SZAKDOLGOZAT

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The Perceived Value of Apple
Possible Customer Segmentations and their Analysis by Brand & Self Concepts and Attitude towards the Recent Changes

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The Perceived Value of Apple
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Guarantee of Thesis Authenticity

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Budapest, 4 December 2012

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Köszönetnyilvánítás

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Továbbá szeretném nagyon megköszönni Klabai Márk Dávidnak a hihetetlen türelmét, amellyel ezt a pár hónapot kezelte és a sok segítséget, amellyel rengeteg terhet levett a vállamról. Valamint hálás vagyok az együtt átküzdött és átnevetett éveinkért.

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Végezetül pedig meg szeretném említeni a tíz interjúalanyomat és a száznyolcvan kitöltőmet, akik szántak rám időt, ismereg vagy ismeretlenül, nélkülük sem születhetett volna meg a Szakdolgozatom.
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1 Introduction

1.1 Relevance of the Topic

In 2010 Apple passed Microsoft in total value; by the investors it was valued at $222bn against $219bn of Microsoft (Anonymous, 2010). In 2012 Apple became the most valuable company of all time with a market value of approximately $623bn by surpassing Microsoft record of $620.58bn set in 1999 – although this figure is not adjusted for inflation (Anonymous, 2012a). Interbrand which evaluates the brands with the help of managers and experts rates Apple to $76bn in 2012; it is a 129% growth since 2011 and makes the brand the 2\textsuperscript{nd} after Coca Cola – with only $1bn behind though (Interbrand, 2012). BrandZ which evaluates with a pool of customers rates it to the 1\textsuperscript{st} with $182bn and 19% growth since 2011 (WPP, 2012).

These numbers clearly show the growing importance of the brand of Apple in the last years. During my University studies – both in Hungary and in the Netherlands – there was no marketing related subject where the name of Apple didn’t turn up at least once. As well as it was a recurring conversation topic, which always divided my group of friends; is Apple a miracle or is it only an inflated balloon?

The situation was always like this; a light quarrel, which made both sides to be a bit offensive or defensive. As a result it was never a cool-headed comparison. This made me curious to know how Apple users perceive the value of Apple in reality without putting it into a competition context. And this gave the basis for my Thesis.

1.2 Aim of the Thesis

Therefore the aim of my Thesis is to find the answer how Apple users perceive the value of Apple through the following questions:

- Is it possible to define customer groups according to the perceived value of Apple?
- In case of yes, what are they like and which dimensions of perceived value give the biggest differences?

Furthermore, I wanted to examine whether the loyalty level differ significantly in these groups. For this, I collected the most important related concepts, namely the concept of
involvement, loyalty, evangelism, attachment, commitment and engagement, which I will call brand & self concepts collectively. This adds the following question:

- Are there significant differences and certain patterns between the groups regarding the level of “fanaticism” evaluated by the brand & self concepts?

Last but not least, we cannot ignore the most recent changes, which are the following. Apple could have never reached such high numbers presented in the first paragraph without (1) shifting from being niche to more mass and mainstream, as well as (2) in terms of product focus from computers to smaller, more reachable electronic devices (McElhearn, 2012). Moreover (3) Apple seems to be getting “older”; its brand perception is the most positive among people 35+, and actually declining among the age segment of 18-34 (Duncan, 2012). And finally a worrying fact is that (4) in the last years Apple couldn’t keep the pace of innovation they set in the last decade (Keen, 2012). It can be temporary or – what is worse – permanent and cause a decline for the company in the future. This is not the question of my thesis, but the perception of Apple users about these changes which can be an indicator of the answer. This adds the following question to the list:

- Are there significant differences and certain patterns between the groups regarding the perception and judgement of the recent changes?

Therefore the aim of my Thesis is to find answers to these questions listed above. They have relevant added value; they can contribute to the understanding of the value perception of the most valuable company of all time, as well as the defined-to-be customer groups can be further examined as possible customer segments, which can be targeted with slightly different marketing strategy.

In order to answer the questions, first I conducted a secondary research, and then in the primary research phase I made in-depth interviews and a quantitative survey.

The aim of the secondary research was to better understand the concept of perceived value, collect the most important models to be able to choose the one which fits my research the best. Second, I collected and examined the most important and relevant brand & self concepts and third I got familiar with Apple’s history and the most recent changes. At the end of the secondary research, I drew up a survey draft, which I wanted to finalise with the help of the results from the in-depth interviews.
The aim of the in-depth interviews was therefore to gather deeper insights from Apple users to help the survey finalisation. This way, I managed to design a questionnaire customized to the needs of the research: to Apple, to the examined concepts and most importantly to the stated research questions.

1.3 The Most Important Results
I used two scales for generating the segmentations; the validated scale of Rajh (2012) and an own scale based on the perceived value model of Kotler - Keller (2008). Both cluster analyses resulted in seven-cluster solutions; this shows that the respondents differ considerably by the dimensions of perceived value and the segmentation is grounded. I examined the two segmentations with the help of the brand & self concepts and the opinions about the recent changes, and the segmentation based on Kotler - Keller’s model seemed to create a better splitting. However my final conclusion was that the two scales should be merged partly because the scale of Rajh could segment the lower half - the respondent evaluating the dimensions below average - better, on the other hand the scale based on Kotler - Keller’s model could segment the upper half more accurately.

The segmentations had nice pattern with the brand & self concepts; regarding Kotler - Keller’s segmentation they correlated with the branding related and the product related factors, in the case of Rajh they correlated with the perceived value factor, however here we could see a weaker connection. The recent changes also had weak connection, only the lower or higher ends of the sample had bigger concentration in one answer.

1.4 Structure of the Thesis
The structure of the Thesis follows the process of my research. First, I give the literature review by starting with the academic summary of the concepts, containing the most important definitions and models and then their interpretations on Apple. The concept of perceived value is followed by the six brand & self concepts. In the last section of the literature review, I expound the recent changes I already mentioned.

In the next section, I describe the process of the qualitative research; from the question to be answered with help of the in-depth interviews, through the guide I used for the interviews, to the results of this phase. Thereafter the survey draft finalisation follows based on the results of the qualitative research. In the last section, I introduce the process of the quantitative research and answer the questions of the Thesis.
So now the information flow starts with the literature review, more precisely with the concept of perceived value.

2 Literature Review

2.1 Perceived Value

Perceived value is an elusive theoretical concept in marketing; however its importance is definitely not questionable, as it has strong ties to customer loyalty and purchase intentions (Khalifa, 2004). Its complexity is shown by the categorisation of Woodall (2003), who suggested five distinct concepts of value: net value, marketing value, derived value, sales value and rational value, and four temporal classifications: ex-ante, transaction, ex-post, and disposal.

Generally speaking, there are two directions of researches; the first is the dichotomous, uni-dimensional approach, which separates the perceived value to benefit and cost sets. This was first developed by Monroe’s price-based studies (around 1970-80), which focused on the price-quality relationship and defined these components as antecedents, rather than as formative components of value. Built upon these researches, Zeithaml (1988) developed a means-end model; “a theoretical and conceptual structure that connects customers’ values with their behaviour” (Sánchez-Fernández - Iniesta-Bonillo, 2007, pp. 432). Several authors used their approach and tried to improve it, but commonly they all defined the components as antecedents and split the perceived value component into two sets: benefits and costs. (Sánchez-Fernández - Iniesta-Bonillo, 2007)

The other direction is the multi-dimensional approach, which identifies dimensions of the perceived value. One of the first researches regarding the topic was conducted by Hartman (1967, 1973) who proposed that perceived value has three dimensions; extrinsic (utilitarian), intrinsic (emotional) and systemic (rational) value. Several authors used the three-dimensional approach, but also four-, even five-dimensional models were developed (Sánchez-Fernández - Iniesta-Bonillo, 2007).

In 2008, Sánchez-Fernández and Iniesta-Bonillo attempted to give a complete overview of the topic; their work is outstandingly valuable considering the high number of distinct researches. In my limited synopsis, I summarise the most important and determinative findings regarding the topic; first I locate the concept with the help of Zeithaml’s model and after examine it using uni- and multi-dimensional models.
2.1.1 Locating Perceived Value

Figure 1: The Means-End Model of Zeithaml (1988) about the Components of Perceived Value

As stated above, the model of Zeithaml (1988) represents the uni-dimensional approach of the researches, which aimed to develop a model to describe the decision making process regarding consumption. In her view, which originated from Gutman’s (1982), it is a means-end chain, which describes a hierarchical relationship between the components; people are goal-directed, and they consider product or service attributes as means of concluding desired end-states. Zeithaml (1988) suggests that perceived price and quality, other intrinsic and extrinsic attributes and higher level abstractions have effect on the perceived value, which is indeed a good indicator of the future purchase. The process is influenced by “(1) linkages among product attributes; (2) the perceived consequences of consumption; and (3) the personal values of customers” (Sánchez-Fernández - Iniesta-Bonillo, 2007, pp. 432).

Zeithaml starts the examination of the process from perceived quality, which she defines as „the customer’s judgement about the product’s overall excellence or superiority” (Zeithaml, 1988, pp. 3). It is a higher level abstraction, not only an attribute of the product, and the judgement is usually made within the customer’s evoked set. One direction of the researches distinguishes objective quality from perceived quality and defines it as „measurable and verifiable superiority on some pre-determined ideal standard or standards” (Zeithaml, 1988,
Others say that we cannot speak about objective quality as every quality evaluation is subjective, so objective quality arguably does not even exist (Maynes, 1976). According to Olson (1977), quality can be dichotomised into intrinsic and extrinsic cues. Intrinsic means the physical attributes of the product, the extrinsic ones are the other product related cues as price, brand name, level of advertising, etc. (Olson, 1977).

In addition, Zeithaml looked at the price which is “what is given up or sacrificed to obtain a product” (Zeithaml, 1988, pp. 10), so perceived price is what the customer senses and encodes from this; the accurate number, an approximate number, a relative feeling, etc. Again, it is not the objective price, which affects the customer the most, but the perceived one. The difference between the actual and perceived price is affected by the lack of price information, price level of the product, complexity, required processing time, price dispersion, if the same brand priced differently across stores and quality to have wide price variance (Maynes - Assum, 1982). However in full price models in economics, monetary price is not the only perceived sacrifice of the product or service. Customers acknowledge time, search, effort and psychological costs as non-monetary costs (e.g. Becker, 1965).

The question would be whether price and perceived quality is positively related, yet the literature gives no clear answer. Most of the researches in the literature provided non-existent or only low or even non-linear relationship between the two constructs (Zeithaml, 1988).

Having examined the antecedents of perceived value, we move forward to have a closer look at the concept itself.

2.1.2 The Concept of Perceived Value
Zeithaml (1988) defined the perceived value as “the customers’ overall assessment of the utility of a product based on perceptions of what is received and what is given” (Zeithaml, 1988, pp. 14) She used the previously described antecedents to give the components of the received benefit; salient intrinsic attributes, extrinsic attributes, perceived quality and other relevant high level abstractions. The sacrifice component is equal to the broader meaning of price; it is the sum of monetary and non-monetary sacrifice. She found that the value is highly personal, idiosyncratic and context-dependent; and concluded that from the above mentioned elements, customers consider extrinsic attributes as stronger value signals to anticipate the perceived benefits and costs of the product (Zeithaml, 1988).
Kotler - Keller (2008) acknowledges a similar approach to perceived value like Zeithaml. In their generally known marketing book, the Marketing Management, they define perceived value as the difference between all the benefits and costs associated with the product or service. Furthermore, the customer compares an offering with the perceived alternatives, which alters the perceived value of the offering. On the one hand, the total customer benefit can be separated to product benefit, service benefit, personnel benefit and image benefit. On the other hand, the total customer cost is equal to the sum of monetary cost, time cost, energy cost and psychological cost suffered during evaluating, obtaining, using and disposing the product. In Kotler - Keller’s interpretation they all have a value in monetary terms, which makes them comparable. The perceived value – in the end – is compared to the customer’s expectation; if the perceived value exceeds it, then the customer is satisfied and most probably will buy the product again (Kotler – Keller, 2008).

Some studies suggest that perceived risk should be included as a third component to the model (Day - Crask, 2000; Huber et al., 2000). Perceived risk was brought into the marketing literature by Bauer in 1960 and is defined as a subjective expectation of loss (Mitchell, 1999). Rajh (2012) examined the validity of perceived performance risk and perceived financial risk in the perceived value literature, and she found that they have significant effect on perceived value.
Furthermore, peripheral studies suggest that value can be interpreted as either a multiplicative or an additive function of benefit and sacrifice (Cronin - Brady - Brand - Hightower - Shemwell, 1997).

The other direction of the researches is the multi-dimensional approach, which aims to find the formative components of perceived value. One of the first more extensive researches can be linked to the Sheth - Newman - Gross (1991). They categorised the values which influence customer behaviour into five groups: functional value, conditional value, social value, emotional value and epistemic value. They claimed the following. When a customer makes a choice more than one consumption value can be identified and these values are “independent, relating additively and contributing incrementally to the choice” (Sheth et al., 1991, pp. 165). Their work is validated through an extensive investigation on different fields of economics, social and clinical psychology.

According to their research, functional value is the perceived utility acquired from the product’s functional, utilitarian or physical performance through its functional, utilitarian or
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physical attributes. This value gives the base for Marshall’s (1890) economic utility theory and the “rational economic man”.

The social value is the perceived utility associated with one or more positively or negatively stereotyped demographic, socio-economic or cultural-ethnic groups. The related products are mostly highly visible goods and also to be shared with others.

The emotional value is the perceived utility acquired from an offering’s capacity to arouse feelings or affective states. This value was researched in several fields from hemispheric brain lateralization through non-cognitive motivation to advertisement and atmospheric research.

The epistemic value is the perceived utility which arouses curiosity, provide novelty and satisfy a desire for knowledge. Most of the time these are entirely new experiences, but a simple change in a product can give this value as well.

The conditional value is the perceived utility associated with a certain situation or a set of circumstances facing the customer. Examples can be products that have a seasonal value as Christmas cards or more subtle associations as coke and popcorn at the cinema. (Sheth et al., 1991)

Based on the above mentioned categorisation of Sheth et al. (1991), Sweeney and Soutar (2001) conducted a research in which they reduced the dimensions with factor analysis to four. They criticized Sheth et al.’s approach as they grouped quality and price together which are obviously opposite values regarding their directions. Moreover Sweeney claims that they also allow the dimensions to be interrelated unlike Sheth et al.’s approach. Their dimensions are the following.

The first is the functional performance and quality value, which is derived from the perceived quality and performance of the offering. Next is the functional price value, which is derived from the reduction of the product’s perceived short or long term costs. The social value is the utility stemming from enhancing the social self-concept. Last but not least, emotional value is the feelings and affected states that a product generates. They didn’t manage to detect the epistemic and conditional value because the method they used wasn’t suitable for examining these two transient categories. They developed the PERVAL model; a measurement scale of customers’ perceptions of the value of durable goods. (Sweeney – Soutar, 2001)
Holbrook represents a bit different approach. He defined perceived value as an “interactive relativistic preference experience” based on three dichotomies (in Sánchez-Fernández - Iniesta-Bonillo, 2007, pp. 439).

(1) Extrinsic versus intrinsic: “a product viewed instrumentally as a means to some end versus a consumption experience prized for its own sake as an end in itself”.

(2) Self-oriented versus other-oriented: “something valued by virtue of the effect it has on oneself or for one’s own sake versus an aspect of consumption positively evaluated because of how others respond or for the sake of someone else”.

(3) Active versus reactive: “involving the manipulation of some product by its user versus the appreciation of some consumption experience wherein an object affects oneself rather than vice versa” (in Sánchez-Fernández - Iniesta-Bonillo, 2007, pp. 439).

From these dichotomies, he generates eight types of perceived value:

Table 1: Typology of Customer Value by Holbrook (1999)

<table>
<thead>
<tr>
<th>Self-oriented</th>
<th>Extrinsic</th>
<th>Intrinsic</th>
</tr>
</thead>
<tbody>
<tr>
<td>Active</td>
<td>Efficiency (output/input, convenience)</td>
<td>Play (fun)</td>
</tr>
<tr>
<td>Reactive</td>
<td>Excellence (quality)</td>
<td>Aesthetics (beauty)</td>
</tr>
<tr>
<td>Other-oriented</td>
<td>Active</td>
<td>Status (Success, impression management)</td>
</tr>
<tr>
<td>Reactive</td>
<td>Esteem (reputation, materialism, possession)</td>
<td>Spirituality (faith, ecstasy, rapture, sacredness, magic)</td>
</tr>
</tbody>
</table>

Source: In Sánchez-Fernández - Iniesta-Bonillo (2007, pp. 439)

There are several other results of researches aiming for dimensional splitting; the following summary is based on Sánchez-Fernández - Iniesta-Bonillo (2007) and Ercsey (2012).

Table 2: Dimensions of Perceived Value by Research Papers

<table>
<thead>
<tr>
<th>Dimensions</th>
<th>Authors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Emotional, practical, logical</td>
<td>Mattsson (1991)</td>
</tr>
<tr>
<td>Functional, emotional, social, epistemic, conditional</td>
<td>Sheth (1991)</td>
</tr>
<tr>
<td>Functional, emotional</td>
<td>Grönnroos (1997)</td>
</tr>
<tr>
<td>Quality, price, acquisition utility, transaction utility</td>
<td>Grewal (1998)</td>
</tr>
<tr>
<td>Functional quality, functional price, emotional, social</td>
<td>Sweeney (2001)</td>
</tr>
<tr>
<td>Quality, emotional response, monetary price, behavioural price, reputation</td>
<td>Petrick (2002)</td>
</tr>
<tr>
<td>Functional, social, emotional, perceived sacrifices</td>
<td>Wang et al. (2004)</td>
</tr>
<tr>
<td>Functional, emotional, social</td>
<td>Sánchez (2006)</td>
</tr>
</tbody>
</table>

Source: Own editing based on Sánchez-Fernández - Iniesta-Bonillo (2007) and Ercsey (2012)
The previous overview focused mainly on the topic in general, but I have to mention that there are researches aiming to define perceived value in specific areas, e.g. in service environment (Petrick, 2002), in B2B context (Gassenheimer - Houston - Davis, 1998), in retail (Kerin - Jain - Howard, 1992) or regarding specific industries (Sanchez - Callarisa - Rodriguez - Moliner, 2006).

2.1.3 Consequences from the Perceived Value Literature

We can conclude from this review of the perceived value literature that it is a widely researched topic and has many different understandings and interpretations, which all make sense from different viewpoints. For my further research I had to choose a model which has the best fit with my research questions and with the brand of Apple. After careful consideration I voted for the model of Kotler - Keller (2008) for the following reasons.

- First, to examine the whole, complete value perception, I needed a model, which contains the negative values (the costs) as well; this means that the two-dimensional models, Zeithaml’s and Kotler - Keller’s ones seemed relevant. In my opinion, the multi-dimensional models are more useful for comparing the perceived value of different product categories or brands.
- Kotler - Keller’s model is an extended version of Zeithaml’s model, which enables more detailed understanding of perceived value.
- Kotler - Keller’s model has the most marketing aspects, which are very useful in a research connected to end-users.
- Even though Kotler - Keller’s model is not fully validated, it translates theoretical constructs and dimensions of perceived value more customer-oriented than any other models included in my theoretical background revision.
- Based on the four reasons mentioned above, the measurement of Kotler - Keller’s dimensions can be realized through well-supported statements, which make the most appropriate question type for the segmentation analysis.

Therefore I used the model created by Kotler - Keller for my additional secondary, as well as the primary research. In the next chapter, I will discuss the perceived value of Apple based on the secondary research. This will be completed later on in the qualitative and quantitative research phases.
2.1.4 Apple’s Perceived Value

The perceived value of Apple is definitely high considering their profit and brand equity. As I already showed, Interbrand states that Apple’s brand equity is $76bn (Interbrand, 2012), BrandZ rates it to $182bn in 2012 (WPP, 2012). Their measurement methods are not totally different, but Interbrand makes the evaluation with the help of managers and experts, on the other hand BrandZ measures by asking a pool of customers. This shows how much customers may valorise the brand. But where is this high perceived value coming from? People tend to say that Apple has nothing else than its brand image. Although it is true that Apple has an outstanding brand image, it definitely doesn’t give us the complete answer. Now I will have a look at Apple’s perceived value with the help of Kotler - Keller’s model. Still first there is a need for a short summary of Apple’s history as a background.

2.1.4.1 The Story of Apple

The first Apple computer was made in 1976 by Steve Wozniak in his garage; he was the electronic genius and Steve Jobs was the businessman, who spotted the opportunity in it. They built and sold two hundred Apple I computers before Wozniak developed the Apple II, which is said to be the very first home computer. It wasn’t only useful for simple text display, but included graphics & colours and became very popular. The next step nevertheless, the Apple III, became a failure due to Jobs’ irrational expectations; for design reasons they made it without a fan, which resulted in overheating in several cases. (Wikipedia, 2012a)

In 1984, they introduced the first Macintosh computer with the famous advertising campaign: the 1984 commercial during the Super Bowl, the 39-page advertisement of the special post-election edition of Newsweek and the “Test Drive a Macintosh” promotion. The computer was entirely designed around an innovation – the Graphical User Interface –, which meant that the software developers had to learn a completely new way of programming and this resulted in an initial lack of software for the new system. Guy Kawasaki was one of the sales people, who tried to sell the computer to developers; he became the first Apple evangelist and eventually created the base for the concept of evangelist marketing. In the end, the Macintosh turned out to be a success, and it became known as the de-facto platform for many industries including cinema, music, advertising, publishing and arts. (Wikipedia, 2012b)

In 1985, Jobs was made to leave the company due to an internal power struggle and he only came back in 1997. For the company these were the years of derailment; many CEO changed seats, they lost product focus and became “arguably one of the worst-managed companies in
the industry” (Wikipedia, 2012b). For Jobs these were the years of learning by trial and error; he established his own computer company, called NeXT, which developed the predecessor of the Mac OS X operating system, and bought Pixar in which he saw a lot of opportunities (e.g. just to mention Toy Story). These years “turned him into the kind of man and leader, who would spur Apple to unimaginable heights upon his return” (Schlender, 2012, pp. 75).

In 1997, Apple bought the already struggling NeXT which brought Jobs back to the company. He became the interim CEO and after a while the permanent one. He based the strategy on the following pillars: (1) New Board of Directors; he collected smart and experienced businessmen to lead the company, (2) Focus on Relevance; meaning the relevant target markets and products, (3) Invest in Core Assets; which he considered to be the Apple brand and the OS X software, (4) Meaningful Partnerships; partnership with Microsoft and (5) New Product Paradigm, which most probably meant the opening to different product categories (Wikipedia, 2012c). In 2001, they introduced the iPod and not long after the iTunes. This new music ownership paradigm became very successful and made the iPod the portable media player of the decade. The next step was to reform the mobile phone market; in 2007 the iPhone was introduced with an innovative touchscreen and many different useful applications. Furthermore in 2010, they created the tablet market by introducing the iPad (Wikipedia, 2012b).

After this short summary of the most important milestones of Apple’s history, we can have a look at the perceived benefits and costs of Apple.

2.1.4.2 Perceived Customer Benefit

Product Benefit

First, the total benefit component starts with the product benefit. Regarding Apple, it makes a very important part of the strategy, and through this component they give high, acknowledged value to the customers. Apple’s philosophy is to concentrate every resource only on a few products and make them exceed outstandingly well. Jobs said once that “people think focus means saying yes to the thing you’ve got to focus on. But that’s not what it means at all. It means saying no to the 100 other good ideas that there are. You have to pick carefully” (Morris – Levinstein, 2008, pp. n/a). And for Apple it is also beneficial that they own most parts of their devices, meaning both hardware and software, which allows them to exploit the synergies from them as well. This way of thinking made Apple live in the future; they definitely introduced us products which a bit changed our lives. The Apple II changed what
we think about personal computer, the iPod and iTunes changed our way of listening to music, the iPhone changed our relationship to mobile phones, etc. (Morris – Levinstein, 2008).

Second, the products acknowledged to be simply easier to use and maintain. Windows fans say that Apple products are for dumb people, who don’t know how to use a technical device (Hogg, 2012). The counterargument is that Apple devices don’t need a technical genius to be used properly, they ask exactly the right amount of questions and their logic is adjusted to the everyday people. “You could also look at any of Apple’s notebook computers, which offer awful bang for the buck when it comes to features and specifications, but amazing value when it comes to actually getting stuff done” (Comeau, 2011, pp. n/a). This is a never-ending debate, but we can definitely say that Apple products hold value in their user-friendliness.

Third, the products complement and complete each other. There are a lot of synergy opportunities, which can be exploited by customers who own more than one Apple product.

Furthermore, the products are considered to be well-built and stable. Customers have to fight less bugs and viruses on an OS X than on a Windows software (Anonymous, 2012b). As well as Apple products said to have longer lifetime in average.

Plus I have to mention the design of the products. In our era, minimalism is becoming a leading design trend, and this was well spotted by Apple in 1997. “Minimalism is a very strict design aesthetic where things are stripped down to the fundamentals” (Mel, 2011, pp. n/a). Regarding perceived value it is important from two aspects. First and foremost, this gives emotional benefits to the customers during the use of the products, and second it gives identity to the products, makes them easier to recognise, which gives social value.

Apple is also “lucky” that it produces personal computers, phones and other tools which are considered to be very close to people. If you ask them what the most important object in their lives is¹, some will mention their small pillow or teddy bear, but many people will say their notebook or phone. Because we use them every day, store our personal data on them, attach our most important memories to them, so it is not surprising that they evoke deep emotions.

¹ Based on a task carried out during a “Psychological and Creative Aspects of Corporate Communication” class at the Corvinus University of Budapest in 2010.
Image Benefit

As I indicated above, Apple’s image gives a big contribution to the overall perceived value. Apple recognised very soon the benefits of marketing and branding and invested a lot of money in it. They created Apple as a truly emotional brand; with everything they do, they try to awaken emotions which gives psychological benefits to the users. Apple is about opposition and togetherness, imagination and innovation. (Kahney, 2004)

In the early years, it represented the technological counterculture, the effect of which still can be felt a bit. This image is standing on more pillars. First it is claimed by Markoff (2005) that there is a direct connection between the counterculture of the late 1950s and 1960s and the development of the computer industry. Apple also represented the power-to-the-people philosophy, and it took a big role in shaping the personal computer market, as well as the rainbow coloured logo is said to be connected to that movement. (Kahney, 2004)

Second, it meant the war against Goliath, who was represented in the early years by IBM, then Microsoft. “To Mac users Apple is everything that Microsoft isn’t. Apple innovates, Microsoft copies. Apple puts out solid products, Microsoft puts out buggy ones. Apple represents creativity and individuality, Microsoft represents business and conformity. Apple is the scrappy underdog, Microsoft is the big, predatory monopoly” (Kahney, 2004, pp. 248). This was highly attractive to the technology innovators and everyone who disliked IBM or Microsoft for any reason. However, Apple hasn’t always been the small David; there were years in the ‘70s and ‘80s when it was quite successful (Wikipedia, 2012b), but they always generated this image.

Third, Apple has always been opposing to normal everyday things, their communicated vision was to change the world, which is well expressed in the text of the Think Different campaign. “Here’s to the crazy ones. The misfits. The rebels. The troublemakers. The ones who see things differently. While some may see them as the crazy ones, we see genius. Because the people who are crazy enough to think they can change the world, are the ones who do.” This appealed to many people because it speaks about the meaning of one’s life, which is not easy to find, many times because of the conventions we follow. Apple says no to these conventions (Wikipedia, 2012d).

Other important image value is belonging to a community, which is a fundamental need of people. The Apple community, which is mainly called Mac community, is really strong; Tom
O’Quinn, leading expert in “brand communities” acknowledged it as a prime example, the most cohesive from the ones he examined. The Mac community displays the three central characteristics of all communities; (1) shared consciousness, we-ness, the members think they are a bit alike and know each other – even if they have never meet – because they share common values, (2) rituals and traditions, e.g. the Macworld, where they can meet, and (3) moral responsibility to the community as a whole and to each other (in Kahney, 2004). They are not only an ad-hoc group of people, who happened to use the same kind of computer, but they represent a distinct subculture, a highly creative, knowledgeable and supportive community. Also by joining the community of Mac users, people verify themselves that they hold these values. They feel a bit more creative, a bit more innovative, in one word: a bit cooler. (Kahney, 2004)

This shows that innovativeness and creativity also hold value to the people. As I mentioned above, in the last fifteen years Apple always surprised us with products we couldn’t have imagined before. On the one hand, this gave us the feeling we last had in our childhoods; the excitement of wonderment and discovery. On the other hand Apple made us believe that this will always be like that, that they can always look in the future and bring us some new tools we can play with. This made us trust and follow them. (Kahney, 2004)

Apple has strong connection to creativity as well through their innovative and well-designed products, catching advertisements and because of the high density of Apple computers used in the creative industries; “in 1997, 80% of all computers used in advertising, graphic design, pre-press, and printing were Apple computers and 64% of internet websites were created on a Macintosh” (Wikipedia, 2012c).

**Service and Personnel Benefit**

In these two value categories, Apple doesn’t do outstandingly well, they are not in the focus, at least I didn’t find many sources for these Benefit components. However, they put a lot of effort in running their “own” Apple stores, which gives benefit to the customer in more sense. One is that the staff is usually well-trained, especially the Geniuses, so they can answer the questions and address problematic issues competently. Another issue is that the stores are places where people can meet each other and explore the products together, which gives social value. (Kahney, 2004)
2.1.4.3 Perceived Customer Cost

I am going to discuss the costs in one chapter because they are so linked to each other that there is no sense in separating them.

Starting with the monetary sacrifice, for an Apple product it is generally considered very high. It differs geographically; in the USA it is cheaper but still expensive compared to the market average. In whole Europe, the price level is the same, but there are big differences caused by the differences in real terms. An example: the iPhone costs approximately 600 euros, the average wage in Hungary is approximately 800 euros/month, in The Netherlands it is approximately 1700 euros/month (Wikipedia, 2012e). (We should note that the living costs are different as well, so it is only a rough indication of the existence of differences.) However, this overpricing strategy seems to change. The iPhone can be bought with a contract for 200 euros and the iPad was also far underpriced compared to the expectations (Szymanowsky, 2012).

This can be linked to a very serious potential psychological cost: sacrificing our rational self, which warns us that what we get is not a good deal for the price we pay. For the more impulsive and emotional people this can be very low and easily negligible, but for more price conscious and rational people this can be the main reason why not to buy an Apple product (Hogg, 2012).

The other big disadvantage we have to cope with is the incompatibility with other platforms. This can mean time, energy and psychological cost as well. For example if we have a presentation and we want to use it on Windows and on OS X or iOS as well, then it is better to have two separate presentations optimised to the two platforms to avoid bugs and errors, because they are still not fully compatible. Obviously, it takes more time and energy to develop the two presentations.

Also if you are creating a presentation with a group of people, half of them have Macs, the other half of the group have Windows, it will most probably be chaotic and in the end you have to choose a single platform, because of the incompatibility problems. This can cause psychological problems; “which to choose, how to choose and anyway why cannot they be compatible..?”

In the ’70-90s, it was an even more serious issue. In 1997, they started the partnership with Microsoft and the Office Pack for Mac was developed. Before that, both had their own
systems; this was the time when the compatibility image was the strongest, but the effect can still be felt and moreover they are still not fully compatible. (Wikipedia, 2012c)

I have to mention the effect of network externalities, which – we have to admit – is not enough strong in the case of Apple computers. However, the level of sales in units is nicely growing (Dowling, 2012), but the number of owners is still so negligible compared to other platforms (Wikipedia, 2012f), that a lot of application and game developers simply ignore the Mac users. They just don’t develop the application or the game to Mac computers, this means abdication and as a result psychological costs to the users.

Furthermore, there are more cost-related issues, for example the restrictions. An iPod or iPhone can only be synchronized to one computer. This impedes to use an iPhone for business and personal phone in one, as you cannot synchronize it to your company computer and personal computer at the same time.

Last but not least, there is Apple’s supply chain issue, which certainly causes some psychological controversy within the users. Foxconn, one of the companies in China which produces Apple products had to install nets around its building, because the increasing number of exhausted workers committed suicide by jumping out of the windows. They are overworked, underpaid and Apple doesn’t seem to do much against it. (Young, 2011)

After we got familiar with the concept of perceived value and its relevance for an Apple-focused topic, we can continue with the loyalty related concepts.

2.2 Connection between Brand & Self

In this section, I will introduce the concept of involvement, loyalty, evangelism, attachment, commitment and engagement. I structured the sequence of the concepts according to the different levels and characteristics of the bonding. The first is involvement, which I defined as the gate to the brand&self concepts; without involvement we cannot speak about any of the other concepts. The next is loyalty, because according to the core of the concept, it doesn’t necessarily contain emotions. It can be just simple repurchasing. In the case of evangelism, as a next level of loyalty, we can assume a deeper belief, conviction about the product, since this makes people invest more energy to recommend it to others. Starting from the attachment concept we can speak about a relationship between the brand and the person; the strength of which is described by the attachment concept, the length by the concept of commitment and the depth, the embeddedness by engagement.
Naturally, these concepts are much broader than described above; in the next section I will introduce them more comprehensively. First, we will have a closer look at the concept of involvement.

2.2.1 Involvement

Involvement, similarly to most of the brand & self concepts, is a controversial category in the marketing literature; we can find several definitions and opinions how to approach it. According to Rothschild (1984) it is “an unobservable state of motivation, arousal or interest” (Smith – Carsky, 1996, pp. 75). For Zaichkowsky (1985) involvement is a “person’s perceived relevance of the object based on inherent needs, values, and interests” (Zaichkowsky, 1985, pp. 342). They both include the causative factors; in Rothschild’s definition it is either a particular stimulus or a situation, on the contrary Zaichkowsky (1985) claims that the interaction of the individual, the product characteristics and the situation evokes involvement. She stops here with the definition, but Rothschild also includes the consequences: types of searching, information-processing and decision making (Rothschild, 1984). Simply saying it is the state of mental readiness towards the object (Thomson - MacInnis - Park, 2005).

Involvement is often viewed as a two-fold dichotomy concept. A customer can be involved to low or high level (Engel – Blackwell, 1982). However, Kapferer and Laurent (1985-86) researched the topic of involvement levels and they found that only 25 % of the cases is represented by this two extremes. The other 75% is more contrasted, more nuanced; the customer is high on some facets of involvement and low on other ones. They claimed that these antecedents of involvement are:

- interest, the ego-importance of the product,
- pleasure, the hedonic and rewarding value of the product,
- sign, perceived ability of brand choice to express one’s status, personality or identity,
- risk importance, perceived importance of the negative consequences of a mispurchase,
- probability of risk, subjective probability of making a mispurchase.

With these variables they made a cluster analysis, which gave them ten levels of involvement, which are the followings:

- Minimal involvement
- Functional differentiation
- Undramatised risk
- Small pleasure
• Conformist purchase
• Riskless involvement
• Functional involvement
• Pleasure involvement
• Need for expertise
• Total involvement

Another way to explain involvement is done by Park and Young (1984); they made a distinction between cognitive and affective involvement. Obviously, cognitive involvement comes from utilitarian motives, the affective one from emotional motives.

According to the object of involvement, we can speak about advertisement involvement which results in more counterarguments to the ad (Wright, 1974), product involvement which leads to higher perception of product attributes, higher product importance and commitment (Howard – Sheth, 1969), and purchase involvement which makes people search for more information and dedicate more time to the purchase (Clarke - Belk, 1978).

2.2.2 Loyalty

There is no exact definition of customer loyalty, this is also a widely defined concept. Tellis (1988) said that loyalty means willingness to repurchase the brand and also the rate of same or similar brand purchases. According to Newman and Werbel (1973) we can call a customer loyal if he buys a brand without searching for information and considering other brands. A widely accepted definition can be linked to Jacoby and Chestnut (1978); they stated that six conditions must be met. Brand loyalty is defined as “(1) the biased (i.e. non-random), (2) behavioural response (i.e. purchase), (3) expressed over time, (4) by some decision-making unit, (5) with respect to one or more alternative brands out of a set of such brands, and (6) is a function of psychological (decision-making, evaluative) processes” (in Salegna – Fazel, 2011, pp. 43). According to Cheng (2011, pp. 150) “customer loyalty is a customer’s sense of identification with a business which affects repurchases intentions, spending amount, the possibility of recommendation, and even the willingness to become part of a business”.

There are two directions of the defining intentions. The first one claims that loyalty is a behaviour meaning „a behavioural reaction based on prejudice as the function of psychological processes by the decision maker in the existence of one or more alternative in time” (Jacoby - Keyner, 1973, pp. 3). According to the second direction, loyalty is a
combination of attitude and behaviour; “a form of repeat purchasing behaviour reflecting a conscious decision to continue buying the same brand, for brand loyalty to exist, a pattern of repeat purchase must be accompanied by an underlying positive attitude towards the brand” (Solomon - Bamossy - Askegaard - Hogg, 2006, pp. 350). If there is only attitudinal loyalty, it means that customers are unlikely to buy the product, but they will recommend it to others through word of mouth. There are several studies handling attitudinal loyalty as antecedent of behavioural loyalty (e.g. Bandyopadhyay - Martell (2007), Jacoby - Keyner (1973), etc.), and there are others (e.g. Chaudhuri – Holbrook, 2001), which claim that the relationship of attitudinal and behavioural loyalty is interrelated and not a cause-effect.

Researchers realised that there is a need for identifying the dimensions and levels of loyalty. Dick and Basu (1994) combined the levels of attitude with the levels of repurchase behaviour, which gave them the following dimensions:

<table>
<thead>
<tr>
<th>Behaviour high</th>
<th>Behaviour low</th>
</tr>
</thead>
<tbody>
<tr>
<td>Attitude high</td>
<td>spurious loyalty</td>
</tr>
<tr>
<td>Attitude low</td>
<td>no loyalty</td>
</tr>
</tbody>
</table>

Table 3: The Dimensions of Loyalty According to Dick and Basu (1994)

Oliver (1999) called these levels of loyalty cognitive, affective, conative and action, but he meant almost the same as Dick and Basu (1994), despite the fundamental difference in their views that according to Oliver (1999) loyalty grows as a progression through a sequence of the mentioned phases.

Cognitive loyalty is similar to spurious loyalty in a sense that both mean purchase and consumption evaluated by certain criteria which don’t resonate very much with the customer, so there is no real change in satisfaction or attitude. Latent loyalty has the similar meaning as affective loyalty; Oliver said that it is the phase in which liking of or attitude toward the brand grows, but the customer is still open to use other brands. This is the situation where attitudinal loyalty exists but behavioural does not entirely. Conative loyalty and Dick and Basu’s loyalty state is the preferred condition when customers reach the optimal balance between attitude and behaviour. For Oliver, action phase is one more upper level, this is the last, in which there is a resistance to the suggestions of other brands and the repurchasing is managed by inertia.

Many researchers tried to identify the antecedents of loyalty, but this turned out to be a difficult project. Curran, Varki and Rosen (2010) suggested that the reason behind the difficulties can be that loyalty is not a static concept, as for example Oliver said as well, so the
antecedent can be different and can have different levels of impact in the different stages of loyalty. They used Oliver’s phases and examined the importance of customer experience, price/value, the relationship with the seller and the exit barriers in each phase. In the cognitive stage experience, relationship and exit barriers found to be significant, in the affective stage experience and price/value, and in the conative it was only experience. This means that only customer experience has equally high importance in every stage. By customer experience, they mainly mean satisfaction caused by the purchase and consumption. (Curran – Varki – Rosen, 2010)

Figure 5: The Structural Model of Curran et al. (2010)

Source: Curran et al. (2010)

What Curran et al. didn’t examine is the effect of branding on loyalty. Iglesias, Singh and Batista-Foguet (2010) discussed the term of brand experience of Brakus, Schmitt and Zarantonello (2009) and conducted a research about its effect on loyalty. According to Brakus et al. (2009), brand experience is “subjective, internal customer responses (sensations, feelings, and cognitions) and behavioural responses evoked by brand-related stimuli that are part of a brand’s design and identity, packaging, communications, and environments” (Brakus, 2009, pp. 53). Iglesias suggests that brand experience has a strong effect on loyalty, and the relationship is mediated by affective commitment. (Iglesias et al., 2010)
Another acknowledged model is developed by Gronholdt (2000, in Hetesi (2003)). This model tries to connect the perceived value with customer loyalty through satisfaction. Brand experience is not explicit in this model but included mainly in the Image antecedent.

Figure 6: The Relationship between Perceived Value and Loyalty According to Gronholdt (2000)

2.2.3 Evangelism

According to McConnell and Huba (2004) this concept is a higher level of loyalty. The Evangelist word means “the messenger of good news”, and it is originally a religious concept referring to the authors of the four Gospels from the New Testament. In marketing, we use the term for people who are loyal to a brand and believe in it so much that “they are compelled to spread the word, and voluntarily recruit their friends and colleagues on the brand’s behalf” (Huba, 2012, pp. 46). Naturally, they buy the products of the brand, but what’s more they often buy them for also giving them as gifts. They convince their friends and acquaintances that they should buy that particular brand. They are basically unpaid marketers. Furthermore, they provide unasked praise towards the company and also suggestions for improvement. They have the feeling that they are a part of something bigger than themselves. And as a consequence, they forgive the brand very easily for the occasional mistakes. (Huba, 2012)

Huba (2012) gives a loyalty ladder starting from satisfaction, through repeat purchase, word of mouth, evangelism and ending with ownership. According to her, ownership is “when a
customer feels like she is part of the organization and will do unexpected and surprising things (...) to support the brand” (Huba, 2012, pp. 46).

2.2.4 Attachment

From here we start to talk about the connection, the relationship between the brand and the person. The first in the line is attachment, which is defined as “the strength of the bond connecting the brand with the self” (Park - MacInnis - Priester - Eisingerich - Iacobucci, 2010, pp. 2). Two critical factors should be mentioned, which determine its level. The first is brand-self connection, meaning the cognitive and emotional connection between the brand and the self. Although the brand-self connection is “cognitive in its representation”, the relation is fundamentally emotional. The other is brand prominence, which is “the extent to which positive feelings and memories about the attachment object are perceived as top of mind” (Park et al, 2010, pp. 5). This includes the perceived ease and frequency of the feelings and thoughts come to mind about the brand. This suggests that brand prominence develops over time and becomes the part of the customer’s memory. (Park et al., 2010)

A special kind of attachment is attachment to a community. The level of attachment has a big contribution to participation and retention of the members of the community (Preece, 2000). As well as the strongly attached members create more valuable content, alter the norms of appropriate behaviour (Smith - McLaughlin - Osborne, 1997), impose sanctions (Chua – Wareham - Robey, 2007) and help the maintenance of the community in other ways (Butler - Sproull - Kiesler - Kraut, 2007). There are two kinds of attachment: the first is based on the identification to the community and the other one is based on the interpersonal bond among the members of the community. Both types increase the overall attachment, but the identity-based attachment has substantially stronger effects (Ren - Harper - Drenner - Terveen - Kiesler - Riedl - Kraut, 2012).

2.2.5 Commitment

Commitment is defined as “the willingness to make short-term sacrifices to realize longer-term benefits” (Gundlach - Achrol - Mentzer, 1995, pp. 78). However, for the purpose of this paper, it is more important that commitment is “an implicit or explicit pledge of relational continuity between exchange partners” (Dwyer – Schurr - Oh, 1987, pp. 19).

There are several kinds of commitment distinguished; the followings should be mentioned. Affective commitment is the “customer’s wish to maintain the relationship, is rooted in feelings of loyalty and attachment, and comprises a positive motivation” (Geyskens -
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Steenkamp - Scheer - Kumar (1996) in Bugel - Buunk - Verhoef, 2010a, pp. 8). Calculative commitment “is based on more rational motives”, on the sum of pros and cons and the evaluation of the exit barriers and costs from the relationship. It follows that it is “much more rooted in a negative motivation” (Geyskens et al. (1996) in Bugel et al., 2010a, pp. 8).

One widely used model to describe the antecedents of commitment is Rusbult’s Investment Model. It claims that commitment is positively related to the level of the satisfaction originating from the relationship. In addition, it is positively related to the investment size; the more people invest in a relationship, the more committed they will be. Finally, commitment is negatively related to the quality of the possible alternatives. (Rusbult – Martz – Agnew, 1998)

Figure 7: The Antecedents of Commitment According to Rusbult et al. (1998)

Source: Rusbult et al. (1998)

Rusbult used this model on person-to-person relationships, but Bugel et al. (2010a) confirmed by conducting a research in five different sectors that the model is true for customer-company relationships as well.

The same authors also tried to confirm Sternberg’s (1986) model (Figure 8), the Triangular Theory of Love to customer – company (brand) relationships (Bugel - Buunk - Verhoef, 2010b). Counterarguments are that commercial relationships hold less frequent interactions, which are less personal and interactive and involve concrete transaction (e.g. money – product). However, they managed to detect these components in their research, the only difference is that – for them – intimacy and passion wasn’t separated. So they found “the commitment to continue a relationship and a mere emotional evaluation of the relationship, which includes both intimacy and passion” (Bugel et al., 2010b). (They gave the name “intimacy” to the second component.)
They claim that intimacy has higher importance in the beginning of the relationship and when it is on a mature level. Furthermore, they tried to examine intimacy as the fourth antecedents of commitment (besides satisfaction, investment and alternatives) with hierarchical regression model, and they found that it has significant explanatory power in each sector they researched, so basically they proposed intimacy as the fourth antecedent. (Bugel et al., 2010b).

Regarding the components of commitment, Gundlach et al. (1995) came up with the following categorisation. The first component is the input or instrumental component, which is an “affirmative action taken by one party that creates a self-interest stake in the relationship and demonstrates something, more than a mere promise” (Gundlach et al., 1995, pp. 79). The second one is the attitudinal intention to develop and maintain a stable long term relationship, and the third component is the temporal dimension, in other words that the “inputs and attitudes brought to the relationship must reveal consistency over time” (Gundlach et al., 1995, pp. 79).

2.2.6 Engagement

Engagement is a recent construct in the marketing literature; it focuses on the relationship between the customer and the brand. However, Gambetti, Graffina and Biraghi (2012) pointed out in their research that there is a considerable difference between the academic literature and the professional point of view. In academic literature there is a stream of researches which focuses on the cognitive dimension of engagement, i.e. the mental activation process of a customer towards a brand. The other one examines the affective component and claims that the feelings activated by the brand have central role in the development of engagement. The
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traditional communication for mainly the purpose of mass visibility and unconventional for getting the customers into the world of the brand and activating them. (Gambetti et al., 2012)

2.2.7 Consequences from the Brand & Self Literature

As we could see all of the above described concepts are controversial, the definitions of different researchers can vary, they contain many different models, and moreover the concepts sometimes can overlap. Therefore for the easier understanding and recall during the further research I give in the Table 3 a short essence, the core of the concepts as I understood them from my literature review.

Table 4: The Essence of the Brand & Self Concepts

<table>
<thead>
<tr>
<th>Concept</th>
<th>Essence</th>
</tr>
</thead>
<tbody>
<tr>
<td>Involvement</td>
<td>Relevance of the object</td>
</tr>
<tr>
<td>Loyalty</td>
<td>Repurchase intention and action</td>
</tr>
<tr>
<td>Evangelism</td>
<td>WOM and action beyond repurchase</td>
</tr>
<tr>
<td>Attachment</td>
<td>Strength of the bond</td>
</tr>
<tr>
<td>Commitment</td>
<td>Length of the connection and the size of the sacrifice</td>
</tr>
<tr>
<td>Engagement</td>
<td>Relationship embeddedness and interaction</td>
</tr>
</tbody>
</table>

Source: Own editing

In the next section I will use the concepts for the case of Apple. My assumption is that all of the concepts are important and easily interpretable. Although I have to mention that I also expect that some of the concepts will be too evident for the brand of Apple, for example the concept of involvement. So let us have a closer look at the brand of Apple in the light of the brand & self concepts.

2.2.8 The Apple Fanaticism

My research showed not surprisingly that Apple customers are generally highly involved; as I already mentioned Apple produces personal products which are considered close to people, as well as the risk of mispurchase and the price are not negligible either, these makes the importance and thus the involvement high. However despite this the searching, information-processing and decision making are limited because the brand is so strong that most of the time people fully trust it.
Apple customers seem to be quite loyal as well, which is shown by many researches (e.g. Virki (2011), Goldman Sachs (2012), MetaFacts (2008)); 62% of one iPhone or iPad owners said that their new device would be an Apple product as well, regarding computers this number is even 81%.

If we think of the several mentioned benefits that level up the customer perceived value we may understand the level of loyalty – to some extent. There is a research from 2008 by InsideCRM in which they collected the most important factors in building loyalty towards Apple. They found the followings:

1. A store just for Apple with well-informed, friendly staff: it is entirely controlled by the brand.
2. Complete Solutions: the products complement and complete each other.
3. Are You a Mac?: i.e. Apple being a hip brand it has a strong identification with everything young, up-to-the-minute and smart.
4. Varied Products: meaning that having entry level products as well.
5. Media Fodder: Apple consciously generates it and people like to write and read about the brand.
6. Education Sales: through schools and universities making people familiar with the products quite early.
7. Products That Deliver.
8. Outsourcing Unpleasantness: e.g. regarding the iPhone it is AT&T (in the USA) which deals with the customer frustrations.
10. New Innovations: for keeping up the interest.
11. Attractiveness: meaning the design of the products. (InsideCRM, 2008)
As we can see this list overlaps very much with the benefits from the perceived value description in the previous chapter, which is obviously not a surprise.

The concept of evangelism is very important in the case of Apple, because they were who made it come to existence from the marketing point of view. To be more precise, it was Guy Kawasaki, a salesman who was hired in 1984 to sell the Macintosh to software developers because of the mentioned initial lack of software for the operating system. He believed in the Macintosh, and he was able to awaken similar commitment of others. He tried to sell the dream first. “The Mac is like any other computer. A typical salesperson would say that I’ll give you this box, give me 3000 dollar.” But instead he said that “this computer stands for a dream. The dream is productivity and creativity for people. Let me show you the dream. If you buy into it, let us go off together and sell it.” (Kahney, 2004, pp. 82)

He left Apple in 1987 and only returned in 1995; just in time to arguably save the company. Bad leadership styles and the sequential product failures resulted in negative press which, as a death spiral, made the people doubt and buy less Apple products which resulted in more bad news. Kawasaki’s solution was to launch a mailing list called EvangeList. “I decided that instead of trying to convince the press, we would become the press” (Kahney, 2004, pp.76). It was a daily newsletter with positive news about Apple, different tips, queries and job postings. It reached 44,000 subscribers but it was also widely passed around so the exact number of readers is unknown. He literally urged the people to become evangelists of the brand; to wear Apple-logo T-shirts, to leave Macintosh magazines in doctors’ waiting rooms and to volunteer to be salespeople of Apple products in stores on the weekends. All this to show the world that Apple is not dying out and it is as strong as it was. It worked, called thousands of evangelists for life (again) and established the evangelist marketing concept in the marketing sciences. (Kahney, 2004)

These give the base for engagement as well. Being in the centre of attention makes customers feel that they are the protagonists of the brand’s story. Their commitment is mainly coming from Apple’s commitment to costumer experience (Shaw, 2012). Apple managed to create the image that it had always been on the side of the customer, not the money; that their deepest mission is not to increase profits but to make people’s life better. Many people felt that it is more than a promise, Apple shows the attitude to maintain a long term and stable relationship and keeps the consistency over time; let us just think of the important successful product launches in the last ten years, which changed our lives. The high level of customer experience
with possibility to explore the brand in the stores and the box opening ceremony at home lead us to the proximity component of engagement. (Kahney, 2004)

Apple follows the concept of 360-degree engagement: „emphasizing the connection between passionate employees and customer retention and thus business profitability” (Ng, 2011, pp. n/a). However, Apple employees are not the most well-paid people. Even though they are fully engaged to Apple, they are one by one strong Apple fans, who get easier access to the products. In return they (un)consciously pass on the passion to the customers. Last but not least, Apple always tried to integrate its communication and arouse emotions with it, let us just think of the already mentioned campaign. (Ng, 2011)

The attachment, the strengths of the bond is considered high as its big part is based on emotions and affective attachment and due to the products’ usage frequency the brand prominence is also very high.

This short summary is only based on the secondary research and will be completed or clarified in the primary research. Before this I unfold the already mentioned recent changes.

2.3 The Recent Changes

In the last section of the Literature Review chapter, I will summarise the most important changes which can affect Apple’s position. In our fast-paced world if you reach something, you can never lay back and be sure that it will stay long. Nokia is a good example, it was the leading mobile manufacturer for many years, but it couldn’t keep up with the market’s development, which drifted them to the edge of bankruptcy in only five years (Anonymous, 2012c). This is definitely not the case for Apple yet, but we cannot deny the fact that Apple reached incredible heights in the 2000s with its continuously outstanding innovations and now they slowed down in the last two years (Keen, 2012). Here is an extensive list of the recent changes regarding Apple.

2.3.1 From Niche to Mass, i.e. David Beats Goliath?

Although in the ’70-80s Apple was really successful on the personal computer market, it couldn’t renew and also made a lot of mistakes so the competitors outpaced the company (Wikipedia, 2012b). The return of Steve Jobs in 1997 put Apple on a growing path again. They entered other markets (mp3 and mobile phone); they created one (the tablet market) and also introduced important innovations on the computer market (e.g. ultraportable computers). Nowadays 75% of their revenue is coming from iOS devices as iPhone and iPad and less
than one-fifty from Macintosh computers. With these relatively cheaper, more easily accessible products Apple could reach a critical mass; now having an Apple product is not that unique anymore. As a consequence of the halo-effect of these products, half of the new Macs are sold to new customers who switched from other brands. (McElhearn, 2012)

Figure 11: Total Apple Revenues by Product Line

Due to this growth, in 2010 Apple managed to pass Microsoft in total value; by the investors it was valued at $222bn against $219bn of Microsoft (Anonymous, 2010). As well as in 2012 Apple became the most valuable company of all time with a market value of approximately $623bn by surpassing Microsoft record of $620.58bn set in 1999 (the figure is not adjusted for inflation) (Anonymous, 2012a). However its revenue and profit are still lower than Microsoft’s.

2.3.2 From Innovation to Maintenance

One of the main pillars of Apple’s reputation is innovation; pioneering in the personal computer market, then giving a new meaning to the mp3 player’s market, creating the smartphone and tablet market made people trust the company. However, this incredibly fast innovation slowed down, they slowly shifted from radical innovations to incremental innovations. In the last two years the product launches rather disappointed the people; not because they weren’t good, but they weren’t as innovative as before (Michael, 2012).
2.3.3 From Counterculture to 35+

As I have already described, Apple created a counterculture image in the past however this is also changing. On the one hand because its products became mass products, especially the iPhone, but on the other hand for example YouGov’s BrandIndex shows that Apple’s brand perception is most positive among people 35+, and actually declining among 18-34 (Duncan, 2012). Apple clearly feels this change, which can also be concluded from the commercials of the 2012 Olimpic Games. They showed an Apple Genius who tried to solve the problems of 35+ people.

2.3.4 From OS X to iOS

Furthermore, there is another consequence of the success of iPhone and iPad. Since many people enter the Apple customer base by buying an iOS device, now there is an effort from Apple to “iOSify” the OS X software. This way it is easier for them to convince those people to buy a Macbook computer because “learning the OS X system is not that difficult, it is fairly similar to iOS” – they would say. (McElhearn, 2012)

So the question certainly evokes about the impact of these changes on Apple customers and fanatics. Now in the next section, I summarise the literature review and then start with the research methodology, where I will describe the main problem statement and research questions of my thesis, including this question as well.

2.4 Conclusions of the Literature Review

As a short reminder, here I give a summary of the literature review. Having revised all the most important aspects and views of perceived value, I chose Kotler - Keller’s model for the further research, which contained both the perceived benefits and costs and separated them. They are components of the perceived value and both of them have four dimensions: product, service, personnel, image benefits and price, time, energy and psychological costs.

I also made the conclusion that the connection between brand & self has almost countless interpretation in the marketing literature. In the theoretical overview I highlighted those terms which are the most typical and appropriate for the Apple focus and the topic of the Thesis. The main conclusion until this point is that each of the terms I investigated are important as they contain different point of view of the connection between the brand and the self. However, I have an assumption that some of them will be too evident for including in the quantitative research.
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Last, we can conclude that many changes are happening regarding the brand, the company’s strategy and its customers. Apple became the most valuable company of all time, it is huge now, more of a mass product manufacturer of non-computer devices, and it has better perception among relatively “older” people.

With this in mind we can step forward to setting the direction of the primary research. For the next chapter I used several marketing research references which helped me from the point of the marketing problem statement to the quantitative analysis and conclusion sections (Malhotra - Simon, 2009; Bódi - Gyulavári - Mitev - Neulinger - Simon, 2007; Szokolszky, 2004; Sajtos – Mitev, 2007).

3 Problem Statement and Research Methodology

3.1 The Marketing Problem

After careful secondary research in the literature of perceived value and its implementation on Apple, we have a rough overview on the topic and the following goal emerged: to even better understand the perceived value of the most valued company of all time and its relation to the customers. It is an interesting question as there is no other brand which can enchant and divide people as much as Apple; who likes it, loves it, who doesn’t like it, hates it, but no one can fully explain why. What are the underlying reasons of these perceived evaluations. and what are the possible consequences? For this problem to be answered, I drew up two research questions and more sub-questions:

1. Is it possible to define customer segments based on the value perceived by Apple users?
2. If yes, what type of costumer groups / segmentation can be generated?
   a. Which dimensions of perceived value give the biggest differences?
   b. What characteristics can further describe these groups?
      i. Can we find significant differences and certain patterns among the groups regarding the level of “fanatism” with the help of the brand & self concepts?
      ii. Can we find significant differences and certain patterns among the groups regarding the perception and judgement of the recent changes?

These questions and sub-questions together help us to answer the marketing problem and contribute to the understanding of the value perception of the most valuable company of all
time. In addition, the customer groups – if I manage to define and describe them – can be further examined as possible customer segments, which can be targeted with slightly different marketing strategies.

The research for the paper contained all three of the research phases. First, I conducted a secondary research, the results of which can be found in the literature part of the thesis. It gave the basis for the problem statement, as well as for the further research. The primary phase consisted of a qualitative and a quantitative part. All the methods of the research can be found in Table 4 with sample sizes, method explanations and outputs.

Table 5: Overview of the Research Conducted

<table>
<thead>
<tr>
<th>Method</th>
<th>Aim</th>
<th>Output</th>
<th>Sample size</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Secondary Research</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Literature review of</td>
<td>Get an overview about the concepts to be able to align with the</td>
<td>2.1 and 2.2 chapters</td>
<td></td>
</tr>
<tr>
<td>Perceived value and</td>
<td>research questions</td>
<td></td>
<td></td>
</tr>
<tr>
<td>brand&amp;self concepts</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>The history of Apple</td>
<td>Get a more comprehensive picture about Apple and the recent changes</td>
<td>2.1.3.1 and 2.3 chapters</td>
<td></td>
</tr>
<tr>
<td>and the recent</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>changes</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Survey draft developed</td>
<td>Identify the focus of the in-depth interviews</td>
<td>Survey draft</td>
<td></td>
</tr>
<tr>
<td><strong>Primary Research</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Qualitative Research</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>In-depth interviews</td>
<td>Collect the missing information to the survey as well as insights</td>
<td>3.3 chapter</td>
<td>n = 10</td>
</tr>
<tr>
<td></td>
<td>for Apple users own words’ formulations</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Quantitative Research</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Survey finalisation</td>
<td>Develop a survey best tailored to the research questions</td>
<td>Final survey</td>
<td></td>
</tr>
<tr>
<td>Test of the survey</td>
<td>Testing the questionnaire and adjusting it according to the</td>
<td>Adjustments</td>
<td>n = 15</td>
</tr>
<tr>
<td></td>
<td>feedbacks</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Query</td>
<td>Collect a minimum of 150 responses from Apple users</td>
<td>Database</td>
<td>n = 180</td>
</tr>
<tr>
<td>Data Analysis</td>
<td>Answer the research questions</td>
<td>3.4 chapter</td>
<td></td>
</tr>
</tbody>
</table>

Source: Own editing

3.2 The Secondary Research

I started my research with an exploratory research; the aim was to find all the relevant papers regarding the two main topics of my thesis and the results of which I described in the second chapter. After the collection, I made an overview and chose the most important concepts and models, which would have a good fit with my marketing problem, as well as with Apple. For
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this phase, I used the internet, mainly the EBSCO database, as well as Google Books and Scholar. I completed the online research with offline materials in the libraries of the Corvinus University of Budapest and the Rotterdam School of Management, Erasmus University. In the meanwhile for understanding the story of Apple, I searched on the internet for articles and history descriptions, and used two important books, The Cult of Mac and Steve Jobs: A Biography.

As the last step of the secondary research, I drew up a survey draft by using the Handbook of Marketing Research (Grover - Vriens, 2006) and the Marketing Research Handbook (Bruner – Hensel – James, 2009) for finding already validated scales for the concepts. I collected all the possible alternatives, and for the selection and finalisation I used the results of the qualitative research.

Now we will move forward to the primary research.

3.3 The Primary Research: Qualitative Part

3.3.1 Introduction of the Qualitative Research

After the secondary research, I got a rough idea about how the quantitative part of the primary research should be carried out. However, three important questions remained open, which made the qualitative phase necessary. Therefore first in-depth interviews were conducted to gather deeper insights into the problem and to address the three uncleared topics.

So the aim of the qualitative phase was to find solutions to the following three problems regarding the survey.

1. I found many scales in the two Handbooks for the concepts and besides I evaluated them by their explanatory power, I also wanted to take into consideration their fit to the language Apple customers use. As well as I assumed that not all of the concepts will be entirely relevant for the aim of my research.

2. In the Handbooks I found no scale for the perceived value and furthermore according to my own judgement about the perceived value models’ fit to Apple, I intended to find a scale for Kotler - Keller’s model or similar. I found the scale of Rajh (2012), which includes the dimensions of perceived quality, perceived cost, perceived performance risk, perceived financial risk and perceived value. In my opinion, Apple users might have problems interpreting this scale to Apple. According to my assumption, risk will not have that significant separating power for them, so I decided
to develop a scale for Kotler - Keller’s model, use both for my quantitative analysis and choose the better fit in the end of the research process.

3. Last but not least, I was curious about how they perceive the recent changes to help me form the quantitative questions about this topic.

With these in mind the guide which was developed and used for the interviews consisted of the following parts.

Table 6: The Logic of the Interview Guide

<table>
<thead>
<tr>
<th>Section</th>
<th>Questions</th>
<th>Aims</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 Apple and the Interviewee</td>
<td>Introduction, demographics, positioning of the topic, hard and soft questions about the connection of Apple and the interviewee</td>
<td>Getting to know the basics about the interviewee, introduce the topic to them and making them convenient with the interview situation</td>
</tr>
<tr>
<td>2 The Buying Process</td>
<td>Investigation of a fictional buying process of an Apple product with the help of the Purchase Decision Process framework</td>
<td>Bringing the memories of past purchases up to the surface to prepare the interviewees for the next section</td>
</tr>
<tr>
<td>3 Kotler - Keller’s Perceived Value Model</td>
<td>After explaining the dimensions of the model, asking the interviewee to think of examples in connection with the dimensions</td>
<td>Understanding the dimensions’ application to Apple by collecting as many examples as possible</td>
</tr>
<tr>
<td>4 Recent Changes</td>
<td>Asking about all the recent changes I collected during the secondary research</td>
<td>Gaining deep insights and own words from Apple users about the changes to help drawing up the survey questions</td>
</tr>
</tbody>
</table>

Source: Own editing

In this phase ten in-depth interviews were carried out with Apple users who have at least one Apple product. During the selection of the interviewees I paid attention to diversity; from a “very much Apple fanatic” to an “only iPhone user”, every kind of Apple users can be found in the sample. On the one hand, the third interviewee is a good example for the halo-effect of iPhone; he started with buying an iPhone, now he has many other Apple products covering all his electronic device needs. He said the only thing he doesn’t have is an Apple TV. The seventh interviewee is also a fanatic Apple user, but he started with a Macbook Pro seven years ago recommended by his older brother whose first product was an iBook bought ten years ago. On the other hand, there is the fourth interviewee who has only one iPhone and she doesn’t even consider buying an Apple computer and the eighth person, who has an intension
to stick to Apple in computers, but he already changed to Samsung in phones. I also tried to collect as many foreigners to the sample as I could. The Table 6 gives an overview.

Table 7: Overview of the Interviewees

<table>
<thead>
<tr>
<th>Nr</th>
<th>Occupation</th>
<th>Age</th>
<th>Gender</th>
<th>Nationality</th>
<th>Current</th>
<th>Past</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Student, Social Media Intern</td>
<td>23</td>
<td>male</td>
<td>HU</td>
<td>Macbook Air</td>
<td>iPhone 1, 4 iPad 1, 2 Macbook Pro</td>
</tr>
<tr>
<td>2</td>
<td>PHD student, Entrepreneur</td>
<td>26</td>
<td>male</td>
<td>HU</td>
<td>iPhone 4S Macbook Air iPad 2</td>
<td>iPhone 1</td>
</tr>
<tr>
<td>3</td>
<td>Graphic Designer</td>
<td>25</td>
<td>male</td>
<td>HU</td>
<td>iPhone 4S Macbook Pro iPad 2</td>
<td>iPod</td>
</tr>
<tr>
<td>4</td>
<td>Event Organiser</td>
<td>26</td>
<td>female</td>
<td>HU</td>
<td>iPod</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>Finance</td>
<td>30</td>
<td>male</td>
<td>D</td>
<td>iPod</td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>Student</td>
<td>22</td>
<td>female</td>
<td>HU</td>
<td>iPod</td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>PHD student, Researcher in Astronomy</td>
<td>25</td>
<td>male</td>
<td>HU</td>
<td>iPod Nano Macbook Air Cinema Display Magic Trackpad</td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>Student, Marketing Strategy Consultant</td>
<td>26</td>
<td>male</td>
<td>CH</td>
<td>iPod</td>
<td></td>
</tr>
<tr>
<td>9</td>
<td>Student, Accounting Intern</td>
<td>24</td>
<td>female</td>
<td>NL</td>
<td>iPod</td>
<td></td>
</tr>
<tr>
<td>10</td>
<td>Office Manager</td>
<td>26</td>
<td>female</td>
<td>HU</td>
<td>iPod 4S iPad 2</td>
<td></td>
</tr>
</tbody>
</table>

Source: Own editing

The interviews took approximately fifty minutes and were carried out face to face or through Skype. Before any interviews had been made, the prepositions in the next section were set.

3.3.2 Prepositions

I already mentioned some certain assumptions about the results of the qualitative research which I describe and complete now.
P1: I expect that the product and image will be most important ones from the benefit component, they will hold higher value.

This preposition is based on my secondary research in which I found much more advantages as in the other two components.

P2: It stems from P1 that the service and personnel benefits are secondary, especially in Hungary and Eastern Europe.

The second part of the preposition should be explained. In the USA, Apple created a whole world for their stores; they are the place, where people feel comfortable, they can try any of the products and the Geniuses help them with any kind of questions. In Europe, especially in Eastern Europe, they put less emphasis on these dimensions, so the customers feel less value attached to these dimensions.

P3: They consider the price high, but vary in the perceived cost it causes for them.

This preposition is coming from common sense; as long as the price of the products is high compared to the competitors, the Apple users will evaluate it differently according to other criteria.

P4: The other costs are interrelated.

As I couldn’t separate these cost entirely in the literature chapter, similarly the interviewees will not be able to do it as well. They are very much interrelated and have effect on each other.

P5: From the brand & self concepts involvement will be definitely evident.

I already mentioned that based on the secondary research I suggest to exclude the concept of involvement from the primary research, as it is too evident. Apple customers are generally high on involvement, because the products are more expensive and considered very close to people.

P6: They perceive the process of becoming mainstream and losing innovativeness and it will make them worry.

These processes are so advanced that it is difficult not to notice them. I also assume based on the secondary research that both of them will make the interviewees worry.
They don’t feel the process of Apple becoming a 35+ brand.

This process is more hidden, so I assume that my interviewees will not mention it by top of mind, and most of them will not know about it at all.

3.3.3 Results of the In-depth Interviews

I will apply Kotler - Keller’s model again to summarise all the results of the interviews except from two topics: the average Apple customer and the recent changes, which I will discuss later on. While describing the dimensions of perceived value, I will focus on the benefits or costs, which were added by the interviews, I will not repeat the ones which I already mentioned in the first section of the paper.

Product Benefit

First of all, regarding the products I have to mention that many of the interviewees said the build quality of them, in other words the usage of excellent materials and production techniques, which make the products durable. It helps the products to keep their value better than other brands’ products, they amortise in a slower pace.

The second interviewee emphasized the quickness of the products as an important benefit. He claimed that his Macbook Air can launch in two second, much faster compared to products with other operating systems, and this saves him on average fifteen minutes per day, hours per a month and days per a lifetime. Also he and the first interviewee mentioned that they like to use Apple products because everything is so fluid; for example there are no popup windows when you install a program, “it doesn’t interrupt the workflow”.

The third, sixth and seventh interviewees emphasized the design of the products even more than I assumed from the secondary research, they said that having products at which it is a good feeling to look during usage worth them sometimes more than what the product actually can do.

Last but not least, the third interviewee told me about his personal connection to his Apple products. He said that each of them has an own name, for example his Macbook is called “My little heart”. This gave me the idea to expand the dimensions with a Relationship dimension, since this kind of behaviour is not unique among Apple owners. The sixth interviewee told me that she calls this phenomenon a “possession experience”.

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The same interview made me think of introducing the Community dimension as well. However, it is a stronger phenomenon in the USA, but still in a more moderate form it could also be found in such a faraway, small, Eastern European country as Hungary. My foreigner interviewees didn’t mention this dimension, but they are not as much fanatics as the third interviewee. He said that he has some friend similarly fanatic about Apple and also if he spots an Apple product, he feels the sense of belonging. This was also mentioned by the ninth interviewee.

I was interested in the programmability of Apple products as some counterarguments say that Apple’s software has closed source code which makes programming really difficult. This was halfly answered by the seventh interviewee, who said that the OS X software is now based on a Unix system which is similar to Linux, so basic programming is not difficult any more. However, I do not have insights about the programming on iOS since this question was not really in the focus of the analysis.

Service Benefit

The service seems to consist of four parts; (1) the service completing the products, for example the iCloud or the App Store, the repair service (2) with and (3) without the warranty and (4) the services at the stores. Some of the interviewees were outstandingly satisfied with the service (1), some of them were neutral. The second interviewee claimed that the whole ecosystem they created gives him high value. On the one hand, with warranty (2) the service is good, although they don’t come to the house but they solve every kind of problem and the accessories (e.g. chargers) are also insured. On the other hand, Apple gives only one year warranty and after you have to pay for the repair, which is incredibly expensive. Regarding the stores (4) four different groups emerged; the first group (fifth, sixth, tenth interviewees) is okay with the stores because they have never been to stores in the USA, the people in the second group (third, seventh interviewees) have been there and considers the stores worse than the ones in the USA, similarly to the third one (first, second interviewees) but they attach value to the European stores’ effort to be more and more similar to the stores in the USA. The fourth group contains the indifferent people (fourth, eighth, ninth interviewees).

Personnel Benefit

Regarding the personnel, it is a difficult question since every country has different strategy and it is very much affected by the culture of the country. However, it seems that the Apple
Premium Resellers, which are more dominant in Europe, try to be more similar to the original Apple stores in the USA, and this is also true for their personnel. But the Geniuses in the USA still give more benefit to the customers than the normal personnel in the stores of Europe, at least this is the opinion of my interviewees. The third interviewee even more emphasized the differences between the British and the Hungarian personnel; he claimed that in the United Kingdom they are more similar to the ones in the USA, but in Hungary the APRs don’t put enough effort to select and train their personnel to “smile even when they have a bad day”.

**Image Benefit**

My secondary research mainly covered the benefits of this dimension so there are only two outcomes which should be mentioned. First, Apple customers aren’t fully able to separate the image of Apple from the benefits of the products, at least according to my interviews. Most of them associated from this dimension to the product dimension and it took a longer process and some examples to make them understand this dimension. This clearly showed me how invisibly the brand was able to sneak into their minds and this is also a warning signal for the quantitative phase.

Second, Steve Jobs was mentioned here by the third interviewee. He really believes that he was the wizard of Apple and “he could introduce the products the way which made the people immediately want them”. According to the interviewee, for at least two-three years after his death, Steve Jobs will still determine the path of Apple, and he is really afraid what will be afterwards.

**Price Cost**

Most of the interviewees’ perception of the price of the products converged to acceptable, but some really found it negative. Surprisingly the third interviewee, who has the most Apple products in my sample, complained about the price, especially the European one compared to the American. The underlying reason was that he would love to buy more Apple products, but even his pocket doesn’t let it. For the others who have less Apple products and who are less fanatic, it can be easier to accept the price as a barrier.

The first, second and seventh interviewees complained about the outstandingly high price of the parts of the products if they break or have to be replaced after the warranty period (e.g.
battery, charger, keypad, etc.). As well as they don’t feel the expensive warranty period extension to be fair.

**Time and Energy Costs**

These two dimensions were more difficult to interpret regarding Apple, as most of the interviewees said that having Apple products don’t cost but save them time and energy by the easier usability and better-built system. There were only two complaints.

The fourth and fifth interviewees said that the iTunes is really slow and it always wants to synchronize everything which takes unnecessarily long time. As well as the seventh interviewee mentioned that for him it means energy cost if he runs into a new problem, he wants to do something with his MacBook but he doesn’t know how it can be done, then it costs energy to walk around the problem and try to solve it.

**Psychological Cost**

The first and the sixth interviewees have to acknowledge significant level of psychological cost due to having Apple products. The first one said that now he feels as he has a branding iron on him and we can see what he means by this from how he valuates an average Apple customer; as a snob, not competent person. He also mentioned that the price of the products feels not fair for him; he said he knows that he has to pay almost only for the brand.

The sixth interviewee is a relatively new Apple user and she told me that most of the times when she cannot do something for the first time, e.g. print screen or cut on her new MacBook Air, she immediately receives the negative comments from her friends; “Apple is a shit, it cannot even Print Screen or Cut something”. She is a very tolerant person who accepts the opinion of others, so she doesn’t really understand why they attack her.

Again the sixth interviewee put Steve Jobs in this dimension as for her the rigidness of Steve Jobs was really negative, she wasn’t able to identify with him. She prefers the new CEO, but she also admits that he has not proven himself so far in the sense of innovation and making the company move forward.

On the contrary, the third interviewee is a perfect example for Apple fanaticism; he mentioned the frustration of waiting for his future iPhone 5, which is currently out of stock. For him it is
not an ideal situation not to have the newest model from the most important Apple products, also “he wants to spend money and he cannot, which is ridiculous in today’s world”.

The eighth, Swiss interviewee was the most disappointed about the growing number of Apple users followed by the fifth one, the German. They said that it is more and more difficult to identify with the brand, because nowadays it is getting more “mass and oldish”. However, the fifth interviewee still has a positive image of an average Apple customer, while the eighth one has now rather negative, which you can see in the table of the next section.

**Image of an Apple Customer**

I had a question about their opinion of an average Apple customer, which is also an indicator of how they view themselves as an Apple customer if we consider this as a projective technique. The answers are summarised in Table 7.

Table 8: The Interviewees’ Opinion about an Average Apple Customer

<table>
<thead>
<tr>
<th>Nr</th>
<th>Opinion about an average Apple customer</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Snob, not choosey, not exactly competent with these products, aesthetics &amp; quality &amp; customer experience are the most important.</td>
</tr>
<tr>
<td>2</td>
<td>He said more than one stereotypes: on the one hand high income, reasonable people, but on the other hand people buy it for the status, to show off, even though they cannot afford it.</td>
</tr>
<tr>
<td>3</td>
<td>Everyone. He described an average Apple customer as a simple person, who gets happy when a Genius solves her real or latent problem with an Apple product, however, she won’t use even half of what these devices can do.</td>
</tr>
<tr>
<td>4</td>
<td>Buys Apple products for entertainment, not for work. Well-off.</td>
</tr>
<tr>
<td>5</td>
<td>Sophisticated, wants to stand out from a crowd, has high expectations.</td>
</tr>
<tr>
<td>6</td>
<td>Demanding, wants beautiful products.</td>
</tr>
<tr>
<td>7</td>
<td>More “grown up” world-oriented, demanding, has sense of beauty, innovation-seeker.</td>
</tr>
<tr>
<td>8</td>
<td>By now, pretty normal, average person.</td>
</tr>
<tr>
<td>9</td>
<td>A smart person, who wants to use his/her time more effectively, not for maintenance and getting the computer repaired all the time. Social, has a sense of beauty.</td>
</tr>
<tr>
<td>10</td>
<td>Demanding and has a sense of style/beauty.</td>
</tr>
</tbody>
</table>

Source: Own editing

**The Recent Changes**

The last section of the interviews was about the recent changes regarding Apple. First, I stated an open question and wanted to know the top of mind answers. Next, I addressed every change I identified in the secondary research.
Naturally, almost every interviewee mentioned that the pace of innovation is slowing down. However, some of them seemed more patient by saying that they don’t expect Apple to invent something life-changing every time, so they give Apple some more years to show that they haven’t lost their incredible innovativeness. The others are more sceptical, and they are already thinking about switching to other brands. In this small sample, a pattern seemed to evolve that people are more attached to their Apple computers than to their phones.

The other topic which was mentioned top of mind many times is the donation of Tim Cook to the victims of the Sandy hurricane. Apple has never donated before (or we don’t really know about it) because Steve Jobs said that they are trying to save the world on a different path: by increasing the standard of living with their products. However, there were many interpretations, some of the interviewees liked it, the other half didn’t.

Some of the interviewees complained about the process of Apple becoming a mass brand, especially with the iPhone. According to the fifth and eighth interviewees, nowadays if you have only an iPhone, you don’t yet belong to the community of Apple users automatically, and this phenomenon has a wrong effect on the brand’s perception as well. The fifth interviewee said that now having Apple products is more like owning a BMW, not a Ferrari.

I asked about the growing positive brand perception among the 35+, and all of them agreed that this is because of the simplicity of the products, that it is easy to learn to use them as well as simply because they have the money. However, some of them, most importantly the eighth interviewee, the Swiss said that for him it makes the brand much less valuable. He told me that some years ago he had to explain how Apple products work to his parents, now he has to explain it to his grandparents, and for him this just feels weird. Also when he went to a store in the USA, cca. 60% of the customers had grey hair. Inversely, the seventh interviewee said that this is normal, he sees the products as they are more adult-oriented, because adults can understand how valuable the products are, not the young who care only about which game to play next.

3.3.4 Preposition Evaluation

\( P1: \text{I expect that the product and image will be most important ones from the benefit component, they will hold higher value.} \)

This preposition was half supported with a little adjustment. First, the product dimension is even more important than the image dimension. The image was difficult to understand for the
interviewees; still with help they could answer this question. It seems that people are very different in this sense. Some of the interviewees feel that it is getting harder and harder to identify with the brand of Apple, others said that for them this dimension is not really important, they focus more on the product and only the third interviewee said that he still loves Apple and its whole image.

P2: It stems from P1 that the service and personnel benefits are secondary, especially in Hungary and Eastern Europe.

This preposition was fully supported. However, the stores and the service in the USA are perceived much better than in Europe, yet there are big differences inside Europe as well.

P3: They consider the price high, but vary in the perceived cost it causes for them.

This preposition was surprisingly not fully supported, because not everyone considered the price of the products high. This was not because they were wealthy, but because they attached such a high value to the products that it influenced their perception of price so strong, which had an effect back to their “objective” consideration of price. For example the second interviewee said that the price is more or less equal to the benefits he receives with the products, so he does not consider the price high.

P4: The other costs are interrelated.

This preposition was also half supported as the time and energy cost was almost negligible in my interviews.

P5: From the brand & self concepts involvement will be definitely evident.

This preposition was fully supported; all of the interviewees were very involved in the purchase of Apple products.

P6: They perceive the process of becoming mainstream and losing innovativeness and it will make them worry.

This preposition was almost fully supported. They do feel these changes, and most of them do worry about them. However, there were a minority of interviewees who said that they do not expect Apple to always introduce life-changing products, they believe that in some years Apple will surprise us again.
P7: *They don’t feel the process of Apple becoming a 35+ brand.*

This preposition was not supported, mainly because of the Western European interviewees. They said that many older people are into Apple recently as I already described.

The prepositions almost summarize the most important findings of the qualitative research, there is only one point which in addition should be added. Two more dimensions were suggested by the interviews to be added to the model of Kotler - Keller; these are community and relationship. These two dimensions contain very important value possibilities, which should not be ignored. With the results of the qualitative research in mind we can move forward to the quantitative research.

3.4 The Primary Research: Quantitative Part

In the quantitative research phase, first I will summarise the process of the survey finalisation and my hypotheses, then discuss the data gathering and analysis and in the end highlight the main results.

3.4.1 The Questionnaire Development Process

After the secondary research, I had the draft version of the survey. In Table 8, I illustrate how it was developed to the final version regarding the scales.

<table>
<thead>
<tr>
<th>Concept</th>
<th>Possible scales collected</th>
<th>Decision</th>
</tr>
</thead>
<tbody>
<tr>
<td>Perceived Value I.</td>
<td>Rajh, S.(2012)</td>
<td>Included, considered as a moderate fit with Apple but validated.</td>
</tr>
<tr>
<td>Perceived Value II.</td>
<td>Own scale based on Kotler - Keller (2008)</td>
<td>Included, developed based on the in-depth interviews.</td>
</tr>
<tr>
<td>Involvement</td>
<td>Zaichkowsky, J. (1985)</td>
<td>Rejected, based on the result of the secondary and qualitative research.</td>
</tr>
<tr>
<td></td>
<td>Jain, K. (1990)</td>
<td></td>
</tr>
<tr>
<td>Loyalty</td>
<td>Harris, L. (2004)</td>
<td>Zeithaml’s scale included, it is much shorter, more manageable and interpretable to Apple.</td>
</tr>
<tr>
<td></td>
<td>Scale based on Zeithaml, V. (1996)</td>
<td></td>
</tr>
<tr>
<td>Evangelism</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Attachment</td>
<td>Park, C. (2010)</td>
<td>The scale is too long and a bit redundant with the engagement scale, so I decided to drop this concept.</td>
</tr>
</tbody>
</table>

According to these evaluations as well as other results and considerations from the secondary and qualitative research, the survey was finalised. Prior to the finalization, the questionnaire was tested on 15 respondents. After the necessary changes the survey reached its current form, the essence of which is summarised in Table 9.

Table 10: Overview of the Final Questionnaire

<table>
<thead>
<tr>
<th>Nr</th>
<th>Name of question group</th>
<th>Essence of the questions</th>
</tr>
</thead>
<tbody>
<tr>
<td>0</td>
<td>Demographics and filtering</td>
<td>Gender, age, location, nationality</td>
</tr>
<tr>
<td>1</td>
<td>Demographics and filtering</td>
<td>Apple ownership</td>
</tr>
<tr>
<td>2</td>
<td>Demographics and filtering</td>
<td>Studies or Occupation</td>
</tr>
<tr>
<td>3</td>
<td>Details of Apple ownership</td>
<td>Starting year</td>
</tr>
<tr>
<td>4</td>
<td>Details of Apple ownership</td>
<td>Type of products owned</td>
</tr>
<tr>
<td>5</td>
<td>Loyalty (self-evaluation)</td>
<td>Loyalty in general</td>
</tr>
<tr>
<td>6</td>
<td>Loyalty (self-evaluation)</td>
<td>Loyalty towards Apple</td>
</tr>
<tr>
<td>8</td>
<td>Perceived Value I.</td>
<td>Scale of Rajh (2012): Part II.</td>
</tr>
<tr>
<td>9</td>
<td>Perceived Value II.</td>
<td>Scale based on Kotler - Keller (2008): Benefit part</td>
</tr>
<tr>
<td>10</td>
<td>Perceived Value II.</td>
<td>Scale based on Kotler - Keller (2008): Cost part</td>
</tr>
<tr>
<td>11</td>
<td>Perceived Value II.</td>
<td>Scale based on Kotler - Keller (2008): Importance evaluation</td>
</tr>
<tr>
<td>12</td>
<td>Perceived Value (self-evaluation)</td>
<td>Overall perceived value evaluation of Apple</td>
</tr>
<tr>
<td>13</td>
<td>Commitment</td>
<td>Scale of Garbarino (1999)</td>
</tr>
<tr>
<td>14</td>
<td>Recent changes: Mainstream</td>
<td>Opinion about Apple being mainstream</td>
</tr>
<tr>
<td>15</td>
<td>Recent changes: Innovation</td>
<td>Opinion about the slowing innovation</td>
</tr>
<tr>
<td>16</td>
<td>Engagement</td>
<td>Scale of Sprott (2009)</td>
</tr>
<tr>
<td>17</td>
<td>Recent changes: iOSification</td>
<td>Opinion about the product focus shift</td>
</tr>
<tr>
<td>18</td>
<td>Loyalty + Evangelism</td>
<td>Scale of Zeithaml (1996)</td>
</tr>
<tr>
<td>19</td>
<td>Recent changes: Leader position</td>
<td>Opinion about the future of Apple</td>
</tr>
</tbody>
</table>

I have to note that the question about the process of Apple becoming more positively perceived among the 35+ was found to be suggestive, I could not form it to be objective. Furthermore, the interviews showed a strong difference between Western Europe and Hungary, which let me assume a considerable link with the nationality. These two concerns made the question problematic and resulted in the exclusion from the final questionnaire.

3.4.2  Hypotheses

My hypotheses before the research covered both the initial research questions and all of the questions used in the survey. They are the following.

3.4.2.1  Hypotheses Concerning the Scale Based on Kotler - Keller (2008)

1.a  The Price dimension will have the strongest separating power.
The results of the qualitative research let me conclude this since my interviewees had the most
diverse evaluations about the negative value of this dimension.

1.b ~ The Image dimension will also have strong separating power after Price.

This statement is based on the fact that Apple is becoming less innovative and more
mainstream, and according to the qualitative interviews this clearly forms the opinions and
judgements about Apple’s image. This process is different for each and every person, so this
will possibly divide the sample.

1.c ~ The Psychological Cost dimension will also have strong separating power after Price.

This statement is coming from the history of Apple and the fact that the brand always divided
the people. We can clearly conclude this if we think of the compatibility problems or the
David vs. Goliath rivalry and the counterculture image or its recent replacement with a more
mainstream one. The interviews confirmed that many types of psychological cost exist
coming from these characteristics of Apple. However some interviewees claimed that they
don’t really care about them.

3.4.2.2 Hypotheses Concerning the Scale of Rajh (2012)

2 ~ The Perceived Quality dimension will have the weakest separating power.

In the case of Rajh’s scale, it is difficult to make an assumption about the strongest separating
dimension. However, on the contrary the interviews suggest that the perceived quality is
commonly considered high, so this dimension will not separate the sample that much.

3.4.2.3 Hypotheses Concerning the Brand & Self Concepts

3.a ~ The sequence of the average rate of the brand & self concepts will follow the sequence
drawn up in the literature review; loyalty will have the highest average score, then
evangelism, commitment, and engagement will have the lowest average score.

This assumption is based on the literature review since loyalty is mainly simply considered as
a repurchase intention (Tellis, 1988), evangelism is considered as a next level (Huba, 2012),
in the commitment concept a more explicitly felt relationship appears (Dwyer et al., 1987)
and finally the embeddedness and depth of the relationship is measured by the engagement
concept (Gambetti et al., 2012). This assumes a “leaking pipe” effect.
Two further hypotheses (3.b and 3.c) can be concluded from this reasoning.

3.b ~ The loyalty concept will correlate more with the tangible dimensions (K: product & price, R: quality & cost).

3.c ~ The engagement concept will correlate more with the intangible dimensions (K: image & relationship, R: value).

3.d ~ The respondents having only iPod, iPhone or iPad products will have significantly lower average scores for the brand & self concepts than the respondents with at least one computer or laptop product.

Until now, Apple had a considerably loyal and engaged customer base, which is now widened but at the same time possibly diluted as well. I built this assumption on the results of the interviews.

3.4.2.4 Hypotheses Concerning the Recent Changes

4.a ~ The question about Apple becoming less innovative will divide the people the most as far as the questions regarding the recent changes are concerned.

4.b ~ The question about iOSification will divide the people the least as far as the questions regarding the recent changes are concerned.

4.a and 4.b hypotheses are based on the results of the qualitative research since the innovativeness was mentioned many times, but there were many different opinions as well. Regarding iOSification the interviewees were mainly indifferent, it is a more important topic for programmers and for Apple itself if the 3.d hypothesis is supported.

3.4.3 The Query and Sample

The quantitative research phase was conducted between 20-25 November 2012, fully online through the Kerdoivem.hu online survey page. The questionnaire could be filled out only once from an IP-address, the questions appeared one-by-one on a new page and filling out every question was mandatory.

For the aim of the Thesis, I only wanted to ask people who are currently Apple device owners, which was a very strong filter criteria as the usage share of the OS X software is around 8 %, for the iOS software it is approximately 9 % (Wikipedia, 2012f). Although, the penetration of iPod, iPhone and iPad is nicely growing, from the previous numbers I had the assumption that
the query will be difficult. I had to reach, on the one hand, the Apple computer owners; I expected them to have a better than average response rate because of the very high level of involvement. As well as I had to find, on the other hand, members of the bigger group of iPod, iPhone and iPad owners, who were still expected to have slightly above average response rate. I assumed that I will have the smallest waste coverage, if I target highly educated people with assumingly above average income, so I used the network of the CEMS Global Alliance of Management Education Program. I sent emails to all of the students from the last four years from the European schools, which means approximately 3000 people reached, and also posted the survey on the CEMS Facebook page which can add around 1000 people to the sampling frame. In the end, I collected 186 responses, which means approximately a 4.5 % response rate from the whole group asked.

3.4.4 Data Analysis

3.4.4.1 General Overview of the Sample

First, I cleaned the sample, deleted the not accurate respondents, so 180 respondents remained in the final sample. 53.3 % is female and 46.7 % is male which is an appropriate distribution for the analysis. According to age, the youngest is 18 years old, the oldest is 40, but the 72.8 % of the sample is between 21-26. Regarding nationalities by regions, slightly more than half is from Eastern Europe, but the other regions also have considerable representation.

There is one person in the sample who got his first Apple product in 1990, but apart from him all of the respondents got it after the Millennium and 77.8% after 2007. The Table 10 shows
the Apple product ownership of the respondents. The distribution is satisfying since not only iPhone owners filled out the survey, but there are many Apple computer or laptop owners as well.

<table>
<thead>
<tr>
<th>Currently owned</th>
<th>Never or in the past owned</th>
</tr>
</thead>
<tbody>
<tr>
<td>iPod</td>
<td>50.6%</td>
</tr>
<tr>
<td></td>
<td>49.6%</td>
</tr>
<tr>
<td>iPhone</td>
<td>55%</td>
</tr>
<tr>
<td></td>
<td>45%</td>
</tr>
<tr>
<td>iPad</td>
<td>30.6%</td>
</tr>
<tr>
<td></td>
<td>69.4%</td>
</tr>
<tr>
<td>MacBook</td>
<td>12.2%</td>
</tr>
<tr>
<td></td>
<td>87.8%</td>
</tr>
<tr>
<td>MacBook Pro</td>
<td>25.6%</td>
</tr>
<tr>
<td></td>
<td>74.4%</td>
</tr>
<tr>
<td>MacBook Air</td>
<td>13.9%</td>
</tr>
<tr>
<td></td>
<td>86.1%</td>
</tr>
<tr>
<td>iMac</td>
<td>6.1%</td>
</tr>
<tr>
<td></td>
<td>93.9%</td>
</tr>
<tr>
<td>Mac Mini</td>
<td>2.2%</td>
</tr>
<tr>
<td></td>
<td>97.8%</td>
</tr>
<tr>
<td>Apple TV</td>
<td>2.8%</td>
</tr>
<tr>
<td></td>
<td>97.2%</td>
</tr>
</tbody>
</table>

Source: Own research

In the next chapter I will discuss the process of cluster development first for the scale based on Kotler – Keller (2008), second for the scale of Rajh (2012). I used the book of Sajtos – Mitev (2007) for supporting the analyses in SPSS.

3.4.4.2 Cluster Development for the Scale based on Kotler - Keller

For starting, I had six benefit components (product, service, personnel, image, community and relationship) measured on a 0 → +7 scale, and four cost components (price, time, energy and psychological) measured on a -7 → 0 scale. For the clusters, first I had to reduce the numbers of variables and make sure that they don’t correlate with one another. For this, I used factor analysis. All the variables were recoded into 1 → 8 scales, no other standardisation was needed. As well as all of the following conditions of the factor analysis were met:

- more than 50% of the values of the linear bivariate correlation matrix is significant,
- no variable is dependent,
- all of them are metric variables,
- the sample is considered homogenous as it contains only Apple users from mainly the 21-26 age group,
- the case - variable rate is 18, which is above 5.

From the ten dimensions, maximum three hurt the condition of homoscedasticity according to the Levene-test, which is negligible. The condition of normality is not met for any of the variables, but all of the statistics methods used in this analysis are robust, so this will not be a problem. After checking all the condition criteria, I tried to run a factor analysis to identify factors based on Eigenvalue (greater than 1). The extraction method was Principal
components, because the total variances of the variables are supposed to come from the common variance as they are part of the same theoretical construct. The rotation method is Varimax with Kaiser Normalisation, because this way the standard deviation of the variables within groups can be minimised. This resulted in a two-factor solution, which was verified by the Anti-Image Covariance Matrix, the MSA values were between 0.6 and 0.9, Bartlett-test was significant and the value of KMO was 0.758. However, I already noticed that the Product and Price variables are too strong and have low correlation with the factors.

So I tried the 3, 4 and 5 factor solutions as well. The Kaiser-criterion would recommend 2-3 factors since the Eigenvalue for the third factor is 0.985. The Cumulative Variance recommends more than 3 factors, because there it reaches the 60% explained variance, the Scree Plot also brakes at 3 factors. In the three-factor solution the Price variable is torn out and creates a new factor by itself and the correlation of the Product variable is too low, so this solution doesn’t seem the best. The four-factor solution gives a result which is difficult to interpret and has many variables with almost the same double correlation to different factors. The Cost variables create two strong factors, but the Benefit variables indicate the relevance of the five-factor solution. Its linear correlation coefficient numbers can be seen in Table 11.

<table>
<thead>
<tr>
<th>Rotated Component Matrix</th>
<th>Factor 1</th>
<th>Factor 2</th>
<th>Factor 3</th>
<th>Factor 4</th>
<th>Factor 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Associated value (1 - no value, 8 - high value): Relationship</td>
<td>0.824</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Associated value (1 - no value, 8 - high value): Community</td>
<td></td>
<td>0.801</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Associated value (1 - no value, 8 - high value): Image</td>
<td></td>
<td></td>
<td>0.780</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Associated cost (1 - no cost, 8 - high cost): Energy</td>
<td></td>
<td></td>
<td></td>
<td>0.914</td>
<td></td>
</tr>
<tr>
<td>Associated cost (1 - no cost, 8 - high cost): Time</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.877</td>
</tr>
<tr>
<td>Associated cost (1 - no cost, 8 - high cost): Psychological</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.806</td>
</tr>
<tr>
<td>Associated value (1 - no value, 8 - high value): Services</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.862</td>
</tr>
<tr>
<td>Associated value (1 - no value, 8 - high value): Personnel</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.823</td>
</tr>
<tr>
<td>Associated value (1 - no value, 8 - high value): Products</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.931</td>
</tr>
<tr>
<td>Associated cost (1 - no cost, 8 - high cost): Price</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.983</td>
</tr>
</tbody>
</table>

Source: Own research

As the “Associated value (1 - no value, 8 - high value): Products” and “Associated cost (1 - no cost, 8 - high cost): Price” variables are the only variables to correlate with the forth and the fifth factor, I decided to take these variables out of the factor analysis and create 3 factors of the other variables. This way, three factors and two original variables were used in the multi-
variable analyses. Before accepting the final factor solution, I checked the Cronbach $\alpha$ figures for validation reasons. It was clear that no adjustment should be made to the final three-factor solution.


<table>
<thead>
<tr>
<th>Nr</th>
<th>Factor Name</th>
<th>Variables contained</th>
<th>Cronbach $\alpha$</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Branding Connected Benefits (BCB)</td>
<td>Relationship, Community, Image</td>
<td>0.821</td>
</tr>
<tr>
<td>2</td>
<td>Other Connected Costs (OCC)</td>
<td>Energy, Time, Psychological</td>
<td>0.837</td>
</tr>
<tr>
<td>3</td>
<td>Service Connected Benefits (SCB)</td>
<td>Service, Personnel</td>
<td>0.816</td>
</tr>
<tr>
<td>4</td>
<td>Product Connected Benefits (PCB)</td>
<td>Product</td>
<td>N/A</td>
</tr>
<tr>
<td>5</td>
<td>Price Connected Costs (PCC)</td>
<td>Price</td>
<td>N/A</td>
</tr>
</tbody>
</table>

Source: Own research

This solution is acceptable regarding not all but many of the condition criteria and easily interpretable so I worked with these factors.

The next step was to make the necessary preparations for the cluster analysis. I identified 3 outliers to be excluded so 177 respondents remained for the further analysis. The scales are the same so this will not harm the analysis; standardisation was not needed. Last but not least, there shouldn’t be any correlation between the variables, however between the Branding Connected Benefits factor and the Product Connected Benefits variable there is weak linear correlation ($r=0.362$, sig.=0.000), so the condition of multicollinearity was not met. Despite this, I considered the variables and factors appropriate for the analysis, as there was only one coefficient, which broke the condition.

I examined the conditions of the cluster analysis methods; with bigger datasets (more than 600 cases) k-means clustering gives good results, while with smaller datasets (around 200 cases) hierarchical clustering is more adequate (Abbas, 2008), so I used the second method.

For finding the right interval for the possible cluster numbers, I examined many criteria. My assumption was that the cluster number will be between four and seven. Next I checked the Akaike Information Criterion and the Bayesian Information Criterion with the two-step clustering method, which both indicated a four-cluster solution. For the thumb criterion, the function breaks at two, five and ten clusters.
On Figure 13, the Dendrogram can be found which shows a cluster number between five and ten. According to the number of cases in the clusters, a solution between five and eight can be acceptable, because below this the clusters are not detailed enough, above this there is one which is too small (8 cases) for further analysis.

The standard deviation and interpretability of the clusters indicated a solution between six and eight. The Table 13 shows that from six to seven clusters there are more significant improvement; the two new clusters are very much different regarding the Branding Connected Benefits and the Price Connected Costs. From seven to eight clusters the two new clusters differ considerably only in Price Connected Costs and it results in some arguably small clusters. This means that the seven-cluster solution gives the best result.
The Perceived Value of Apple

Anett Ecsédi
Corvinus University of Budapest, 4 December 2012

Table 14: Different Cluster Solutions for Choosing, Kotler – Keller (2008)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Mean</td>
<td>Mean</td>
<td>Mean</td>
<td>Mean</td>
<td>Standard Deviation</td>
<td>Standard Deviation</td>
<td>Mean</td>
<td>Mean</td>
<td>Mean</td>
<td>Standard Deviation</td>
<td>Standard Deviation</td>
</tr>
<tr>
<td>1</td>
<td>.443</td>
<td>.135</td>
<td>1.122</td>
<td>-.888</td>
<td>-.390</td>
<td>.703</td>
<td>.942</td>
<td>.463</td>
<td>.664</td>
<td>.728</td>
</tr>
<tr>
<td>2</td>
<td>1.035</td>
<td>.481</td>
<td>.290</td>
<td>1.127</td>
<td>-.488</td>
<td>.230</td>
<td>.619</td>
<td>.527</td>
<td>.605</td>
<td>.517</td>
</tr>
<tr>
<td>3</td>
<td>-1.248</td>
<td>-.608</td>
<td>-.1458</td>
<td>.972</td>
<td>.211</td>
<td>.695</td>
<td>.749</td>
<td>.646</td>
<td>.675</td>
<td>.543</td>
</tr>
<tr>
<td>4</td>
<td>.013</td>
<td>.455</td>
<td>.234</td>
<td>.450</td>
<td>1.512</td>
<td>.966</td>
<td>1.014</td>
<td>.912</td>
<td>1.027</td>
<td>.753</td>
</tr>
<tr>
<td>5</td>
<td>.077</td>
<td>.978</td>
<td>-.489</td>
<td>-.218</td>
<td>-.623</td>
<td>.640</td>
<td>.514</td>
<td>.588</td>
<td>.598</td>
<td>.313</td>
</tr>
<tr>
<td>6</td>
<td>.138</td>
<td>-.1330</td>
<td>.365</td>
<td>.785</td>
<td>-.371</td>
<td>.885</td>
<td>.448</td>
<td>.850</td>
<td>.489</td>
<td>.605</td>
</tr>
<tr>
<td>7</td>
<td>-.1309</td>
<td>-.381</td>
<td>-.454</td>
<td>-.565</td>
<td>.274</td>
<td>.428</td>
<td>.442</td>
<td>.450</td>
<td>.578</td>
<td>.839</td>
</tr>
<tr>
<td>8</td>
<td>.462</td>
<td>-.687</td>
<td>-.686</td>
<td>-.741</td>
<td>-.559</td>
<td>.556</td>
<td>.561</td>
<td>.670</td>
<td>.426</td>
<td>.370</td>
</tr>
</tbody>
</table>

Source: Own research

For the validation of this solution I used the discriminant analysis. The conditions of this method overlap very much with the methods described above, so we can state that only the condition of normality, homoscedasticity and multicollinearity are not met. The “enter” method was used to receive a final model which contains all of the factors and variables. 93.2% of original grouped cases and 88.1% of cross-validated grouped cases was correctly classified, therefore the seven-factor solution is accepted. Table 14 shows the final cross-tabulation of the cluster analysis and the originator factors and variables.
Table 15: The Final Cluster Solution for the Kotler – Keller (2008) Scale

<table>
<thead>
<tr>
<th>Cluster</th>
<th>Product Connected Benefits</th>
<th>Service Connected Benefits</th>
<th>Branding Connected Benefits</th>
<th>Price Connected Costs</th>
<th>Other Connected Costs</th>
<th>Name</th>
<th>Nr. of cases</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.443</td>
<td>.135</td>
<td>1.122</td>
<td>-.888</td>
<td>-.390</td>
<td>The Fanatic</td>
<td>35</td>
</tr>
<tr>
<td>2</td>
<td>1.035</td>
<td>.481</td>
<td>.290</td>
<td>1.127</td>
<td>-.488</td>
<td>Pricetag Haters</td>
<td>17</td>
</tr>
<tr>
<td>3</td>
<td>-.279</td>
<td>-.492</td>
<td>-.941</td>
<td>.181</td>
<td>.243</td>
<td>Pear-to-bes</td>
<td>35</td>
</tr>
<tr>
<td>4</td>
<td>.013</td>
<td>.455</td>
<td>.234</td>
<td>.450</td>
<td>1.512</td>
<td>The CoStressed</td>
<td>27</td>
</tr>
<tr>
<td>5</td>
<td>.077</td>
<td>.978</td>
<td>-.489</td>
<td>-.218</td>
<td>-.623</td>
<td>The Down to Earth</td>
<td>28</td>
</tr>
<tr>
<td>6</td>
<td>.138</td>
<td>-1.330</td>
<td>.365</td>
<td>.785</td>
<td>-.371</td>
<td>The Service Critic</td>
<td>17</td>
</tr>
<tr>
<td>7</td>
<td>.462</td>
<td>-.687</td>
<td>-.686</td>
<td>-.741</td>
<td>-.559</td>
<td>The Product Conscious</td>
<td>18</td>
</tr>
</tbody>
</table>

Source: Own research

The first cluster is the only one which is above average in the benefit dimensions, so they attach higher value to the benefit components than the average of the sample and below average in the cost dimensions, they consider the costs much less negative than the average. This makes them the most positive group of all, especially in the branding related benefits, so they are The Fanatic.

The second cluster differs from the first one mainly regarding the product, branding and price components. They are the most positive about the products of Apple from all of the clusters, but also they are the most negative regarding the price. Overall they are a positive group compared to the average so because of the solely negative price component, I gave them the name of Pricetag Haters.

The third cluster is totally the opposite. They are the most negative group, they are very much negative in the product and branding dimensions, and also they evaluate the cost slightly worse than average. Therefore this group contains the possible dissenters, and as we are talking about Apple, this group can be called Pear-to-bes.

The fourth cluster is slightly more positive about the benefits than average, but they consider the costs, especially the other costs very high. Since the other costs mainly result in stress, this group is named The CoStressed.

The fifth cluster is determined by the service benefit perception, which is much above average, the branding benefit perception, which is below average and the costs which are below average for them meaning that they don’t consider them too negative. Considering their below average attitude to the branding related benefits, I named them The Down to Earth.
The sixth cluster attaches very low value to the service compared to the average, and it considers the price as high cost, this gives them the name of The Service Critic.

Finally, the seventh cluster considers the product positive, the other benefits negative compared to average, and they attach below average costs to Apple. This means that they are The Product Conscious.

To better understand what the average means for the factors, I created an average score for every factor (by calculating the means of the variables that each factor contains) and compared them with the clusters, the Table 15 shows the results. Because these results come from the original statement variables they differ slightly from the result of the cluster analysis.

Table 16: Average Scores for the Clusters of Kotler – Keller (2008)

<table>
<thead>
<tr>
<th>Cluster</th>
<th>PCB Average Score</th>
<th>SCB Average Score</th>
<th>BCB Average Score</th>
<th>PCC Average Score</th>
<th>OCC Average Score</th>
<th>Name</th>
<th>Nr. of cases</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>6,03</td>
<td>4,57</td>
<td>6,12</td>
<td>-1,94</td>
<td>-1,01</td>
<td>The Fanatic</td>
<td>35</td>
</tr>
<tr>
<td>2</td>
<td>6,88</td>
<td>4,41</td>
<td>4,94</td>
<td>-5,76</td>
<td>-0,82</td>
<td>Pricetag Haters</td>
<td>17</td>
</tr>
<tr>
<td>3</td>
<td>3,60</td>
<td>1,83</td>
<td>2,04</td>
<td>-3,97</td>
<td>-1,92</td>
<td>Pear-to-bes</td>
<td>35</td>
</tr>
<tr>
<td>4</td>
<td>5,41</td>
<td>4,43</td>
<td>4,89</td>
<td>-4,48</td>
<td>-4,10</td>
<td>The CoStressed</td>
<td>27</td>
</tr>
<tr>
<td>5</td>
<td>5,50</td>
<td>5,00</td>
<td>3,56</td>
<td>-3,21</td>
<td>-5,55</td>
<td>The Down to Earth</td>
<td>28</td>
</tr>
<tr>
<td>6</td>
<td>5,59</td>
<td>1,12</td>
<td>3,86</td>
<td>-5,12</td>
<td>-1,00</td>
<td>The Service Critic</td>
<td>17</td>
</tr>
<tr>
<td>7</td>
<td>6,11</td>
<td>1,61</td>
<td>2,30</td>
<td>-2,22</td>
<td>-5,9</td>
<td>The Product Conscious</td>
<td>18</td>
</tr>
<tr>
<td>Total</td>
<td>5,42</td>
<td>3,43</td>
<td>4,00</td>
<td>-3,63</td>
<td>-1,53</td>
<td></td>
<td>177</td>
</tr>
</tbody>
</table>

Measured on: 0 → 7  Measured on: -7 → 0

Source: Own research

The Figure 14 shows the final output of the discriminant analysis.

Figure 14: Result of the Discriminant Analysis, Kotler – Keller (2008)
It draws up the clusters visually according to the two most important discriminant functions the analysis determined. The first function mainly represents the cost dimension and the second one the benefit dimension of Kotler - Keller’s model. The linear correlation coefficients of the second function are clearly connected to the mentioned dimension, but the first function has somewhat weak-medium correlation with the product and branding benefits, which leads to the conclusion that this function is a cost-driven value evaluation. With these two functions almost 70% of the total variance can be explained, which can be considered a good result. This can be thanked to the fact that these two functions have very low value of Wilk’s λ. Although some clusters are visually overlapping, the other three functions coming from the discriminant analysis could separate the groups more. Moreover from this figure, the key types of Apple users’ thoughts on perceived value can be recognized, so not the clusters itself, but their centroids are more important in the analysis.

**Perceived Value of the Clusters**

In the survey there was a question about the importance of the benefit and cost dimensions for the respondents. My intention was to create Average Benefit and Cost scores weighted by their importance values, the sum of which is equal to a possible Perceived Value score. I use these results only as indicators and not concrete numbers.

<table>
<thead>
<tr>
<th>Name</th>
<th>Average Value Weighted</th>
<th>Average Cost Weighted</th>
<th>Average Perceived Value</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>St.Dev.</td>
<td>Mean</td>
</tr>
<tr>
<td>1 The Fanatic</td>
<td>5.75</td>
<td>.70</td>
<td>-1.33</td>
</tr>
<tr>
<td>2 Pricetag Haters</td>
<td>5.44</td>
<td>.78</td>
<td>-2.82</td>
</tr>
<tr>
<td>3 Pear-to-bes</td>
<td>2.64</td>
<td>.98</td>
<td>-2.67</td>
</tr>
<tr>
<td>4 The CoStressed</td>
<td>5.13</td>
<td>1.15</td>
<td>-4.31</td>
</tr>
<tr>
<td>5 The Down to Earth</td>
<td>4.84</td>
<td>1.03</td>
<td>-1.41</td>
</tr>
<tr>
<td>6 The Service Critic</td>
<td>4.05</td>
<td>.92</td>
<td>-2.68</td>
</tr>
<tr>
<td>7 The Product Conscious</td>
<td>3.71</td>
<td>.70</td>
<td>-1.16</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>4.50</td>
<td>1.44</td>
<td>-2.32</td>
</tr>
</tbody>
</table>

**Source:** Own research

This also shows that The Fanatic group is the most positive about the benefits and the least negative about the costs. The Pear-to-bes group has the least positive perception of the benefits, although in the cost dimensions they are only the second most critical; The CoStressed group has much more negative perception of the costs which is balanced with their very positive perceptions about the benefits.
3.4.4.3 Cluster Development for the Scale of Rajh

This scale contained 23 statements measured on a 1-7 scale, from which two had to be recoded. Following the research of Rajh (2012), I intended to create five factors from the statements: the perceived quality, perceived value, perceived cost, perceived performance risk and perceived financial risk factors. For this, I evaluated the statement groups first by the Cronbach α values, the best results are in the following table.

Table 18: Possible Factors Based on the Cronbach α Values for the Scale of Rajh (2012)

<table>
<thead>
<tr>
<th>Factor</th>
<th>Included</th>
<th>Excluded</th>
<th>Cronbach α</th>
</tr>
</thead>
<tbody>
<tr>
<td>Perceived Quality</td>
<td>pq2, pq3, pq4, pq5</td>
<td>pq1</td>
<td>0.892</td>
</tr>
<tr>
<td>Perceived Cost</td>
<td>pc2, pc3</td>
<td>pc1</td>
<td>0.886</td>
</tr>
<tr>
<td>Perceived Performance Risk</td>
<td>pper1, pper2, pper3, pper5, pper6</td>
<td>pper4</td>
<td>0.851</td>
</tr>
<tr>
<td>Perceived Financial Risk</td>
<td>pfir1, pfir2, pfir3, pfir4</td>
<td>-</td>
<td>0.836</td>
</tr>
<tr>
<td>Perceived Value</td>
<td>pv1, pv4, pv5</td>
<td>pv2, pv3</td>
<td>0.876</td>
</tr>
</tbody>
</table>

Source: Own research

As well as all of the following conditions of the factor analysis were met:

- more than 50% of the values of the bivariate correlation matrix is significant,
- variables are not fully independent to which I have to pay attention during the analysis, whether it will cause any problem,
- all of them are metric variables,
- the homoscedasticity is adequate according to the most important demographic and descriptive variables,
- the sample is considered homogenous as it contains only Apple users from mainly the 21-26 age group,
- the case - variable rate is 7.82, which is above 5.

However, the normality condition is again not met. After checking all the condition criteria, I tried to run a five-factor analysis with the included statements shown in the Table 17. This way, the factors weren’t providing the expected variable structure, so I started an iterative process to find the most ideal combination, which creates the initial five factors and still results in good Cronbach α values. The following solution seemed to be the best.
The Perceived Value of Apple
Anett Ecsédi

Table 19: Final Rotated Component Matrix for the Scale of Rajh (2012)

<table>
<thead>
<tr>
<th>Rotated Component Matrix</th>
<th>Factors</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
</tr>
<tr>
<td>pq4/ The quality of Apple is probably very high.</td>
<td>0.840</td>
</tr>
<tr>
<td>pq5/ Apple is a reliable quality brand.</td>
<td>0.796</td>
</tr>
<tr>
<td>pq3/ Apple is a very good quality brand.</td>
<td>0.789</td>
</tr>
<tr>
<td>pc3/ The purchase of this brand at its price would reduce the amount of money at my disposal for the purchase of other products.</td>
<td>0.898</td>
</tr>
<tr>
<td>pc2/ If I were to buy Apple at its price, I would have to reduce the amount of money spent on other things.</td>
<td>0.886</td>
</tr>
<tr>
<td>pc1/ If I were to buy this brand at its price, I would not be able to buy some other products that I would like to buy right now.</td>
<td>0.825</td>
</tr>
<tr>
<td>pv5/ The price of this brand corresponds to its value.</td>
<td>0.828</td>
</tr>
<tr>
<td>pv1/ This brand is very good value for money.</td>
<td>0.803</td>
</tr>
<tr>
<td>pv4/ The price of this brand is acceptable with regard to its quality.</td>
<td>0.772</td>
</tr>
<tr>
<td>pfir4/ Given its price, the purchase of this brand represents a considerable financial risk for me.</td>
<td>0.874</td>
</tr>
<tr>
<td>pfir3/ By buying this brand, I am being exposed to the financial risk.</td>
<td>0.844</td>
</tr>
<tr>
<td>pfir1/ Given the amount of money I have to pay, I consider the purchase of this brand risky.</td>
<td>0.792</td>
</tr>
<tr>
<td>pper5/ I think there is a risk that this brand does not possess the characteristics it should possess.</td>
<td>0.859</td>
</tr>
<tr>
<td>pper2/ I believe there is a risk that Apple may not perform well.</td>
<td>0.814</td>
</tr>
</tbody>
</table>

Source: Own research

The Cronbach α figures in Table 19 belong to the factor structure presented above, all of them are considered to be good.

Table 20: Cronbach α Values for the Final Factors of Rajh (2012)

<table>
<thead>
<tr>
<th>Nr</th>
<th>Factor Name</th>
<th>Variables contained</th>
<th>Cronbach α</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Perceived Quality (PQ)</td>
<td>pq3, pq4, pq5</td>
<td>0.877</td>
</tr>
<tr>
<td>2</td>
<td>Perceived Cost (PC)</td>
<td>pc1, pc2, pc3</td>
<td>0.867</td>
</tr>
<tr>
<td>3</td>
<td>Perceived Value (PV)</td>
<td>pv1, pv4, pv5</td>
<td>0.876</td>
</tr>
<tr>
<td>4</td>
<td>Perceived Financial Risk (PF)</td>
<td>pfir1, pfir3, pfir4</td>
<td>0.822</td>
</tr>
<tr>
<td>5</td>
<td>Perceived Performance Risk (PP)</td>
<td>pper2, pper5</td>
<td>0.855</td>
</tr>
</tbody>
</table>

Source: Own research

The solution was verified by the Anti-Image Covariance Matrix, the MSA values were between 0.6 and 0.95, the Bartlett Test was significant and the value of KMO was 0.816. 80% was explained from the total variance and the eigenvalue of the last factor was 0.7.

During the preparations for the cluster analysis, I identified 5 outliers to be excluded so 175 respondents remained for the further analysis. The scales are again measured on the same scale and the condition of multicollinearity is met.
The Table 20 summarizes the results of the different methods about the ideal number of clusters. The Figure 15 shows the recommendations of the AIC criterion and on Figure 16 we can see the small breaks of the Function.

### Table 21: Possible Cluster Numbers for Rajh (2012)

<table>
<thead>
<tr>
<th>Criterion</th>
<th>Suggestion</th>
</tr>
</thead>
<tbody>
<tr>
<td>A priori</td>
<td>4 - 7</td>
</tr>
<tr>
<td>Akaike IC</td>
<td>6</td>
</tr>
<tr>
<td>Bayesian IC</td>
<td>4</td>
</tr>
<tr>
<td>Thumb criterion</td>
<td>3, 4, 5, 8</td>
</tr>
<tr>
<td>Dendrogram</td>
<td>3 - 10</td>
</tr>
<tr>
<td>Number of Cases</td>
<td>Max. 7 (k &gt; 10)</td>
</tr>
<tr>
<td>St. Deviation</td>
<td>7</td>
</tr>
</tbody>
</table>

Source: Own research

After this, I examined the different cluster solutions between four and eight clusters according to interpretability and the seven-cluster solution seemed to be the best, simply because this is the first solution which shows differences in the Perceived Quality dimension. Until the six-cluster solution all of the clusters are too close to the average in that dimension. On Table 21 the seven-cluster solution can be seen.
Table 22: Means and St. Deviations for the Final Cluster Solution, Rajh (2012)

<table>
<thead>
<tr>
<th>Cluster numbers</th>
<th>Perceived Quality</th>
<th>Perceived Value</th>
<th>Perceived Financial Risk</th>
<th>Perceived Performance Risk</th>
<th>Perceived Cost</th>
<th>Mean</th>
<th>Standard Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.098</td>
<td>.242</td>
<td>-.958</td>
<td>-.640</td>
<td>.690</td>
<td>.745</td>
<td>.666</td>
</tr>
<tr>
<td>2</td>
<td>.218</td>
<td>-.182</td>
<td>1.254</td>
<td>-.657</td>
<td>.072</td>
<td>1.073</td>
<td>.819</td>
</tr>
<tr>
<td>3</td>
<td>.600</td>
<td>.294</td>
<td>-.555</td>
<td>.084</td>
<td>-1.233</td>
<td>.461</td>
<td>.678</td>
</tr>
<tr>
<td>4</td>
<td>-.028</td>
<td>-1.059</td>
<td>1.257</td>
<td>1.202</td>
<td>.722</td>
<td>1.031</td>
<td>.828</td>
</tr>
<tr>
<td>5</td>
<td>.205</td>
<td>.769</td>
<td>.387</td>
<td>.481</td>
<td>.094</td>
<td>.485</td>
<td>.683</td>
</tr>
<tr>
<td>6</td>
<td>-1.495</td>
<td>.108</td>
<td>-.250</td>
<td>.190</td>
<td>-1.056</td>
<td>.745</td>
<td>.582</td>
</tr>
<tr>
<td>7</td>
<td>-2.218</td>
<td>-1.151</td>
<td>-.329</td>
<td>-1.306</td>
<td>-.709</td>
<td>.968</td>
<td>.747</td>
</tr>
</tbody>
</table>

Source: Own research

The validation with discriminant analysis (normality, homoscedasticity are not met) showed that 90.9% of original grouped cases and 86.9% of cross-validated grouped cases was correctly classified, therefore the seven-factor solution is accepted.

Table 23: Final Cluster Solution for the Scale of Rajh (2012)

<table>
<thead>
<tr>
<th>Cluster</th>
<th>Perceived Quality</th>
<th>Perceived Value</th>
<th>Perceived Financial Risk</th>
<th>Perceived Performance Risk</th>
<th>Perceived Cost</th>
<th>Name</th>
<th>Nr. of cases</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.098</td>
<td>.242</td>
<td>-.958</td>
<td>-.640</td>
<td>.690</td>
<td>Hankers</td>
<td>32</td>
</tr>
<tr>
<td>2</td>
<td>.218</td>
<td>-.182</td>
<td>1.254</td>
<td>-.657</td>
<td>.072</td>
<td>FinanciAlerts</td>
<td>20</td>
</tr>
<tr>
<td>3</td>
<td>.600</td>
<td>.294</td>
<td>-.555</td>
<td>.084</td>
<td>-1.233</td>
<td>The Fanatic</td>
<td>19</td>
</tr>
<tr>
<td>4</td>
<td>-.028</td>
<td>-1.059</td>
<td>1.257</td>
<td>1.202</td>
<td>.722</td>
<td>Twopenny-halfpennies</td>
<td>26</td>
</tr>
<tr>
<td>5</td>
<td>.205</td>
<td>.769</td>
<td>.387</td>
<td>.481</td>
<td>.094</td>
<td>Treasure Hunters</td>
<td>42</td>
</tr>
<tr>
<td>6</td>
<td>-1.495</td>
<td>.108</td>
<td>-.250</td>
<td>.190</td>
<td>-1.056</td>
<td>Extra Quality Seekers</td>
<td>12</td>
</tr>
<tr>
<td>7</td>
<td>-2.218</td>
<td>-1.151</td>
<td>-.329</td>
<td>-1.306</td>
<td>-.709</td>
<td>The Confident Critic</td>
<td>14</td>
</tr>
</tbody>
</table>

Source: Own research

The first cluster perceives the quality and value slightly above average, they perceive the risks much below average, but for them the cost is bigger than for the average of the sample. This means that they are sure in Apple, but the cost of it is considerable, so I called them the Hankers.

The second cluster perceives the quality slightly above average, and they are sure in the performance, but the value is a bit below average, which can be thanked to their perception of very high financial risk compared to the average. Therefore I call them FinanciAlerts.

The third cluster is the most positive group, the value and quality are high, the risks and cost are low, this makes them The Fanatic group.
The fourth cluster has the worst perception of the cost and the performance risk and the second worst perception of the value. Overall they are the most sceptic about Apple, so I gave them the name of Twopenny-halfpennies.

The fifth cluster has the best perception of the value of Apple, although they also perceive the risks and cost slightly above average, so they can be called the Treasure Hunters.

The sixth cluster considers cost much below than the average, but also they perceive the quality much below than the average. It seems that they would consider products which are even better quality for even higher price, so they are the Extra Quality Seekers.

The seventh cluster perceives the quality and the value below average, but they are confident regarding the risks, and also the cost is considered not that high, so this makes them The Confident Critic.

Here is the average score for every factor compared with the clusters.

Table 24: The Average Scores for the Clusters of Rajh (2012)

<table>
<thead>
<tr>
<th>Cluster</th>
<th>PQ Average Score</th>
<th>PV Average Score</th>
<th>PF Average Score (negative)</th>
<th>PP Average Score (negative)</th>
<th>PC Average Score (negative)</th>
<th>Name</th>
<th>Nr. of cases</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>6,18</td>
<td>4,86</td>
<td>-1,80</td>
<td>-1,83</td>
<td>-5,27</td>
<td>Hankers</td>
<td>32</td>
</tr>
<tr>
<td>2</td>
<td>6,00</td>
<td>4,17</td>
<td>-4,59</td>
<td>-2,08</td>
<td>-4,92</td>
<td>FinanciAlerts</td>
<td>20</td>
</tr>
<tr>
<td>3</td>
<td>6,49</td>
<td>5,21</td>
<td>-1,88</td>
<td>-2,26</td>
<td>-2,39</td>
<td>The Fanatic</td>
<td>19</td>
</tr>
<tr>
<td>4</td>
<td>4,96</td>
<td>2,67</td>
<td>-3,10</td>
<td>-5,15</td>
<td>-5,95</td>
<td>Twopenny-halfpennies</td>
<td>26</td>
</tr>
<tr>
<td>5</td>
<td>6,09</td>
<td>5,15</td>
<td>-3,45</td>
<td>-3,27</td>
<td>-4,75</td>
<td>Treasure Hunters</td>
<td>42</td>
</tr>
<tr>
<td>6</td>
<td>4,14</td>
<td>3,89</td>
<td>-2,53</td>
<td>-3,71</td>
<td>-2,81</td>
<td>Extra Quality Seekers</td>
<td>12</td>
</tr>
<tr>
<td>7</td>
<td>5,45</td>
<td>3,33</td>
<td>-2,48</td>
<td>-1,36</td>
<td>-3,33</td>
<td>The Confident Critic</td>
<td>14</td>
</tr>
<tr>
<td>Total</td>
<td>5,78</td>
<td>4,34</td>
<td>-2,98</td>
<td>-2,85</td>
<td>-4,55</td>
<td></td>
<td>175</td>
</tr>
</tbody>
</table>

Source: Own research

On the next page there is the final output for the discriminant analysis. The first function correlated mainly with the Perceived Performance Risk, the second one did with the Perceived Financial Risk. This means that these two dimensions have the biggest separating power, however the two functions explain only the 61% of the total variance. The two functions had very similar low value of the Wilk’s λ and both of them were significant.
3.4.4.4 Comparison of the Two Cluster Solutions

Now we have the two cluster solutions so we can compare them if they have any overlaps. The table 24 shows the result.

Table 25: Cross-tabulation of the Two Cluster Solutions

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>The Fanatic</td>
<td>8</td>
<td>3</td>
<td>6</td>
<td>0</td>
<td>12</td>
<td>1</td>
<td>2</td>
<td>2</td>
<td>12</td>
<td>2</td>
<td>32</td>
</tr>
<tr>
<td>Pricetag Haters</td>
<td>4</td>
<td>5</td>
<td>0</td>
<td>3</td>
<td>2</td>
<td>0</td>
<td>2</td>
<td>2</td>
<td>12</td>
<td>2</td>
<td>16</td>
</tr>
<tr>
<td>Pear-to-bes</td>
<td>2</td>
<td>5</td>
<td>0</td>
<td>12</td>
<td>6</td>
<td>6</td>
<td>4</td>
<td>2</td>
<td>12</td>
<td>2</td>
<td>35</td>
</tr>
<tr>
<td>The CoStressed</td>
<td>5</td>
<td>5</td>
<td>3</td>
<td>4</td>
<td>7</td>
<td>0</td>
<td>2</td>
<td>2</td>
<td>12</td>
<td>2</td>
<td>26</td>
</tr>
<tr>
<td>The Down to Earth</td>
<td>5</td>
<td>3</td>
<td>5</td>
<td>4</td>
<td>8</td>
<td>1</td>
<td>2</td>
<td>2</td>
<td>12</td>
<td>2</td>
<td>28</td>
</tr>
<tr>
<td>The Service Critic</td>
<td>3</td>
<td>5</td>
<td>2</td>
<td>3</td>
<td>2</td>
<td>1</td>
<td>1</td>
<td>1</td>
<td>12</td>
<td>2</td>
<td>17</td>
</tr>
<tr>
<td>The Product Conscious</td>
<td>4</td>
<td>4</td>
<td>2</td>
<td>0</td>
<td>5</td>
<td>2</td>
<td>1</td>
<td>1</td>
<td>12</td>
<td>2</td>
<td>18</td>
</tr>
</tbody>
</table>

Total: 31 30 18 26 42 11 14 172

Source: Own research

It is not surprising that the two cluster solutions are different, because they measured the perceived value from different perspectives. However, I didn’t assume the diversity to be such extended, which can indicate that the two perceived value measuring scales have less
overlaps; they rather complement each other. We can only notice smaller overlaps at the extremes, for example between the Pear-to-bes and Twopenny-halfpennies.

3.4.4.5 General Description of the Clusters

I crossed the two cluster solution with the general questions of the survey, the results can be seen in Appendix D; here I only highlight the most important consequences. I will start with the clusters from Kotler - Keller and then evaluate the clusters of Rajh to avoid confusion. The conclusion should be considered more like hypotheses of the future research because of the sample size.

The clusters based on Kotler – Keller (2008)

First, no considerable pattern can be seen regarding the question “When did you get your first Apple product?”. In the self-evaluation of loyalty, the clusters are balanced apart from The Fanatic, which contains much more loyal, and the Pear-to-bes, which contains much more disloyal people. This is more or less the pattern for the question “Taking all the benefits and costs of Apple into account, are the benefits worth the costs?”. Nationality is similar to the first question; we can see no outstanding pattern. This is beneficial regarding the analysis since a pattern would suggest the separation of the sample according to regions because that variable would have too big effect on the perceptions. This is the case with Gender and Age as well. However according to gender, only The CoStressed (more female), The Fanatic (more female) and The Product Conscious (more male) have considerable difference. And according to age The Down to Earth group is a bit younger.

The clusters based on Rajh (2012)

Regarding the first question we can say that the Extra Quality Seekers got their first Apple product the least time ago, but the others are mainly similar. Again on the one hand, The Fanatic has considerably higher number of Apple loyal people, on the other hand the Twopenny-halfpennies has zero. This is also the pattern for the benefit vs. cost question similarly to the Kotler - Keller Clusters. According to regions, this cluster solution has no pattern either, the only interesting result is that there is zero person in The Fanatic group from Southern Europe. Regarding Gender, we have slightly bigger differences compared to the Kotler - Keller Clusters; apart from the Extra Quality Seekers every clusters has low or moderate female or male dominance, but it still gives no pattern regarding the factors. Here
the Extra Quality Seekers group is a bit younger than the other ones; the others are close to the average or have too high standard deviation.

3.4.4.6  Cluster Description by the Brand & Self Concepts

To be able to find the answer for the research question regarding the brand & self concepts, I also used the Custom Table to cross the clusters with the brand & self average numbers. Prior to the cross-tabulation of the variables mentioned, I generated these average numbers from the brand & self scales for every respondent to obtain the average loyalty, engagement, commitment and evangelism scores for the analysis.

The clusters based on Kotler – Keller (2008):

Table 26: Average Scores of the Clusters (Kotler- Keller,2008) Regarding the Brand & Self Concepts

<table>
<thead>
<tr>
<th></th>
<th>Loyalty Average Score</th>
<th>Evangelism Average Score</th>
<th>Commitment Average Score</th>
<th>Engagement Average Score</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>St.Dev.</td>
<td>Mean</td>
<td>St.Dev.</td>
</tr>
<tr>
<td>1</td>
<td>5,74</td>
<td>.82</td>
<td>5,83</td>
<td>.78</td>
</tr>
<tr>
<td>2</td>
<td>4,64</td>
<td>1,14</td>
<td>4,75</td>
<td>1,28</td>
</tr>
<tr>
<td>3</td>
<td>3,18</td>
<td>1,26</td>
<td>3,31</td>
<td>1,41</td>
</tr>
<tr>
<td>4</td>
<td>4,58</td>
<td>1,93</td>
<td>4,77</td>
<td>1,92</td>
</tr>
<tr>
<td>5</td>
<td>4,38</td>
<td>1,39</td>
<td>4,47</td>
<td>1,42</td>
</tr>
<tr>
<td>6</td>
<td>4,16</td>
<td>1,25</td>
<td>4,29</td>
<td>1,22</td>
</tr>
<tr>
<td>7</td>
<td>3,90</td>
<td>1,42</td>
<td>3,97</td>
<td>1,42</td>
</tr>
<tr>
<td>Total</td>
<td>4,40</td>
<td>1,56</td>
<td>4,52</td>
<td>1,59</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Source: Own research

Looking at the total numbers, the first interesting conclusion for the whole sample is that Evangelism has higher total score than Loyalty, which violates the belief that Evangelism is a next step after Loyalty and clearly shows the importance of WOM and the legacy of Kawasaki in the case of Apple. The sequence of the other concepts reflects the expectations. The other considerable result is that Loyalty, Evangelism and Commitment have high number for total average, but Engagement has rather small; even the brand of Apple cannot reach a high score in that concept in the sample.

Examining the clusters the pattern shaped nicely:

- The Fanatic scored the highest in every concepts, this group evaluates all the benefits above average, the branding connected benefits is the highest from all,
- the seconds are the Pricetag Haters and The CoStressed, both groups are above average about all the benefits,
• the thirds are The Down to Earth and The Service Critic, both groups have below average perception of one of the benefits, branding and service respectively,
• the fourth is The Product Conscious cluster, it has two below average benefit perceptions (branding and service), however they score the lowest in Engagement,
• and the last is the Pear-to-bes, they have below average perception in all of the benefit components.

This is because the Branding CB and Product CB factors correlated considerably with the brand & self concepts. The concepts had no or very low connection with the cost dimensions.

The clusters based on Rajh (2012):

Table 27: Average Scores for the Clusters (Rajh, 2012) Regarding the Brand & Self Concepts

<table>
<thead>
<tr>
<th></th>
<th>Loyalty Average Score</th>
<th>Evangelism Average Score</th>
<th>Commitment Average Score</th>
<th>Engagement Average Score</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Mean</td>
<td>St.Dev.</td>
<td>Mean</td>
<td>St.Dev.</td>
</tr>
<tr>
<td>1</td>
<td>4,76</td>
<td>1,10</td>
<td>5,03</td>
<td>1,11</td>
</tr>
<tr>
<td>2</td>
<td>4,41</td>
<td>1,73</td>
<td>4,46</td>
<td>1,75</td>
</tr>
<tr>
<td>3</td>
<td>5,46</td>
<td>1,26</td>
<td>5,45</td>
<td>1,23</td>
</tr>
<tr>
<td>4</td>
<td>3,13</td>
<td>1,63</td>
<td>3,17</td>
<td>1,72</td>
</tr>
<tr>
<td>5</td>
<td>4,68</td>
<td>1,35</td>
<td>4,83</td>
<td>1,27</td>
</tr>
<tr>
<td>6</td>
<td>3,49</td>
<td>1,05</td>
<td>3,65</td>
<td>1,05</td>
</tr>
<tr>
<td>7</td>
<td>4,47</td>
<td>1,59</td>
<td>4,45</td>
<td>1,70</td>
</tr>
<tr>
<td>Total</td>
<td>4,41</td>
<td>1,55</td>
<td>4,51</td>
<td>1,57</td>
</tr>
</tbody>
</table>

Source: Own research

The pattern for this cluster solution is not that easily noticeable. The extremes are clear; The Fanatic has the highest scores in every concept, yet lower scores than The Fanatic group of the other cluster solution. The Twopenny-halfpennies has the lowest scores, which are also lower than the scores of the Pear-to-be group. This can mean that the Kotler - Keller Cluster solution could separate better the more positive part of the whole sample, on the other hand the Rajh Cluster solution could identify the lower end of the sample better.

For the loyalty and evangelism concepts the pattern is similar to the average made of Perceived Quality and Perceived Value factors, which are the ones which correlate the most with the concepts. The pattern of commitment is a bit less strong, but still similar to the average created from Perceived Quality, Perceived Value and Perceived Cost factors. For the engagement concept, conclusion cannot be made by any averages created of the factors, which is because it doesn’t correlates with any of the factors.
Computer Owners versus Smaller Device Owners

For the 4.b hypothesis, I also examined the differences between the computer owners and the smaller device owners (only iPod and/or iPhone and/or iPad), the Table 27 contains the results, which is significant in 95% confidence interval (only engagement has some minimal overlap). So we can see that there is a considerable difference which shouldn’t be neglected.

Table 27: Brand & Self Average Scores: Sample Split by Product Ownership

<table>
<thead>
<tr>
<th></th>
<th>Loyalty evaluation average score</th>
<th>Evangelism evaluation average score</th>
<th>Commitment evaluation average score</th>
<th>Engagement evaluation average score</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Computer Owners</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mean</td>
<td>4.92</td>
<td>5.01</td>
<td>4.42</td>
<td>2.75</td>
</tr>
<tr>
<td>N</td>
<td>97</td>
<td>97</td>
<td>97</td>
<td>97</td>
</tr>
<tr>
<td>Std. Deviation</td>
<td>1.28</td>
<td>1.30</td>
<td>1.53</td>
<td>1.49</td>
</tr>
<tr>
<td><strong>Only Smaller Device Owners</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Mean</td>
<td>3.80</td>
<td>3.94</td>
<td>3.31</td>
<td>2.21</td>
</tr>
<tr>
<td>N</td>
<td>76</td>
<td>76</td>
<td>76</td>
<td>76</td>
</tr>
<tr>
<td>Std. Deviation</td>
<td>1.62</td>
<td>1.66</td>
<td>1.77</td>
<td>1.42</td>
</tr>
</tbody>
</table>

Source: Own research

3.4.4.7 Attitude towards the Recent Changes

In this chapter, I will examine the four questions regarding the recent changes first for the whole sample, then for the Kotler - Keller Clusters and last for the Rajh Clusters.

Do you feel that recently many people have Apple products?

96% of the sample answered one of the Yes answers, still 53% doesn’t care about it, 24% finds it good, and only 20% of the sample considers it annoying. In the Kotler - Keller Cluster solution – not surprisingly – The Fanatic has the biggest number of the positives (38%), The Down to Earth has the biggest number of the indifferents (22%) and the pear-to-bes has the highest number of the negatives (31%). Regarding the Rajh Cluster solution the distribution of answers is more equal, it is more difficult to find any kinds of pattern.

Do you think that the speed of innovation slowed down in the last one-two years?

There is a very balanced distribution of the answers; 20% said “Yes, not worried”, 27% answered “Yes, worried”, 17% said “Yes, therefore I will change to another brand”, and 32% said “I don’t think so”. Again in the Kotler - Keller Cluster solution, The Fanatics are the most positive; they represent 28% of the “Yes, not worried” answer. On the opposite side, the Pear-to-bes represents 40% of the group who wants to change brand.
In the Rajh Cluster solution, we cannot see any extreme ratio for the first answer, but 35% of the “Yes, worried” is in the Treasure Hunters and 48% of the changers is in the Twopenny-halfpennies group. This can also show that this solution can separate the lower end of the sample better.

Do you think Apple is having a shift in product focus from computers to other products?

54% of the whole sample answered “Yes, considered good”, 28% answered “I don’t know” and 10% said “Yes, considered bad”. The pattern is weak for the Kotler - Keller Cluster solution, the only outstanding data is that 50% of the 10 %age standing for the negatives is in the Pear-to-bes group. Similarly weak pattern can be seen for the Rajh Cluster solution. We can conclude that the measured scales have low correlation with this question.

Do you think Apple can keep its leading position in the future?

36% answered “Yes, both short and long term” and 43% said “Yes, on short term; no, on long term”. The other answers are negligible. Again the pattern is easy to notice for the extremes, The Fanatic group is more hopeful and trusting, the Pear-to-bes one is more doubtful about either the near or the distant future. For the Rajh Cluster solution the pattern is again weak.

3.4.5 Hypotheses Evaluation

1.a ~ The Price dimension will have the strongest separating power.
1.b ~ The Image dimension will also have strong separating power after Price.
1.c ~ The Psychological Cost dimension will also have strong separating power after Price.

The 1.a hypothesis wasn’t supported; the Price Connected Costs factor, which only contains the Price cost dimension, has the weakest separating power after the Service Connected Benefits factor. The 1.b hypothesis wasn’t supported as well; the Branding Connected Benefits, which contains the Image benefit, has only moderate separating power. The 1.c hypothesis is partly supported; although the Other Connected Costs factor has the strongest separating power, the Psychological cost dimension correlates with it the least, the Time and Energy cost dimensions have bigger correlations with the factor. After the OCC factor the Product Connected Benefits has the second strongest separating power.
2 ~ The Perceived Quality dimension will have the weakest separating power.

This hypothesis was supported, the Perceived Quality dimension split up for the last. Until six factors every factor had around average score in this dimension. In the case of Rajh’s segmentation the Perceived Performance Risk had the strongest separating power.

3.a ~ The sequence of the average rate of the brand & self concepts will follow the sequence drown up in the literature review; loyalty will have the highest average score, then evangelism, commitment, and engagement will have the lowest average score.

The 3.a hypothesis wasn’t supported, which can be thanked to the special connection between Apple and Evangelism. The Loyalty concept had a bit lower average scores, Evangelism got the highest from all.

3.b ~ The loyalty concept will correlate more with the tangible dimensions (K: product & price, R: quality & cost)
3.c ~ The engagement concept will correlate more with the intangible dimensions (K: image & relationship, R: value).

These hypotheses were partly supported. If we expect a correlation above $r = |0.4|$, the Loyalty concept correlates with the Branding CB, the Product CB, the Perceived Value and Perceived Quality factors. The Evangelism correlates with the first three dimensions, the Perceived Quality is almost under 0.4. The Commitment also correlates with the first three factors, but the Engagement only does with the Branding CB and none from the Rajh factors.

3.d ~ The respondents having only iPod, iPhone or iPad products will have significantly lower average scores for the brand & self concepts than the respondents with at least one computer or laptop product.

This hypothesis was supported on a 95% confidence interval analysis, only the engagement concept had a small interval overlap.

4.a ~ The question about Apple becoming less innovative will divide the people the most as far as the questions regarding the recent changes are concerned.
4.b ~ The question about iOSification will divide the people the least as far as the questions regarding the recent changes are concerned.

These two hypotheses were supported, the first question had balanced results which show that it clearly separates people, the second on the other hand had the biggest concentration in one answer.
3.4.6 Choosing from the Two Scales

Both of the scales resulted in easily interpretable solutions; the clusters were separated clearly, they were easily understandable, although both solutions consisted of seven clusters which is considered to be a high number from managerial perspective. The Table 28 summarises the evaluated dimension for choosing from the two solutions.

Table 29: Decision Criteria

<table>
<thead>
<tr>
<th></th>
<th>Kotler - Keller Segmentation</th>
<th>Rajh Segmentation</th>
<th>Supports the segmentation of</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of clusters</td>
<td>7</td>
<td>7</td>
<td>Equal</td>
</tr>
<tr>
<td>Number of cases in the smallest cluster</td>
<td>17</td>
<td>12</td>
<td>Slightly Kotler - Keller’s</td>
</tr>
<tr>
<td>Pattern with Brand &amp; Self Concepts</td>
<td>All the concepts correlate with at least the Branding CB factor and only The CoStressed group had an unacceptable standard deviation</td>
<td>The Engagement correlates with none of the factors and more than one clusters had unacceptable standard deviation</td>
<td>Kotler - Keller’s</td>
</tr>
<tr>
<td>Pattern with the recent changes</td>
<td>No pattern, higher correlation only regarding the most positive or negative clusters with the 1st, 2nd and 4th questions</td>
<td>No pattern, higher correlation only regarding the most positive or negative clusters with the 2nd question</td>
<td>Kotler - Keller’s</td>
</tr>
</tbody>
</table>

Source: Own research

The evaluation supports the segmentation based on Kotler - Keller. However, the two scales turned out to highlight the value from two very different perspectives, even more different than I assumed beforehand. I came to this conclusion from the weak overlap between the groups of the two segmentations. Furthermore, the segmentation of Rajh had better results with the below average half of the clusters, meaning that the below average part of the sample was more accurately segmented regarding the brand & self concepts and the opinions about the recent changes, and the segmentation of Kotler - Keller had better results with the above average groups. The possible consequence of these two results is that the two models and scales should be merged and a new scale should be developed and validated.

3.4.7 Limitations of the Research

I already mentioned most of the limitations of my research but here I would like to draw the attention to them again. First and most importantly, I used an own scale which I didn’t validate beforehand because of the research being an exploratory one. So the results coming
from the segmentation based on Kotler - Keller (2008) should be treated cautiously and the scale should be validated during the further research.

Furthermore the sample size of 180 respondents is considered small. This size was just enough to draw hypothetical conclusions from the analysis which should be further researched with a bigger sample. Approximately around 1000-1500 respondents or more would result in adequate cluster sizes for the analysis. To this point all of the claims and conclusions of the Thesis are strictly valid for the sample, and we can only predict the generally true claims and conclusions.

Last but not least, the representativeness of the sample wasn’t controlled. Regarding gender the sample consisted of almost half-half, but attention should be paid in the further research to age, nationality (or more importantly place of residence) and type of products owned.

In the last chapter I will summarize the content of the Thesis, set the direction of the further research and discuss the most important managerial conclusions.

4 Summary and Outlook

4.1 Synopsis of the Thesis

In my Thesis, I intended to find the answer whether the Apple users can be segmented by how they perceive the value of Apple. For this, I used cluster analysis with two scales, a validated scale from Rajh (2012) and an own scale based on the perceived value model of Kotler - Keller (2008), and I created two segmentations by the scales. Furthermore, my aim was also to practically validate these segmentations by finding differences in the most important topics for Apple;

- the brand & self concepts, meaning to what extent people are loyal to the brand, spread word-of-mouth, as well as committed and engaged to Apple,
- and their attitude to and opinions about the recent changes for the brand.

My research resulted in two seven-cluster segmentations, which shows that the respondents differ considerably by the separating dimensions of the scales. Both segmentations were easily interpretable from marketing perspective but after the examination with the brand & self concepts and the recent changes, the segmentation based on Kotler - Keller seemed to be a more useful result. It had an easily noticeable pattern regarding the brand & self concepts; the concepts correlated with the Branding and Product Benefit factors of the model.
Regarding the recent changes, both of the segmentations had weaker or even non-existing pattern. I could only find correlations between certain answers and the most positive or negative (regarding their evaluation about the dimensions of perceived value) clusters, in which the segmentation based on Kotler - Keller’s model reached better results. In my research, these results made me vote for the segmentation based on Kotler - Keller’s model, although I had to acknowledge some other conclusions, which indicate that the two models should be merged and a more extensive scale should be validated for more accurate results.

4.2 Further Research
This gives the first step for my future research. The scale based on Kotler - Keller (2008) should be completed with the Risk dimensions of Rajh and also with a Social Benefit dimension and after this the new upgraded scale should be validated. If the scale will be found to be accurate, the next step is to conduct a more extended quantitative research with 1000-1500 or more respondents, paying attention to the representativeness.

Furthermore, this database is also useful for answering other interesting questions regarding Apple. I already started to examine the differences between the computer owners and the smaller device owners, but this could be investigated more deeply. In addition to that, the psychological cost dimension was found to be important in both the qualitative and quantitative part, so the respondents could be separated by their evaluation about the psychological cost and the subgroups should be examined by the other variables (demographics, product ownership, brand & self concepts, opinions).

4.3 Theoretical and Managerial Implications
From theoretical perspective my research contributes to the perceived value literature and researches; I compared two models and scales regarding their “goodness” in segmenting the users of Apple, a strong and highly valued brand. The results showed that both of the models seem to be incomplete; in the further research they should be merged partly.

From practical perspective the results indicate that the Apple users can be segmented by perceived value, and if done appropriately, it can predict the loyalty, evangelism, commitment and engagement level of the customer and more importantly his/her attitude to the recent changes. Also this research can highlight the most important perceived value dimension to which Apple has to pay attention. Furthermore, this can give a base for a customer database to target the customers with tailored marketing activities to increase their perceived value.

Corvinus University of Budapest, 4 December 2012
5 References


online communities: applying theories of group identity and interpersonal bonds, MIS Quarterly Vol. 36 No. 3 pp. 841-864.


The Perceived Value of Apple
Anett Ecsédi


Corvinus University of Budapest, 4 December 2012
The Perceived Value of Apple
Anett Ecsédi

Hogg, E. (2012): Why I will never buy an Apple product,


Schlender, B. (2012): I just knew in my bones that this was going to be very important, Fastcompany.com, pp. 72-83.


6 Appendix

Appendix A

The Perceived Value Scale of Rajh (2012)

Appendix B

The In-depth Interview Guide

Appendix C

The Quantitative Questionnaire

Appendix D

The Main Results of the Analysis
**The Scale of Rajh (2012)**

*Perceived Cost:*
\[ \text{pc1} / \text{If I were to buy this brand at its price, I would not be able to buy some other products that I would like to buy right now.} \]
\[ \text{pc2} / \text{If I were to buy Apple at its price, I would have to reduce the amount of money spent on other things.} \]
\[ \text{pc3} / \text{The purchase of this brand at its price would reduce the amount of money at my disposal for the purchase of other products.} \]

*Perceived Financial Risk:*
\[ \text{pfir1} / \text{Given the amount of money I have to pay, I consider the purchase of this brand risky.} \]
\[ \text{pfir2} / \text{Considering its price, I run a risk by buying Apple.} \]
\[ \text{pfir3} / \text{By buying this brand, I am being exposed to the financial risk.} \]
\[ \text{pfir4} / \text{Given its price, the purchase of this brand represents a considerable financial risk for me.} \]

*Perceived Performance Risk:*
\[ \text{pper1-r} / \text{I am sure Apple will perform well.} \]
\[ \text{pper2} / \text{I believe there is a risk that Apple may not perform well.} \]
\[ \text{pper3} / \text{Apple is unlikely to perform well.} \]
\[ \text{pper4} / \text{I am not sure this brand will perform as it should.} \]
\[ \text{pper5} / \text{I think there is a risk that this brand does not possess the characteristics it should possess.} \]
\[ \text{pper6} / \text{I am sure Apple will not perform well.} \]

*Perceived Quality:*
\[ \text{pq1-r} / \text{Apple is a very poor quality brand.} \]
\[ \text{pq2} / \text{Apple will perform well.} \]
\[ \text{pq3} / \text{Apple is a very good quality brand.} \]
\[ \text{pq4} / \text{The quality of Apple is probably very high.} \]
\[ \text{pq5} / \text{Apple is a reliable quality brand.} \]

*Perceived Value:*
\[ \text{pv1} / \text{This brand is very good value for money.} \]
\[ \text{pv2} / \text{Given its price, this brand is economical.} \]
\[ \text{pv3} / \text{This brand can be considered a favourable purchase.} \]
\[ \text{pv4} / \text{The price of this brand is acceptable with regard to its quality.} \]
\[ \text{pv5} / \text{The price of this brand corresponds to its value.} \]
Appendix B
Qualitative research interview guide

This guide was made for an interviewer who is proficient in the topic of perceived value and brand & self concepts. This way, the description of the concepts and terms are unnecessary. The order of the questions should be followed, but according to the given situation, the order of the questions can be changed. Each and every question should be unfolded to the deepest extent possible.

**Goal:** Supporting the secondary research, filling the information gaps and getting to know the terms and formulations that Apple users use to be able to design a survey that is written in the language of Apple users.

**Interviewer:** ________________________________________________________________

**Interviewee:** ________________________________________________________________

**Age of the interviewee:** _______________________________________________________

**Gender of the interviewee:** ____________________________________________________

**Region of the interviewee:** ____________________________________________________

**Occupation of the interviewee:** ________________________________________________

**Location and date of the interview:** _____________________________________________

**Comments:** ________________________________________________________________

**Additional materials:** Pen, voice recorder, laptop

**Instructions:**
- Prepare the guide and the necessary materials!
- Inform the interviewee about how the interview will be conducted!
- The location should be quiet and the interview uninterrupted!

**The guide:**

I. **Apple and the interviewee**
   1. What kind of Apple products do you have? What did you have so far? When did you buy them?
   2. How does Apple appear in your daily life? Describe a typical day of your life and the touchpoints with Apple brand and products!
   3. Apart from the usage of the products when and how do you meet the brand in your life?
   4. What do you like the most in Apple?
   5. What does the Apple brand mean for you?
   6. What characteristics do you associate to Apple?
7. Think on a special event, happening, occasion of your life where Apple brand / product appeared / had an influence / role! Tell me the story and the role of Apple in details!
8. Is there something you really don’t like?
9. How would you describe a typical Apple customer?

II. **Buying process**
   1. In the past when you bought Apple products, what was the main underlying reason?
   2. Now imagine that you want to buy an electronic device in the near future. First you have to decide which product would it be? Why? Which is your favourite product of Apple?
   3. Why would you choose this product from Apple and not from other brands? Why is this better? What criteria do you evaluate?
   4. How and where would you search for information about the products?
   5. What about the advertising of Apple? Do you like it? Does it affect your choice?
   6. Can you remember any Apple advertisement? If yes, which ones (tell the details of the ads)?
   7. Where would you buy it, and why there?
   8. How satisfied do you think you would be with the people in the shop and the service?
   9. What do you think about the money it costs?
10. Now you own the product. What would make you satisfied with it?
11. Do you recommend it to others?
12. During the usage, do you think you will have problems with the product?
13. What if some problem occurs with the product after the purchase? What would you do? And feel?

III. **Perceived value questions**
   1. Now I will give you four words and I would like to ask you to think about what gives you value and benefit regarding these issues In general, and please give examples as well. Furthermore, how do you think Apple could improve regarding these areas?
      a. Product
      b. Service
      c. Personnel
      d. Image
2. I will give four more words which are associated with cost regarding Apple. The question is the same as before.
   a. Money
   b. Time
   c. Energy
   d. Psychological

IV. Recent changes
1. Could you mention any recent changes regarding Apple?
2. Do you feel special, unique as an Apple owner? If yes / no, why? What are the reasons behind your perception?
3. Do you think that many people have Apple devices? Why do you think that? What do you think about that? Is it good or bad for the brand? How do you feel about it?
4. What do you think and feel when you think on Microsoft? Do you feel special, unique as Microsoft/PC owner/user? If yes / no, why? What are the reasons behind your perception?
5. What do you know about the Apple vs. Microsoft competition?
6. Some people on the internet say that Apple is turning away from the customers towards money. What do you think about this?
7. What do you think about the fact that 75 percent of the revenue is coming from iOS devices?
8. What do you think about the fact that an average Apple customer nowadays is 35+?

Closing the interview:
At the end, thank the interviewee for the interview and ask if she/he wants to receive the results of the research or not. If yes, please ask for the contact.

Any additional comments:
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________
___________________________________________________________________________

Budapest, __ November, 2012

_______________________________
Signature
Appendix C
About Apple

Thank you in advance for filling out my survey! It is about the value of Apple, more precisely how you perceive the value of Apple. It contains 19 questions and lasts approximately 20 minutes to fill out. For that I would be really-really grateful! :)

Enter your information:

Gender
Age
Location
Nationality

1. Do you own (or use daily) at least one Apple product?

☐ Yes, I have (or use daily) product(s) from these: iPod, iPhone, iPad, any kind of Apple computer or laptop, any kind of iOS or OS X software, display, trackpad, etc.

☐ Yes, but I have only Apple branded accessories, e.g. Apple mouse, keyboard, earphone, etc.

☐ No, I don’t have any of them.

☐ Other: ____________________________

2. If you are currently studying, please specify your field and level of your ongoing studies! If you are working, please specify your field and level of occupation!

3. When did you buy or get your first Apple product? (Please write a year, e.g. 2008)

4. What kind of Apple products did you have so far and do you have now? (For example if you had an iPhone 3G in the past and now you have an iPhone 4S, then please tick -I used to have- and -I currently have- next to iPhone) (many answers possible)

<table>
<thead>
<tr>
<th></th>
<th>I have never had.</th>
<th>I used to have.</th>
<th>I currently have.</th>
</tr>
</thead>
<tbody>
<tr>
<td>iPod</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>iPhone</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>iPad</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
5. Do you consider yourself a brand loyal person in general?

☐ Yes
☐ No
☐ Sometimes, depends on...

6. Do you consider yourself an Apple loyal person?

☐ Yes
☐ No
☐ Sometimes, depends on...

7. Please evaluate these statements regarding Apple! (2/1)

<table>
<thead>
<tr>
<th>Statement</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7 - I fully agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>Apple is a very poor quality brand.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>If I were to buy Apple at its price, I would have to reduce the amount of money spent on other things.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
I think there is a risk that this brand does not possess the characteristics it should possess.  

I believe there is a risk that Apple may not perform well.  

The purchase of this brand at its price would reduce the amount of money at my disposal for the purchase of other products.  

Apple is unlikely to perform well.  

Apple is a very good quality brand.  

I am sure Apple will not perform well.  

I am not sure this brand will perform as it should.  

The quality of Apple is probably very high.  

If I were to buy this brand at its price, I would not be able to buy some other products that I would like to buy right now.  

Apple is a reliable quality brand.  

I am sure Apple will perform well.  

---

8. Please evaluate these statements regarding Apple! (2/2)

<table>
<thead>
<tr>
<th>1- I don't agree at all</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7 - I fully agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>Considering its price, I run a risk by buying Apple.</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
9. In this section I will ask about the value of Apple perceived by you. It is what you think and what you feel about Apple. First I give you six positive dimensions and I would like you to evaluate them according to the value you feel that Apple gives you in these dimensions. Please choose a number between zero (0) and +7. Zero (0) means that you are neutral in that dimension, Apple gives no value to you. On the other end +7 means that Apple gives you high level of positive value.

<table>
<thead>
<tr>
<th>Products (products and all the features connected strictly to the products)</th>
<th>0</th>
<th>+1</th>
<th>+2</th>
<th>+3</th>
<th>+4</th>
<th>+5</th>
<th>+6</th>
<th>+7</th>
</tr>
</thead>
</table>
10. Now here are the four negative dimensions, which can possibly make the value of Apple lower. These are basically the costs you have to pay for choosing Apple. Please choose a number between zero (0) and -7. Again zero (0) means that you are neutral in that dimension, it doesn’t lower for you the value of Apple at all. On the other end -7 means that this dimension significantly lowers the value of Apple for you.

<table>
<thead>
<tr>
<th>Dimension</th>
<th>0</th>
<th>-1</th>
<th>-2</th>
<th>-3</th>
<th>-4</th>
<th>-5</th>
<th>-6</th>
<th>-7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Price (Your money which you have to invest in anything in connection with Apple)</td>
<td></td>
<td></td>
<td></td>
<td></td>
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<td></td>
<td></td>
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<tr>
<td>Time (Your time which you have to invest in anything in connection with Apple)</td>
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<td></td>
<td></td>
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<tr>
<td>Energy (Your energy which you have to invest in anything in connection with Apple)</td>
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<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Psychological cost
(This cost dimension contains anything which gets you annoyed, stressed or frustrated in connection with Apple)

11. What are the importance of these dimension for you regarding the overall value of Apple?

<table>
<thead>
<tr>
<th></th>
<th>1 - Not important at all</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
<th>10 - Outstandingly important</th>
</tr>
</thead>
<tbody>
<tr>
<td>Products (products and all the features connected strictly to the products)</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Services (any kind of services of Apple before, during and after the purchase of products)</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Personnel (employees of Apple and employees of its distributors)</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
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<td></td>
</tr>
<tr>
<td>Image (the image of the brand in your head)</td>
<td>✓</td>
<td>✓</td>
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<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Relationship (your connection to Apple)</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
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<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td></td>
</tr>
<tr>
<td>Community (your connection to other people having connections with Apple)</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
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<td>✓</td>
<td></td>
</tr>
<tr>
<td>Price (Your money which you have to invest in anything in connection with Apple)</td>
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<tr>
<td>Time (Your time which you have to invest in anything in connection with Apple)</td>
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<tr>
<td>Energy (Your energy which you have to invest in anything in connection with Apple)</td>
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<td></td>
</tr>
<tr>
<td>Psychological cost (This cost dimension contains anything which gets you annoyed, stressed or frustrated in connection with Apple)</td>
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</table>

12. Taking all the benefits and costs of Apple into account, are the benefits worth the costs?

<table>
<thead>
<tr>
<th></th>
<th>1</th>
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<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
</tr>
</thead>
<tbody>
<tr>
<td>Not at all</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Totally worth them</td>
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<td></td>
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<td></td>
</tr>
</tbody>
</table>

13. Do you agree with these statements regarding Apple?

<table>
<thead>
<tr>
<th></th>
<th>1 - I don't agree at all</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7 - I fully agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>I am proud to belong to Apple.</td>
<td></td>
<td></td>
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<tr>
<td>I care about the long-term success of Apple.</td>
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<tr>
<td>I am loyal patron of Apple.</td>
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</tbody>
</table>
I plan to maintain a long-term relationship with Apple.

I feel a sense of belonging to Apple.

14. Do you feel that recently many people have Apple products?

- Yes, and I think it is really good.
- Yes, and I find it really annoying.
- Yes, but I don’t really care about it or it doesn’t really bother me.
- Not really, I don’t feel any change in this sense.
- Not really, I feel the opposite.
- Other:

15. Do you think that the speed of innovation slowed down in the last 1-2 years?

- Yes, but I am not worried, I think it is only temporary.
- Yes, and I am a bit worried but I give Apple some more years.
- Yes, and I think I will choose another brand because Apple gives no longer enough benefits for me.
- I don’t think, I think they are still very innovative.
- Other:

16. Do you agree with these statements regarding Apple and you? (Please keep up, you are almost at the end of the survey! :)

<table>
<thead>
<tr>
<th>1 - I don't agree at all</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7 - I fully agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>I have a special bond with Apple.</td>
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<tr>
<td>I consider Apple to be a part of myself.</td>
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<tr>
<td>I often feel a personal connection between me and Apple.</td>
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<tr>
<td>A part of me is defined by Apple.</td>
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</tbody>
</table>
I feel as if I have a close personal connection with Apple.

I can identify with Apple in my life.

There are links between Apple and how I view myself.

Apple is an important indication of who I am.

17. Do you think Apple is having a shift in product focus from computers to other products?

- Yes, and I think it is good, this way they could become so successful.
- Yes, and I don’t like this process, I preferred when they focused on computers.
- I don’t know, I think they are doing okay regarding this.
- I don’t think they are having a shift.
- Other: __________

18. Are the following statements true for you?

<table>
<thead>
<tr>
<th>Statement</th>
<th>1 - Not true at all</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7 - Entirely true</th>
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</thead>
<tbody>
<tr>
<td>I say positive things about Apple to other people.</td>
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<td>I recommend Apple to someone who seeks my advice.</td>
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<td>I encourage friends and relatives to buy Apple products.</td>
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<td>I consider Apple my first choice to buy.</td>
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<td>I will buy Apple products in the next few years.</td>
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<tr>
<td>I make an effort to use this brand for all of my technical device needs.</td>
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</table>
I would recommend to others to make an effort to use this brand for all of their technical device needs.

I do not encourage friends to buy Apple products.

19. Do you think Apple can keep its leading position in the future?

☐ Yes, both in short and long term.
☐ In short term yes, but on the long term I don’t think so.
☐ On the short term not really but on the long run they will pull themselves together.
☐ I think they will lose it on the short term and on the long term as well.
☐ Other: 

20. Thank you for your answers, I really appreciate your effort! If you would like to receive the results of the study, please write here your e-mail address. If not, please write N/A to the box. Thank you!
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<td>4.84</td>
<td>5.05</td>
<td>5.16</td>
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<td>Average Evangelism evaluation average score</td>
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<td>Average Commitment evaluation average score</td>
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</table>

Note: The data includes various evaluation scores and average values for different categories such as nationality, gender, and loyalty. The average values are calculated from the given data, and the standard deviation is also provided to indicate the variability within the data. The loyalty evaluation average score, evangelism evaluation average score, commitment evaluation average score, and engagement evaluation average score are all calculated and shown with their respective standard deviations.