand, Samsung can gather a lot of information about their customers, their lifestyle, health, eating habits. This knowledge allows creating an offer tailored to a specific person, e.g. dietary supplements.

Coigdzie.pl	An application that allows you to search in the selected location the most interesting cultural events in the specified time. The client can quickly make a choice regarding the events in which he wants to attend. The application allows gathering information about the location of users and their preferred ways of spending free time. This knowledge can be used while planning further events.
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Source: Own elaboration

Universal model of building relationships with customers via mobile devices

On the basis of the above-described examples of tools to build relationships with the customers one can distinguish important determinants of building relationships via mobile application, these are:

- maintaining brand awareness and recognition by the customer;
- building positive associations with the brand via the mobile application;
- "facilitating customers' lives" - facilitating the use of an already purchased service;
- encouraging the client to spent more in the context of already purchased services (up-selling);
- motivating customers to make purchases in the framework of their interests;
- presentation, on a regular basis, of company's news to the customer;
- testing whether the customer likes the product or service that he bought;
- monitoring of customer's activity in time and space.

Universal model of building relationships with customers via mobile devices (Figure 6) shall refer to at least some of these determinants. This model, cannot fail to take into account the functions provided by the device (such as a camera or GPS) and the characteristics of the operating system installed on the device. Actually, every application allows collecting data about customers and their processing for the purpose of relationship marketing and CRM. Make good use of emerging opportunities.

Figure 6. Universal model of building relationships with customers through your mobile device.



Source: Own elaboration

In the process of building a relationship with the customer via a mobile device, it is assumed that the client enters or allows sharing certain information such as where he is or what are his current interests. These data are processed and forwarded by a mobile device, which also has the possibility to collect data through the system, mobile applications and hardware resources. Data are subject to analysis and provide information to the manufacturer or owner (they are not always the same) of the application. This knowledge can be used to build a lasting relationship with the client, e.g. by offering the customer an individualized, tailored to his needs unique offer.

Conclusions

The current times are sometimes called the era of mobile, as more and more customers use the services offered via mobile devices. Mobile technology allows taking an advantage of the fact that customers use it willingly to build lasting relationships between companies and customers. Not without significance is the fact that the concepts of CRM and relationship marketing are becoming more and more popular even among the smallest businesses. Companies are forced by the market to look for solutions that will allow attracting and retaining loyal customers. Building relationships with customers via mobile devices can be done in many ways and can be used in many areas. There are different types of devices with different operating systems and hardware; there are various applications that can be installed on them. This article presents a simplified model,

according to which one can build profitable customer - company relationships. Thanks to its universality, this model can find many uses. It shows the flow of information and selected possible tools to build relationships with customers.

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