

# Through the maze of comparative advertising

A research on how brand attitude can be increased by the use of comparative advertising and thereby completing the advertising planning grids

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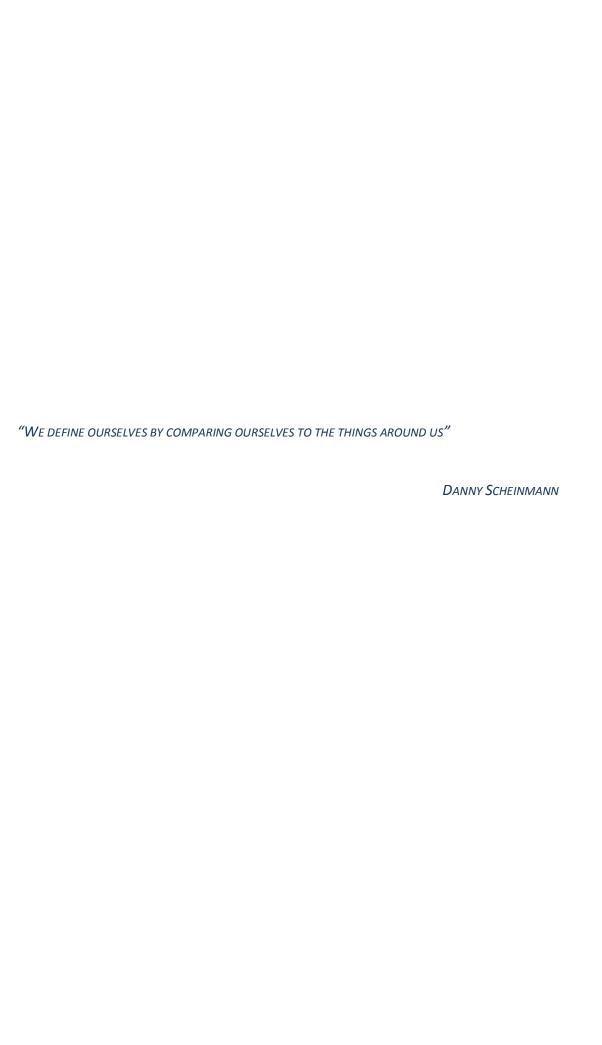
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# **Foreword**

"Don't ever let someone tell you that you can't do something. You got a dream, you got to protect it. When people can't do something themselves, they're going to tell you that you can't do it. You want something, go get it. Period."

This quote is by Christopher Gardner (played by Will Smith) from the movie "The Pursuit of Happyness". Ever since I have heard this quote, back in 2007, it got stuck in my head. It was right after I decided to go to the pre-university secondary education level (in Dutch: VWO) when I heard this quote. Because it would become the second time I wanted to go attend a higher level of education a teacher told me that I should not do it, because going to a university would be nothing for me. I decided not to listen. Two years later, after I dropped out the first year of college, I keep hearing these words in my head over and over again. Around that same time a student counselor told me that it probably would be the best for me to start a program in the higher vocational education (in Dutch: HBO). Again, I decided not to listed. Now, four years later, I am about to get a Master's degree by turning in this thesis. This has been a path I am very proud of.

This thesis, which lays in front of you, is the result of a process which took five months to complete. In those five months a lot of thinking, writing, re-writing, re-thinking and motivating [people to participate in my experiment] is been done. A process which I am proud of as well. Of course I had my ups and downs during the process based on motivation, but I never lost track of what I was doing. Even if I wanted to, this was not going to happen. This all thanks to a supportive family and a lovely girlfriend who was always there for me, supporting me and helping me out when needed.

I want to thank my supervisor in particular. As soon as Petra Tenbült agreed on being my supervisor, this process picked up a fast pace which did not stopped. It did not matter if it was in the weekends, the morning or evenings, I could always call, e-mail or arrange a meeting with her. For all of this, and all her much appreciated extensive feedback, I would like to say: thank you for all your help! And I want to wish you a lot of happiness with the birth and the being together with your first child!

Last, but not least, I want to thank all the people willing to participate in the experiment I conducted for this research. Without your help I was not able to finish this thesis. I have put in a lot of effort in this thesis. And although I needed to work very hard, it also became kind of an addiction to work on it, day and night. Because it was fun to see how this thesis developed, I really enjoyed working hard on it. I hope you will have the same kind of fun reading it!

Patrick Venderbos

# **Abstract**

A planning advertising grid tells you how to advertise certain products, it gives recommendations and tells you what you might want to consider. This is all based upon brand attitude and an advertising grid representing four different types of products. Comparative advertising is being recommended for one type of product. However, the practice shows that comparative advertising is being used for all kinds of products, and with success. This raises the question whether these advertising planning grids are complete. The theory also shows that comparative advertising as a concept is more extensive than suggested in this advertising planning grid. The assumption here is made whether these different types of comparative advertising could have a positive outcome for these different types of products. And thus the research question reads: to what extent is brand attitude, for different types of products, influenced by different types of comparative advertisements and does this calls for a change in the advertising planning grids?

To answer this question, concepts as comparative advertising, the advertising planning grids, brand attitude and the hierarchy of effects models were all discussed and related to each other and this research in order to come up with different hypotheses. These were all based upon the different types of comparative advertisements and the different types of products distinguishable within the advertising planning grids. The three types of comparative advertisements are: a comparison made based on one dimension, a comparison made based on a unique feature absent with the competitive product, and a complete comparison made between the products by two brands.

To find out whether these different types of comparative advertisements could have a positive effect on brand attitude for the different types of products an experiment was conducted among 140 participants. Each participant was asked to rate five items based on a brand. These items together ranked the brand attitude. The participant was asked to do this once again, but after seeing one of the twelve comparative advertisements belonging to that brand. This made it possible to find a possible shift of brand attitude after encountering a comparative advertisement.

It turned out that three out of the six tested hypotheses had a significant positive result. Using a comparative advertisement which emphasizes on a unique feature of a product which is absent with the competitive product does have a positive outcome on brand attitude for two types of products: products which are low involved and informational, and products which are low involved and transformational. The last positive relationship found was for products which were high involved and informational. These product could benefit from comparative advertisements in which all the features of the own product and the product by the competitor are presented.

Keywords: Comparative advertising, advertising planning grids, brand attitude, advertisements

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# 1. Introduction

"Forget about the Swedish meatball place" and "Piss øff with that Swædish sofå" were two slogans the Dutch home product company Woonexpress used to promote the opening of a new branch nearby Rotterdam in 2011. They deliberately referred to the more known Swedish home product company Ikea to gain brand awareness among a wide public in the Netherlands (Meester, 2011). They are not the only one doing this. Pepsi and Coca Cola have been in an "advertising war" for years, which is known as the "Soda Wars" (Bhasin, 2011). Both companies are occasionally referencing each other in their ads since 1975. Sometimes this is about who has the better product, but sometimes also a bit more personal. For example, in 2011 Pepsi made two advertisements in which they used a polar bear and Santa Claus and letting them drink Pepsi. Not coincidental, the polar bear and Santa Claus also are two of the Coca Cola's mascots (ibid.). The same goes for Burger King and McDonalds. For decades they have been referencing each other in their advertisements in multiple ways for who has the better hamburger (Beard, 2010). Apple Inc., known for their Macintosh computers, released a four year long campaign in 2006 in which they made 66 commercials known as the "Get a Mac"-campaign. In these commercials Apple made comparisons between their Macintosh

computers and computers running on Microsoft Windows (Nudd, 2011; Reisinger, 2010). This campaign is regarded as one of the most successful television campaigns in history (Reisinger, 2010). In figure 1.1 advertisements by Pepsi and Burger King are presented. There are however many more companies doing the same thing as what Woonexpress, Pepsi, Burger King and Apple are or have been doing. Samsung, Subaru, BMW, FedEx, Ziploc, Verizon and EasyJet are some examples of companies which are also making these type of advertisements.

#### 1.1 Comparative advertising

This type of advertising is called comparative advertising or competitive advertising. All these



companies mentioned are comparing their own branded products with those, that are more or less the same, by the competitors. According to Miskolczi-Bodnár (2004) comparative advertisements can be seen as a special form of advertising in which a product or service of one company is compared to a product or service of another. These advertisements are designed to highlight the advantages of the product by the advertising company compared to a comparable product by the competitor.

As what might come clear from the examples given, comparative advertising is not a new phenomenon. Comparative ads are made for decades and mostly to be encountered in the United States (Mills, 1995; Quinn, 2009). However, in recent years they also found their way to other regions in the world. Although somewhat less accepted in these regions they are now being made and used more and more in the East-Asia region and Europe as well (Chang, 2007; Donthu, 1998; Miskolczi-Bodnár, 2004).

Comparative advertising can be done in many different ways. There are many types Ash and Wee (1983) and Zhang, Kardes and Cronley (2002) have distinguished. For example, a comparative advertisement could be direct, in which the competitors brand name is presented as well. But it can also be indirect, in which the competitors brand is referred to, but not explicitly mentioned. This shows multiple ways of using comparative advertising are possible.

# 1.2 Where theory and practice come into conflict

Comparative advertising is being used for a wide variety of products even though the theory states that comparative advertising can only be successful for products which are rather expensive and are bought because you need to buy them, not because you want them (Rossiter, Percy & Donovan, 1991). This shows a discrepancy between what the theory suggests and what is happening in practice. The theory states that comparative advertising only works for the rather expensive products which are bought as a result to take away a problem is by Rossiter et al. (1991) and is the so-called advertising planning grid. However, as the examples above show, comparative advertising is also being used for hamburgers, soft drinks and high-end computers. Of which Reisinger (2010) states that the comparative advertising television campaign for these high-end computers is one of the most successful television campaigns made in history. These high-end computers by Apple do not belong to the same type of products of which Rossiter et al. (1991) suggests that comparative advertising could benefit the sales for these types of products. These computers are expensive, but are bought with a different motivational state of mind: you buy a Macintosh computer for selfenrichment: because you want one, not because you need one to solve a problem. If you need a computer, you can also buy less expensive variants rather than an expensive Macintosh. So besides comparative advertising is also being used for different kinds of products such as hamburgers and soft drinks, it is also being used successfully for these other types of products than what Rossiter et al. (1991) are suggesting what should work or not.

A lot of research has been conducted already surrounding comparative advertising, but not on this. Because comparative advertising is being seen as a special form of advertising, a lot of advertising theories are also transferred and tested on comparative advertising (Chang, 2007; Gotlieb & Sarel, 1991; Iyer, 1988; Muehling, 1987). However, this is not the case with the advertising planning grids. There is no particular reason mentioned why this is not done before. It may have something to do with the fact that comparative advertising is included in the advertising planning grids by Rossiter et al. (1991), but this is just an assumption. The fact remains that there is no theory out there which suggests what type of comparative advertisements should work for what type of products.

# 1.3 Advertising planning grids

There are however two theories to be found which suggest the way you should advertise for a certain type of product: the Foote, Cone and Belding (FCB) grid (Ratchford, 1987; Vaughn, 1980) and its successor the Rossiter-Percy grid (Rossiter et al., 1991). And as mentioned, in the Rossiter-Percy grid, comparative advertising is mentioned but this does not seems to be complete. Without going into details at this moment, it can be said that these grids are largely based on theory surrounding brand attitude. Brand attitude is the way people tend to feel about a company and its branded products or services (Imber and Toffler, 2000). This can be either a positive or a negative attitude (ibid.). These grids are using this concept to determine what motivates people to change their attitudes towards certain branded products as a result of different kinds of advertisements (Ratchford, 1987; Rossiter et al., 1991; Vaughn, 1980).

#### 1.4 Research question

The question which implicitly has come forward a couple of times is whether the advertising planning grids are complete. The information presented above shows a discrepancy between the theory and the practice. In theory, only products which are relatively expensive and bought to solve a problem can benefit from comparative advertisements (Rossiter et al., 1991). In practice, not only is comparative advertising just being used for completely different types of products, it is being used successfully (Reisinger, 2010). The assumption here is made that a possibility for this discrepancy is that Rossiter et al. (1991) are using a definition of comparative advertising which is too narrow. Ash and Wee (1983) and Zhang et al. (2002) are defining comparative advertising much broader. This brings the assumption that comparative advertising is not fully included in the advertising planning grids and that other types of products could benefit from this type of advertising as well, as what has been demonstrated by the practice. This raising the question if this model is complete or that it

should be complemented. This leads to the following research question which will be the focus of this paper:

To what extent is brand attitude, for different types of products, influenced by different types of comparative advertisements and does this calls for a change in the advertising planning grids?

This research question can be broken down to a couple of sub questions. The research question is too big to be handled on its own. It is therefore necessary to formulate sub questions which will, when answered, give an adequate answer to the research question as a whole. In total, seven sub questions are defined. These sub questions will be answered throughout the entire research paper. In section 1.6 it is stated which chapter will discuss the following sub questions:

- What is comparative advertising and how does it differ from "normal" advertising?
- **2.** What are the different types of comparative advertising?
- **3.** What is brand attitude?
- 4. What are advertising planning grids and which types of products do they distinguish?
- 5. How should companies advertise their products according to advertising planning grids?
- **6.** How to use comparative advertising for different types of products?
- **7.** Are the existing advertising planning grids complete or are additions needed in the scope of comparative advertising? If so, how?

#### 1.5 Relevance

This research is both scientific and social relevant. The scientific relevance is ensured because it seems that the advertising planning grids are not complete. In these advertising planning grids it is mentioned how a company should advertise its products. These products are categorized into four different quadrants. It is suggested that only one quadrant of products can benefit from comparative advertising. The practice shows that comparative advertising is being used for more categories of products and in some cases with success. Besides this, the way comparative advertising is defined in these advertising planning grids is very narrow. As if there is only one way to use it. This means there are two things missing. First, comparative advertising is not being used to its full extent. There are multiple types of comparative advertising distinguishable. At this moment, these grids have a lack of using all these types of comparative advertisements. Second, these grids do not explain why comparative advertisements are being used for different types of products successfully. This research will fill this gap (these missing parts) by finding how (and if) different types of comparative advertise

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ing can be used successfully for different types of products. When doing so, these advertising planning grids can be complemented with the outcomes of this research.

This research is social relevant as well. The outcomes of this research will become of a useful tool for practitioners when composing a marketing strategy. By complementing the advertising planning grids practitioners within this field have a more complete overview in what strategy they can use. What kind of advertisements should one use by promoting a certain kind of product? Naturally, this is a question of which many practitioners would like to see the answer to. Something which is done by the advertising planning grids. But these grids are not complete. And as mentioned, comparative advertising is starting to win some ground within Europe and East-Asia the last couple of years. For practitioners within these regions it will be even more useful to know which types of comparative advertising can be used to promote their products or services, because at this moment there is a lack of academic knowledge on this topic. So besides that this research is scientific relevant, it also is highly social relevant where it can help practitioners deciding which marketing strategy to use.

#### 1.6 Outline

This paper will be structured using a clear outline. In chapter two the theoretical framework will be presented. In this chapter a comprehensive, but coherent, overview of all the academic literature which is available and important to use within this research will be presented and relate this to this research. This framework will serve as a guidance for this research. By doing so, this chapter will answer the first five sub questions. It will go deeper into the theory surrounding comparative advertising and how it differs from other types of advertising (sub question 1). There will also be a discussion on the different types of comparative advertising (sub question 2). After doing so, the advertising planning grids are being discussed (sub question 4). With this, it is important to introduce brand attitude first because the advertising planning grids are based on this concept (sub question 3). After discussing the purpose of the advertising planning grids, it is also important to go deeper into how to advertise the different types of products according to these grids (sub question 5). This will offer some valuable insights which than can be used when formulating the hypotheses for this research in which the different types of comparative advertisements are linked to the different categories of products. Not only will these hypotheses being written down, they will also be visually presented in a conceptual model.

In chapter three the methods will be discussed. Within this chapter a detailed overview will be given of the used methods for this research. This chapter will consist out of five sections. The first section is devoted to the design of this research. In this section it is discussed, theoretically, how this research is set-up. The second section within this chapter is devoted to the procedure and materials

used in this research. This is a more hands on discussion on how the actual data gathering is carried out. The third section will go deeper into the sample of this research: who is the target group? There are some obstacles distinguishable in executing this research. In the fourth section of this chapter these obstacles are tackled. The last section of this chapter is a description on how the formulated hypotheses will be tested in order to find the right answers to the research question.

Chapter four will be devoted to the findings. In this chapter the formulated hypotheses will be tested and the outcomes of the research will be presented. This chapter will be a stepping stone to chapter five which is the conclusion of this research. In this chapter sub questions six and seven will be answered: How to use comparative advertising for different types of products? And are the existing advertising planning grids complete or are there additions needed in the scope of comparative advertising? By answering these two question all the sub questions are answered. This makes it possible to come up with a conclusion which functions as the answer to the research question: To what extent is brand attitude, for different types of products, influenced by different types of comparative advertisements and does this calls for a change in the advertising planning grids?

# 2. Theoretical Framework

As mentioned above, the first five sub questions are going to be answered within this chapter. Section 2.1 is devoted to the first sub question: what is comparative advertising and how does it differs from "normal" advertising? By first going into advertising, the differentiation with comparative advertising will be noticeable. When discussing comparative advertising more extensively within this section, the second sub question will also be answered: what are the different types of comparative advertising? After doing so, it is important to go deeper into the theory which is out there concerning the advertising planning grids. This will be done in section: 2.2. Before discussing the details of these grids, brand attitude is being discussed first because these grids are based upon this concept. By doing so, the third sub question will be answered as well: what is brand attitude? Not only will brand attitude be discussed within this section. It will also introduce a different theory which is important to know in basic at this point to gain a better understanding of the advertising planning grids: the hierarchy of effects model. By discussing both theories, the underlying structure of the advertising planning grids is presented. It is therefore more easier to understand how the advertising planning grids work. Therefore, in section 2.3 these grids are presented and discussed in more detail. With this, sub question four is being answered: what are advertising planning grids and which types of products do they distinguish? Right after doing so, it will be discussed how these grids should work in practice. This will be the main character of section 2.4. This is in line with the fifth sub question which is: how should companies advertise their products according to advertising planning grids? After discussing all the sub questions at this point it is important to relate all those different theories to this to this research. Therefore, in section 2.5 the underlying theory of the advertising planning grids, the hierarchy of effects model, is discussed more elaborate in the scope of how advertising works. After doing so, the transition is made in section 2.6 to combining these theories with comparative advertising. In this section it will be discussed, based on the underlying theories, which types of products could benefit from which types of comparative advertisements. This will be a stepping stone to the following two sections: the hypotheses and the conceptual model. In section 2.7 the hypotheses for this research, based on the theory provided in this framework, are being formulated. Section 2.8 is a visually representation of these hypotheses: the conceptual model.

#### 2.1 Comparative advertising, a special way of advertising

Before giving a clear description of comparative advertising it is important to discuss advertising first. When doing so, comparative advertising can be better positioned in the world of advertising which is a very broad concept. In the following, advertising will be discussed first briefly. After that, the focus of this section will shift to comparative advertising which is discussed more extensively. As

mentioned, doing this will give answer to the first two sub questions which were: what is comparative advertising and how does it differ from "normal" advertising? And what are the different types of comparative advertising?

#### 2.1.1 Advertising

"Advertising is a paid nonpersonal communication from an identified sponsor, using mass media to persuade or influence an audience." (Richards & Curran, 2002). It is not hard to find a definition of advertising. There is an abundance of definitions to be found in the academic literature on advertising. Arens, Weigold and Arens (1996), Armstrong and Kotler (2000), Bearden, Ingram and LaForge (1998), O'Guinn, Allen and Semenik (2011) and Wells, Burnett and Moriarty (1998) are just a couple of researchers which came up with their own definitions of advertising. However, each of them, and many more, are using different definitions. Moreover, the definition seems to change over time (Richards & Curran, 2002). There are however some elements to each definition which seems to be recurrent in most of these definitions (ibid.). First, it is something that is paid. Second, it is nonpersonal. Third, there should be an identified sponsor. Fourth, there should be made use of mass media. And fifth, it should try to persuade or influence people in doing something (ibid.). Richards and Curran (2002) combined these factors which come into play by describing the overlap between the different authors' definitions and came up with the definition stated at the beginning of this paragraph. As mentioned, this is a very broad way of looking at advertising. This research will focus itself on a special type of advertising, which is comparative advertising in the way it will be discussed below. All the other types of advertising which fall into the definition given above will be treated as so-called non-comparative advertising within this research.

#### 2.1.2 Comparative advertising

What is comparative advertising? It has been mentioned a couple of times already that it can be seen as a special form of advertising. There are a lot of authors which came up with an definition for this type of advertising. A couple of them will be discussed here. After discussing these different definitions given by different researchers, these definitions will be combined in order to come to a definition of my own which includes all the factors of these different definitions.

Wilkie and Farris (1975) state that comparative advertisements are advertisements meeting two requirements. First, the advertisements compare two or more (named or recognizably presented) brands which are of the same generic product or service class. Second, the advertisement makes a comparison on one or more specific attributes of the product or service being advertised. Ash and Wee (1983) criticize this definition by stating that it is restricted, because the definition says you have to do both things in order to call it a comparative advertisement. A broader perspective on

comparative advertising as a concept is mentioned by McDougall (in Ash and Wee, 1983). He states that an advertisement can be seen as comparative as long as an implicit or explicit comparison with another brand is made. Prasad (1976) has the same type of reasoning in his definition, although he only goes in the explicit naming of competitors. He states that comparative advertising refers to the strategy by companies to publish advertisements in which one or more competitors are explicitly named or identified and the company claims a certain kind of superiority with his product compared to the ones by its competitors. Rossiter et al. (1991) made a less extensive definition. They described comparative advertisements as advertisement in which a company compares its own product to the one of a competitor. Miskolczi-Bodnár (2004) describes comparative advertisements as advertisements in which a product or service by one company is compared to a product which is more or less the same by another company. The goals of these advertisements is to highlight the advantages of the own product which the product of the competitor does not have. Comparing these different definitions shows some overlap. In the scope of this research a definition will be used which is more or less combined from the definitions above. The overall agreement on the general definition of comparative advertising is that a comparison should be made between products which are more or less the same but from different brands (Ash and Wee, 1983; Miskolczi-Bodnár, 2004; Prasad, 1976; Rossiter et al., 1991; Wilkie & Farris, 1975). This could happen by naming the competitive brand explicitly (Prasad, 1976; Ash & Wee, 1983) or implicitly (Ash & Wee, 1983) and the ad should claim that the product of the brand which sponsors the ad is better than the one from the competitor(s) (Miskolczi-Bodnár, 2004; Prasad, 1976; Wilkie & Farris, 1975).

Besides this definition for comparative advertising there are two articles in which the authors took on a more elaborate approach in describing this concept. These are McDougall (in Ash and Wee, 1983) and Zhang et al. (2002). In both articles it is described that there are three different types of comparative advertising. However, both are not discussing the same three different types of comparative advertising, but are taking a complete different path in describing which types of comparative advertisements are distinguishable. In the following two sections these different viewpoints on comparative advertising are discussed. The distinction made by McDougall (in Ash and Wee, 1983) is being discussed first. Second, the distinction made by Zhang et al. (2002) will be presented. By doing so, the second sub question will be answered in which it is asked to find out which different types of comparative advertisements there are.

#### 2.1.2.1 Three types of comparative advertising according to McDougall

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McDougall (in Ash and Wee, 1983) made a distinction within three types of comparative advertisements: direct, indirect and generically. Direct comparative advertisements are advertisements in which the name(s) of the competing brands are explicitly presented. In contrast to this there are

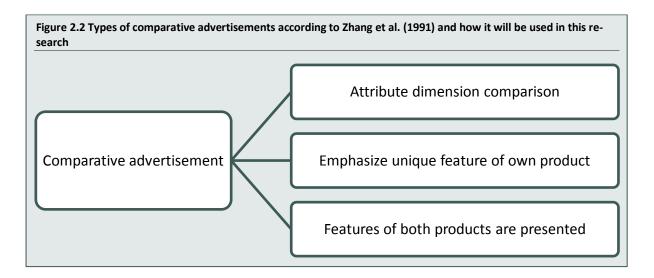
indirect comparative advertisements. In these ads a reference is made to a competitor, but they are not explicitly presenting their names, brands or products. The last type distinguished by McDougall is generically comparative advertising. Within this type of advertising competing brands are named which perform similar end uses. They can however be different on some parts such as physically or experience. Examples of advertisements are presented in figure 2.1.

#### 2.1.2.2 Three types of comparative advertising according to Zhang, Kardes and Cronley

McDougall is not the only one who made a distinction between the different types of advertising. Zhang et al. (2002) also defined three different types of comparative advertisements, based on three different types of alignability. The first type of comparative advertising is described as comparisons that are made between attribute dimensions of both the advertising brand (the target) and the referent brand (the competitor). Within this type of comparative advertising a company compares its own product to one of the competitor using one dimension. The second type distinguished are comparative advertisements in which comparisons are made involving an attribute which is unique to the product by the advertising company and absent in the product by the referent company. Within this type of advertising a company is stating that his product is better than that of the competitor because it has a unique feature which is not present with the product of its competitor. The last type of comparative advertising, according to Zhang et al. (2002), are advertisements which makes comparisons involving certain attributes which are unique to both brands. Within these advertisements the advertising company actually displays the unique features of its own product as well as for the competitive product. Examples of these advertisements are presented in figure 2.1.



The difference between both theories is that the theory by McDougall (in Ash & Wee, 1983) refers more to the exterior appearances, while the theory by Zhang et al. (2002) refers to the actual comparison made within the advertisements. McDougall focuses on the advertisements are presented, whether the competitors brand name is shown or not. While Zhang goes into the way the products which are presented are compared to each other. For this research the choice is been made to use the theory by Zhang et al. (2002) as a differentiation for the different types of comparative advertising because it is more content based. It is based on the features of the products, rather than on the way an advertisement is presented. In figure 2.2 the different types of comparative advertisements which are used in the further scope of this research, as discussed here, are presented.



# 2.2 Advertising planning grids: building on different theories

Advertising planning grids are built upon two different theories / concepts: brand attitude and the hierarchy of effects model. It is therefore important to go deeper into these two concepts first before discussing the actual advertising planning grids. By doing so, it will become easier to understand the design of these grids. In the following two sections both concepts are discussed separately. Brand attitude will be discussed first. The hierarchy of effects model second. By discussing brand attitude, sub question number three is being answered as well. This question reads: what is brand attitude?

#### 2.2.1 Brand attitude

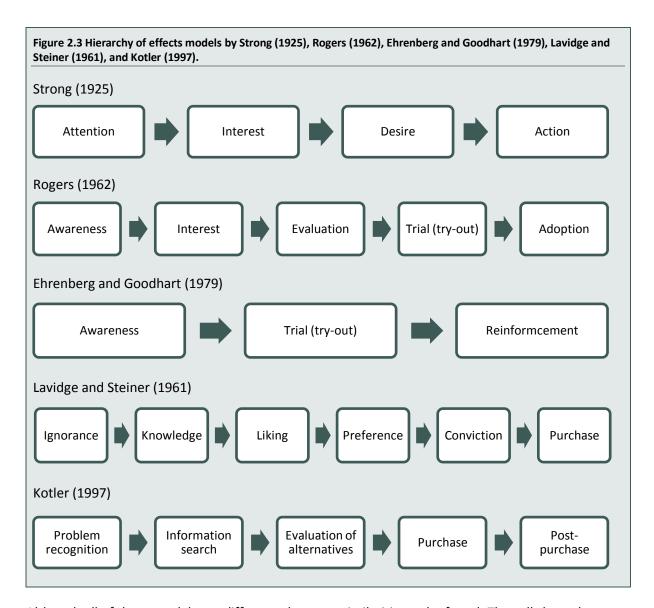
Brand attitude is the way people think and feel about the products or services provided by one company (Imber & Toffler, 2000). It tells something about how much the product is actually needed by a consumer or that it is actually just wanted by the consumer (ibid.). Brand attitude is what the advertising planning grids are based upon. It is therefore important to go deeper into brand attitude as a concept to make a better understanding of the advertising planning grids and how these are de-

signed. Brand attitude is a concept which is widely used by different authors in many different ways (Gardner, 1985; Lane & Jacobson, 1995; Lutz, 1975; Mitchell & Olson, 1981; Mitchell, 1986; Park & Young, 1986; Simonin & Ruth, 1998; Till & Busler, 2000). However, most of these authors are using brand attitude as a concept without really going into what it means. They are actually assuming that the definition of the concept is clear because it is a concept which is being widely used. Spears and Singh (2012) acknowledge this by defining 52 items which can be used to measure brand attitude. This shows that brand attitude is not a concept that is defined narrowly. This makes it problematic to find and use one definition which fits all. However, by reflecting the definition given by Imbler and Toffler (2000), at the beginning of this paragraph, to the way the authors mentioned in this paragraph are using brand attitude in their research and the 52 items by Spears and Singh (2012) it seems that this definition is spot on. This definition will therefore be used in the further scope of this research.

#### 2.2.2 Hierarchy of effects model

The hierarchy of effects model tells us the process of people in making decisions when buying products. In this section this model is being introduced. In section 2.5 the exact relationship with one of the advertising planning grids will be discussed more extensively. This will explain the actual functioning of these grids in more detail. This current section will discuss the basics of the hierarchy of effects model. Just as it was the case with brand attitude, some knowledge about this concept is needed to gain a better understanding of the design of the planning grids.

In short, the process for consumers when buying products is first think, then feel, then act. The advertising planning grids which are going to be presented after this, are a product (or outcome) of these hierarchy of effects models (Mortimer, 2002). There is not just one model out there which describes this process consumer experience when buying products. But there are many models which are all discussing different processes. The five most well-known and used models are included in this section. Ehrenbergh and Goodhardt (1979), Kotler (1997), Lavidge and Steiner (1961), Rogers (1962) and Strong (1925) all made their own model. Some of these models were developed on their own, others were just a follow up to another one. In figure 2.3 these models are presented. All of these models are showing a process which a consumer would go through whenever he or she wants to buy a product. Every model is a process which consists of multiple chains. Every chain embodies a moment within the process a consumer follows when buying products. The models are presented in a very basic way. For this research paper it is not important to explain the different chains in these models extensively. All of the concepts mentioned in the different processes speak enough for themselves to know what they mean.



Although all of these models are different, there are similarities to be found. They all share the same kind of steps. The first step(s) within all of these models are referring to the cognitive (think) state of mind. Followed by the affective (feel) state of mind. The last steps within these models are referring to the behaving (do) of people. Within the cognitive state of mind a consumer is thinking about buying a product. The consumer encountered a moment in which he found out he needs something. In the affective state of mind, the consumer is trying to assess which product would be the best fit for him based on his feelings towards the different options available. When behaving, the consumer is trying out and buying the product chosen (Vakratsas & Ambler, 1999).

However, there is not only one path recognizable, but there are three: the emotional path, the cognitive path and the habit path (Vakratsas & Ambler, 1999). All of the models presented above have one thing in common. They all follow this think – feel – do path. But buying products is not that rectilinear (ibid.). For instance, sometimes you just fall in love with a certain product (a car, jewelry, iPhone) after which you decide to buy it. It is not until later when you start thinking about what you

bought and why. When first buying a product rather than thinking about it you are following the emotional path. Within the emotional path the affective state of mind comes in play first, it is only after purchasing the product that cognitions come into play (ibid.). This is one out of the three paths that are distinguished. The second path is the cognitive paths. This is the path which is most in line with the different models presented in figure 2.3: think – feel – do. First a consumer collects information. After reading all sorts of things about the product (consumer reports, auto magazines, experience forums, etcetera), a consumer creates room for the feelings he has towards the product: does he likes it or not? This feeling is most likely to influence the decision whether he buys the product or not (behavioral) (ibid.). The third path is the habit path. Within this part a consumer tends to buy the product first. It is only after buying a product the consumer starts to think and feel simultaneously about what he has bought. There is no much need to think or feel about these kinds of products because they are bought on a regular base (ibid.). These different paths are important to keep in mind where this will be linked to the advertising planning grids after these are presented.

#### 2.3 The advertising planning grids

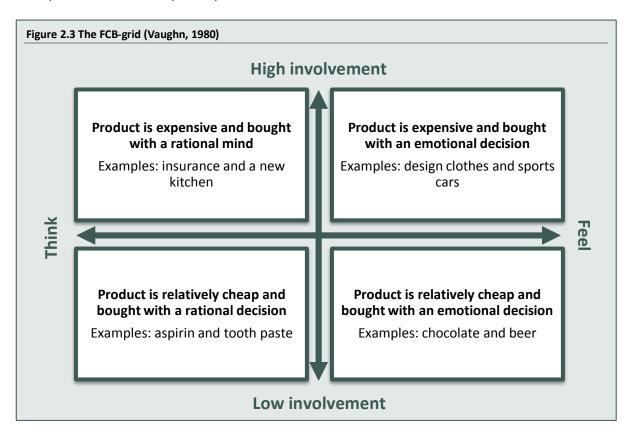
How should a company advertise its products? The answer to this question lies with the advertising planning grids. There are two advertising planning grids known: the FCB-grid by Vaughn (1980) and the Rossiter-Percy grid by Rossiter et al. (1991). Both are providing an answer to this question. One of these grids being more basic (the FCB-grid), the other more advanced (the Rossiter-Percy grid). The Rossiter-Percy grid is an extension of the FCB-grid and is therefore more complete. This is the reason this grid will take on a more prominent role within this research paper. But in order to gain a better understanding of this more elaborate grid it is important to discuss this original grid first. Right after presenting the FCB-grid, the Rossiter-Percy grid is being discussed.

#### 2.3.1 The original advertising planning grid: the FCB grid

1

The FCB-grid, designed by Vaughn (1980), indicates that people purchase products based on two dimensions: involvement and emotion (Ratchford, 1987; Vaughn, 1980). The first dimension is involvement. This means that a product is either of a low involvement (relatively cheap) for the consumer or it is a high involvement (relatively expensive). Expensive does not only refer to the monetary costs, but also to the costs in time. The other dimension is the emotional dimension. This means a product is bought by a consumer with a rational (thinking) or with an emotional (feeling) state of mind. When combining these two dimensions, four quadrants can be distinguished: high involvement – thinking, high involvement – feeling, low involvement – thinking and low involvement – feeling.

Four different quadrants, four different ways to advertise. The first quadrant is high involvement – thinking. This quadrant embodies products which are bought over which consumers needs to think about (rational decision making) and are highly involved with when buying because these products are relatively expensive to buy. The suggestion is made is that advertisements for these types of products needs to be informative. The second quadrant is high involvement – feeling. This quadrant embodies the products which are expensive and are bought using the emotional state of mind. An advertisement which promotes one of the products within this quadrant needs to have a lot of emotional aspects in it. The third quadrant is low involvement – thinking. This quadrant embodies the products which are low involved (relatively cheap to buy) and are bought with a rational mind. These products are bought on a regular base. The advertisements for these products should create and reinforce habits. The fourth quadrant is low involvement – feeling. This quadrant embodies the products which are relatively cheap and are bought with an emotional state of mind. When creating an advertisement for these products you need to emphasize on the personal satisfaction (ibid.). In figure 2.4 the FCB-grid is presented. Each discussed quadrant is positioned in the grid. With each quadrant some examples of products are included.



#### 2.3.2 The successor of the FCB grid: the Rossiter-Percy grid

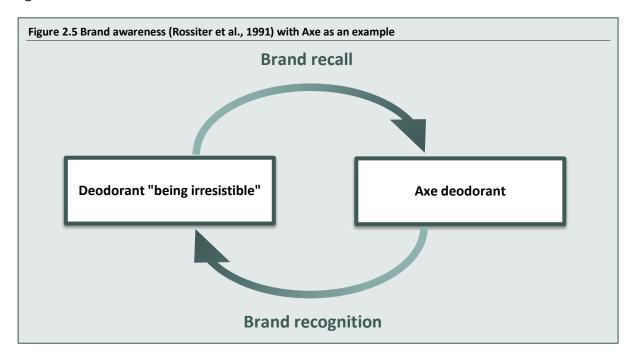
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The Rossiter-Percy grid does not only incorporate brand attitude, it also includes brand awareness (Rossiter et al., 1991). Rossiter et al. (1991) believe that by including brand awareness the grid will become more complete. They are also using brand attitude slightly different than how it is being

used in the FCB-grid. By doing so, they created their own advertising planning grid: the Rossiter-Percy grid. As mentioned before, it is in my belief that these additions make this grid more complete than the FCB-grid. It will therefore be used as the central advertising planning grid within this research. As said, this grid is two faced. The first part consists of brand awareness, while the second part consists of brand attitude. Because the FCB-grid also consisted solely out of brand attitude, the second part of the Rossiter-Percy grid will have a lot of similarities with grid. However, there are some minor differences and the outcomes of the Rossiter-Percy grid are different than from the FCB-grid. The two parts will be discussed more extensively below. Brand awareness will be discussed first, while brand attitude will be discussed after that.

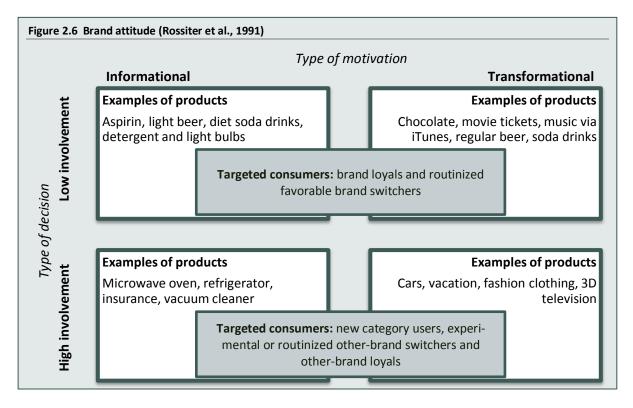
Brand awareness is all about recognizing the brand and recalling the brand. Rossiter et al. (1991) are positioning brand awareness as a key factor for advertising planning grids, because they see today's environment as commercially cluttered which means that there are many brands available for the same kind of product. Thus, it is important for a company to differentiate itself from others to let consumers be more aware of their own brand rather than the brand of their competitors. Brand awareness and brand recalling are different, but are influencing each other. Brand recognizing is what you do when you are purchasing a product. For example, when you are in a convenience store and you want to buy a deodorant, you will see numerous of brands in front of you: Axe, Dove, Sanex, and etcetera. Most likely you will not be able to recognize all the brands you will see there. But some of these brands you will be able to recognize because you have seen them before. Whether it was on television, in an ad in the paper or on a billboard, this does not matter. The company of the brand tried to show you his brand in order for you to recognize it when you are in the convenience store. This is called brand recognition (ibid.). Brand recall is different from this because this is prior to the purchase of a product. It is not about recognizing the brand, but it is about coming up with the brand itself prior to when you want to buy it. Returning to the example of the deodorant, brand recalling is when you are making your shopping list at home and you are thinking about changing your usual brand with a different one. You are thinking about this advertisement in which this guy is followed by hundreds of girls, just because he sprayed this particular deodorant on his body. If you would write down Axe on your shopping list because of this, you just have done brand recalling (ibid.). In short, when you see a deodorant and you can come up with the brand Axe, you are brand recalling. When you see Axe in a convenience store and you know it is a deodorant, you have successfully done brand recognition. This is exactly why both concepts, brand recognition and brand recalling, are linked to each other in a vicious circle. In figure 2.5 this vicious circle is being presented in the way it is described by Rossiter et al. (1991) for the Rossiter-Percy grid. To make a

better understanding of this vicious circle the example of Axe, as discussed above, is included in the figure.



However, brand awareness is not the only part of this grid. Brand attitude is also incorporated. According to Rossiter et al. (1991) the level of involvement is widely accepted as being an important factor within the purchase decisions. That is why they included the level of involvement in their brand attitude grid as well. However, they used a different definition of involvement in contrast to the FCB grid. Where the FCB grid primarily looks at the costs a consumer makes (monetary, time, etcetera) to determine whether the product is either low involvement or high involvement (Vaughn, 1980), the Rossiter-Percy grid is using a different factor to determine this. It focus itself on the amount effort a consumer undertakes before buying the product and the amount of risk a consumer has when buying the wrong brand. When a previous experience or a trial is sufficient for the consumer to buy the product the consumer is low involved. When consumers undertake more effort prior to purchasing a product he can be seen as highly involved. When a consumer is high involved he most likely done some comparisons (price, features, etcetera) prior to the purchase and he might needs to be convinced by a salesperson in order to buy the product (Rossiter et al., 1991). The other dimension distinguished is completely different from the FCB grid. The FCB grid uses the emotional dimension. The Rossiter-Percy grid uses the type of motivation as a dimension. This could be either informational or transformational. Informational motivations refers to negative motivations. Product bought with negative motivations are products which you buy because you need them. The old products are due to renewal or they are bought to take away a problem, such as a headache. Transformational motivations are positive motivations a consumer has when buying a product. These

types of products are meant for self-enrichment, such as a vacation or candy (ibid.). When combining these two dimensions, the type of motivation and the type of decision (involvement), there are four quadrants visible, just as with the FCB grid. Quadrant one is low involvement - informational. Quadrant two is low involvement – transformational. Quadrant three is high involvement – informational. Quadrant four is high involvement – transformational. Within quadrant one products such as aspirin and light beer are included. These products are bought for a reason or to take away a problem. Quadrant two embodies products which are bought for self-enrichment and are bought without making a lot of effort by the consumer. Examples of the type of products are candy and fiction novels. Quadrant three embodies the products which are bought to resolve a problem and which take a lot of effort for consumers to buy. An insurance and a microwave oven are examples of products which belong to this quadrant. Quadrant four embodies products which are bought for selfenrichment and take a lot of effort prior to the purchase. Examples of the type of products are vacations and fashion clothes (ibid.). In figure 2.6 these quadrants are visually presented. Rossiter et al. (1991) also included the type of consumers a company should address with their advertisements. With the low involvement type of decisions the consumers which should be addressed are brand loyals or tend to try out all the different brands from one particular product. The type of consumers which a company should advertise to with the high involvement type of decision are new category users, experimental or routinized competitive brand switchers or consumers loyal to the competitive brand (ibid.). The combination of figures 2.5 (brand awareness) and 2.6 (brand attitude) is the complete planning advertising grid by Rossiter et al. (1991), called: the Rossiter-Percy grid.



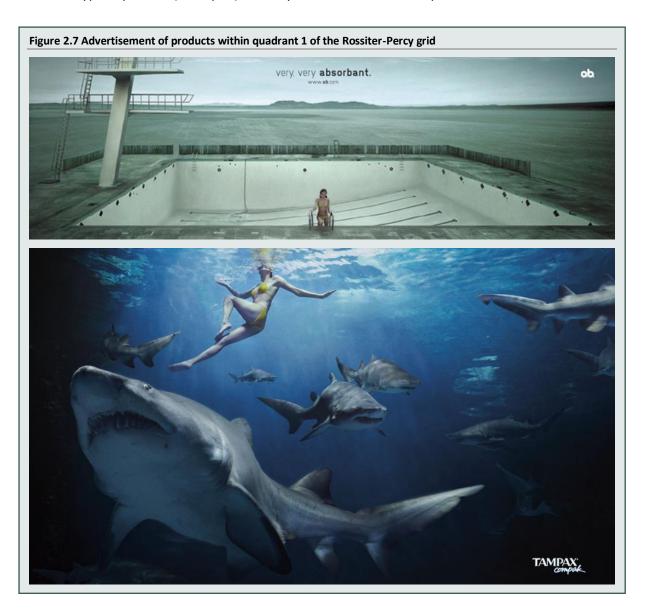
#### 2.4 The way to advertise according to the Rossiter-Percy grid

How should companies advertise their products according to advertising planning grids? This was the fifth sub question formulated in the introduction and will be answered in this section using the Rossiter-Percy grid. This is important to discuss because this will make the discussion of the Rossiter-Percy grid complete. It will then function at the basis this research is based upon. In the above, the way how to advertise according to the FCB grid has been explained briefly. However, this is not yet been discussed with the Rossiter-Percy grid, because this needs a bit more attention within the scope of this research. As Rossiter et al. (1991) state so themselves, adjusting advertisements to different products in line with the quadrant they is not so easy. This is in contrast to a statement made by Ratchford (1987) which stated that it is fairly obvious what kind of type of advertisements you need when looking at the different quadrants within the FCB grid. Likewise to the FCB grid, the Rossiter-Percy grid also has four quadrants. Each quadrant has its own unique features and therefore it needs its own type of advertisements. In the following of this section, the four quadrants will be discussed subsequently. With each discussion the way of advertising according to Rossiter et al. (1991) is explained taking the Rossiter-Percy grid as a whole, both brand awareness and brand attitude, into consideration. Before getting into a more detailed description with the different quadrants and the way of advertising, it needs to be explained that Rossiter et al. (1991) separated both dimensions, the involvement and the motivation dimension, in order to go into more specific details on how to adjust your strategies in designing advertisements. The result of this method is that each quadrant has a certain number of strategy bullet points for both the involvement dimension as well as for the motivation dimension. When combining these bullet points, the overall advertising strategy of each quadrant can be defined. Per each quadrant, after discussing the advertising strategy, some examples of advertisements are included to clarify what has been discussed.

#### 2.4.1 Quadrant 1: Low involvement - Informational

The first quadrant discussed is the combination of low involvement and informational. As mentioned, examples of products which fall into this quadrant are aspirin and diet soda drinks. From the motivation dimension point of view, which is informational, the ad should use a simple problem-solution format (ibid.). Also, because people only buy the product in order to take away a problem the advertisement does not have to be liked by the consumers, they just need to get the right type of information from the ad itself about the product which can solve a certain problem (ibid.). From the involvement dimension point of view (low involvement) the advertisement should take three things into consideration. First, in the ad, at least one benefit of the product should be mentioned (ibid.). Second, the benefits a consumer gets by using this product should be visually presented with extreme proportions. The consumer should gain a curious disbelief. He needs to get the feeling that

the benefits cannot be that good, which results that he thinks that he should buy the product in order to test it for himself (ibid.). Last, the benefits from the product should be easily learned. Consumers must know what the benefits from the product are after just one, or maybe two, exposures (ibid.). Due to the low involvement, risks can be taken by advertisers when trying to sell their products. In figure 2.7 two examples of advertisements within this quadrant are presented. The ad on the top is by OB of which the text in the top center reads: "very very absorbent". The ad below that is for the same type of product (a tampon) but is by a different brand: Tampax.



#### 2.4.2 Quadrant 2: Low involvement - Transformational

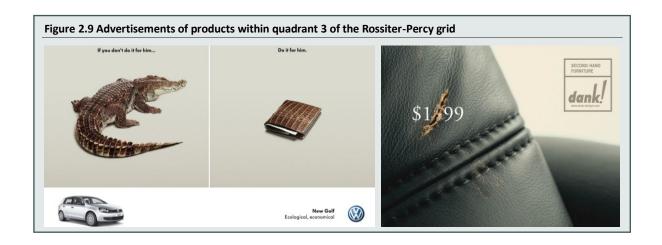
The second quadrant discussed is the combination of low involvement and transformational. As mentioned, examples of products which fall into this quadrant are candy and fiction novels. First seen from the motivation point of view, which was transformation, the advertisement should consist of three features. First, the emotional authenticity should be seen as the key element in the ad. It is

the only benefit you gain when buying the product (Rossiter et al., 1991). Second, the emotion evoked should be unique to the advertising brand (ibid.). Third, in contrast to quadrant 1, the targeted consumer must like the advertisement. This is because of the self-enrichment factor which these products have. Therefore, the consumer must like the ad in order to consider purchasing the product being advertised (ibid.). From the involvement point of view, the advertisement within this quadrant should follow two rules. First, viewers of the ad should associate the brand to what they see in the advertisement itself. This should be done implicitly (ibid.). Second, a company should make multiple, but slightly different, advertisements. This repetition leads to a reinforcement of the association of the brand with what the consumers see in the ad (ibid.). In figure 2.8 three advertisements within this quadrant are displayed. The one on the left is by a Belgium fashion store and tried to advertise their underwear with this advertisement. On the advertisement you see that the slip costs € 16.25, while the socks to fill the slip with costs € 13.25. The one top right is by Emporio Armani and it shows Cristiano Ronaldo wearing the underwear by Armani. The one on the down right is by JBS Underwear and it shows a woman wearing men's underwear. The text on the lower left on this ad reads: "men don't want to look at naked men".



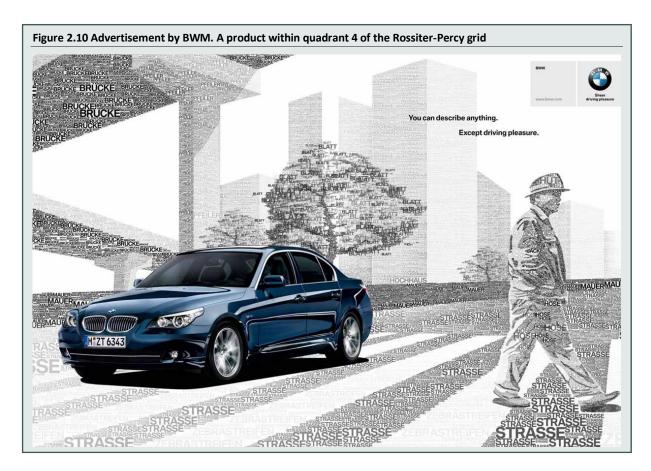
#### 2.4.3 Quadrant 3: High involvement - Informational

The third quadrant discussed is the combination of high involvement and informational. As mentioned, examples of products which belong to this quadrant are insurances and vacuum cleaners. When looking at the motivation point of view, which is informational, two considerations should be made by making an advertisement. First, when introducing a new product within this quadrant, it is very important to have a correct emotional portrayal. When the product is no longer in his early life cycle, when it reaches maturity, this becomes less important (Rossiter et al., 1991). Second, the targeted audience should accept the information provided in the advertisement. However, they do not need to like the ad in order to become triggered by it (ibid.). From the involvement dimension point of view, which is high, five considerations need to be made. First, the initial attitude by the audience toward the brand could become the decisive consideration in choosing the brand. Therefore, vigilance is required when creating an ad (ibid.). Second, the benefits that are claimed which you gain by using the product should not be exaggerated too much. A small exaggeration can be made in the ad, but over claiming the benefits will backfire when the word comes out that the product sold does not live up to the promises (ibid.). Third, a company should not, by accident, under claim the benefits due to the fear of overclaiming. It is important not to make claims that are lower than the actual features the product has. The reason for this is that people will not buy the product if it is being advertised in such a way that it does not live up to the standard people are expecting, while your product actually does have this standard for them (ibid.). Fourth, when the public opinion towards a specific aspect of the brand is negative, the company could try to refute their arguments within the advertisement (ibid.). Last, Rossiter et al. (1991) are including the option to make comparisons with the products by competitors within this quadrant. Also known as comparative advertising. In figure 2.9 two advertisements within this quadrant are presented. The one on the left is an advertisement by Volkswagen. In the ad the latest Volkswagen Golf is introduced. At the right bottom of this ad it is indicated that the car is both ecological as economical. In this ad Volkswagen is comparing these two concepts to an alligator (ecological) and a wallet (economical) by saying that "if you don't do it for him [the alligator]... do it for him [the wallet which is made of alligator skin]". On the advertisement at the right a German second hand furniture company is being advertised. This ad is one out of a series of ads which they published. In these advertisements they implicitly say "yes, our furniture is damaged a bit, but it is therefore much cheaper". They show this by letting the damaging walk straight through the price which makes the price much lower than what it original was supposed to cost without the damage.



### 2.4.4 Quadrant 4: High involvement - Transformational

The fourth quadrant discussed is the combination of high involvement and transformational. As mentioned before, examples of products which belong to this quadrant are vacations and fashion clothing. On a motivation dimension point of view, which is transformational, two considerations needs to be taken care of. First, it is all about the emotional authenticity. The advertisement should be tailored precisely to the targeted audience (Rossiter et al., 1991). Second, personal identification with the product which is advertised, is important for the audience before buying a product within this quadrant. Therefore, the product displayed is just as, or even more, important than the likability of the ad itself (ibid.). On the involvement point of view, which is high, a company should consider three aspects. First, even though it is a transformational product, the high involvement aspect of the product requires information about the product as well (ibid.). Second, likewise to quadrant 3, a company should never under claim the product specifications and benefits. Rather, overclaiming is recommended in this quadrant (ibid.). Last, repeating the advertisement in slightly different manners serves as a reinforcing function for the identification with the product. In figure 2.10 an advertisement by BMW is presented. This ad is for a car as well, just as in quadrant 3. However, BMW position themselves as a luxury brand in this ad. Volkswagen on the other hand, tries to position themselves as a brand which you buy when you think about your wallet or the environment. In the ad by BMW the text on the right top reads: "You can describe anything. Except driving pleasure". What you see in the ad is that they actually wrote all the drawings in (German) words. Instead of drawing a tree in the background, they wrote the word tree in such a way that all the words combined are actually envisioning a tree. The same goes for the road, the buildings, the sidewalks and even the man crossing the street. Everything except one thing: the car itself. Because you cannot describe the pleasure you have driving in a BMW.



#### 2.4.5 The way how to advertise according to the Rossiter-Percy grid summarized

All these different recommendations and consideration on how to advertise certain products is quite overwhelming. It is therefore important to create some order in this information. That is why this section provides a summary of all the recommendations and considerations suggested by Rossiter et al. (1991) as discussed above. This will be done using the outline of the Rossiter-Percy grid itself. Instead of filling this grid with examples of advertisements and the type of consumers which needs to be targeted the grid is filled with the information discussed above, but in a minimalistic way. This is done in figure 2.11. Within this figure it is presented how to advertise for what type of products. This figure is important to keep in mind within the scope of this research because it functions as an indicator to see whether the advertising planning grid is complete or not, depending the outcomes of this research. It will be used when answering the research question in the conclusion. By doing so it is easier to see whether a change has been made and how. Because it is being presented once again in the conclusion it is not important to memorize the figure, but it is important to keep it in mind where it comes from: how is it established? By doing so it is easier to understand how the results of this research are implemented in this advertising planning grid, because this will be done, if necessary, within this part of the grid.

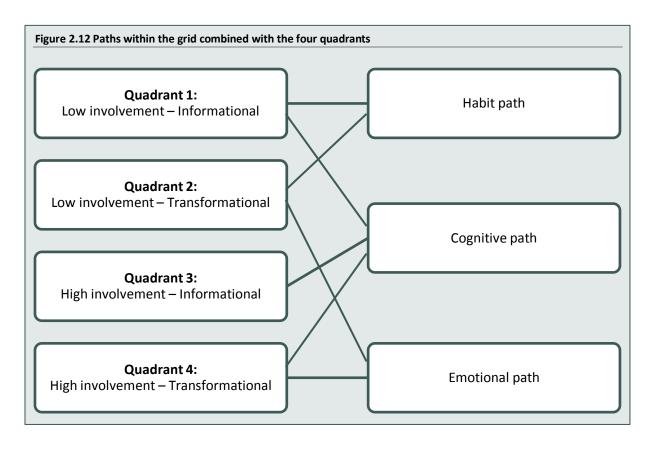
Figure 2.11 How to advertise for different types of products (Rossiter et al., 1991) Type of motivation Informational **Transformational** ow involvement - The benefit which needs to be emphasized The ad should use a simple problemis emotional authenticity solution formats This emotion needs to be unique to the - The ad does not have to be liked by brand everyone - The ad must be liked by the targeted - The ad should at least stresses one audience benefits from using the product in the ad - The brand needs to be associated with the - The benefits shoud be claimed extremely ad implicetly The benefits should be easy to remember Repetition is the key by making the same kind of advertisements Type of decision Correct emotional portrayal is very important if the product is in the early stages of the life cycle - Emotional authenticity is paramount. This - The points made in the ad need to be should be tailored to certain groups within accepted, but does not have to be liked the target group - The initial attitude toward the brand is the - People should be able to identify overriding consideration themselves with the product - A small exaggeration is desired, but do not The advertisements should provide overclaim the features information - The claimed benefits need to be It is recommended to overclaim, but do convincing (do not underclaim) High involvement not underclaim A refutational approach needs to be Repetition, in slightly different ways, is considered when the target audience has important and serves as reinforcement objections - Comparative advertisements needs to be considered

# 2.5 Hierarchy of effects model paths versus the Rossiter-Percy grid

As discussed, there are three different paths identifiable, which tells us how consumers buy products. So how are these three paths related to the advertising planning grid? Most primarily is that these paths are somewhat, but not exclusively, to be found back within the quadrants of the grids. The habit path for instance is to be found among some products within the quadrants 1 and 2. This is the case because these are low involvement products which you will buy more often and of which you tend to buy the same brand after positive experiences (Rossiter et al., 1991; Vakratsas & Am-

bler, 1999). The cognitive path is found back within quadrants 1, 3 and 4. The products within these quadrants are informational, which means you will overthink the choice of purchasing a certain product more. This is in line with the cognitive paths where thinking comes first. However, this is also the case with high involvement products. With these kinds of products you really want to make a good decision before buying the product because of the high costs of it. That is why the cognitive path is also to be found within this quadrant (ibid.). The emotional path is to be found within quadrants 2 and 4. These quadrants distinguish themselves by representing transformational products. These products are bought because they evoke a certain feeling among the consumers. This feeling leads to the purchase. Only after the purchase the consumer thinks about what he has bought (ibid.). These relationships are visually presented in figure 2.12.

The hierarchy of effect models are all describing one path. These models are therefore not complete. A problem which was solved by the introduction of advertising planning grids, discussed before. The multidimensional aspect of these grids are solving the problem of the single path which these hierarchy models are suggesting. It is important to know about these hierarchy models in the scope of this research, because it functions as the basis of the advertising planning grids. This research will use this basis to complement these grids with a broader perspective on comparative advertising than that is been done in the discussed advertising planning grids.



# 2.6 Advertising planning grids versus comparative advertising

Connecting these theories discussed above, gives the opportunity to come up with assumptions which type of comparative advertising works for what type of products. There are multiple ways of advertising. The Rossiter-Percy grid is an excellent tool in providing us with the information on how to do this for certain type of products. Although they did include comparative advertising within their grid, according to them this was only meant for quadrant 3 in which the products are of a high involvement and informational. Meanwhile, in section 2.1 it has been discussed there are three different types of comparative advertising, all have been used with different types of products, which are not solely in quadrant 3 within the Rossiter-Percy grid. Therefore, the functions of the different types of comparative advertising are tried to be identified here. This will be done by finding out how these relate to the planning advertising grid by Rossiter et al. (1991) and come up with hypotheses. In figure 2.2, in section 2.1, the different types of comparative advertising were presented. This figure shows the classifications to which existing comparative advertisements can be classified into. Looking back at the Rossiter-Percy grid, a product is always to be assigned to one out of the four quadrants. Sometimes, depending on the way how a company wants to position itself, the product can shift to another quadrant as was discussed with the example of the cars by Volkswagen and BMW.

So there are three different types of comparative advertising used in this research. In the following these different types are linked to the different quadrants. This is based on combining the different discussed theories and point out the similarities which were to be found.

#### 2.6.1 Attribute dimension comparison

The attribute dimension comparison, in which a product is compared to one of the competitors based on one dimension, is perfect for products which are low involved and transformational. This type is not really meant for the high involvement products. Neither is it for the informational products. These two exclusions are based on the fact that a comparison made based on one attribute is not sufficient enough for these kind of products to make a deliberate decision using the rational mind, which is a big part in the paths with these kinds of products. Therefore leaving room for the second quadrant within the Rossiter-Percy grid which embodies products that are of a low involvement and transformational.

#### 2.6.2 Emphasize unique feature of own product

Emphasizing a unique feature of the own product which the same kind of product by competitor does not have, would be helpful for the low involvement products. With these products it is not really important to gain a lot of information before buying a certain product, but it does needs some

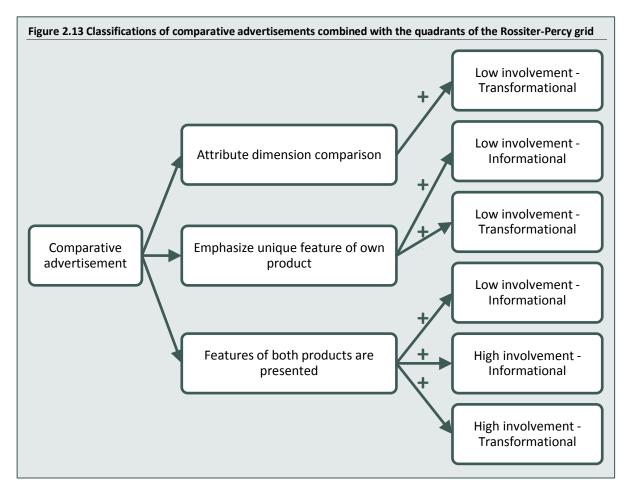
differentiation for the consumer to gain a more positive thought of feeling about the product. Thus, mentioning a feature for their own product which is absent in the product of the competitor could be the small thing that could persuade the consumer to buy that product. Therefore, this classification will be best with quadrants 1 and 2 within the Rossiter-Percy grid.

#### 2.6.3 Features of both products are presented

By presenting the unique features of the product by the own brand as well as the unique features of the competitive brand would give a lot of information to consumers when choosing the brand they want to buy. Needless to say, this type of advertising is perfect for the high involvement – informational products, which is quadrant 3 in the Rossiter-Percy grid. However, the products in quadrant 1 and 4 will also benefit from these types of comparative advertising where quadrant 1 represents low involved informational products and quadrant 4 represents high involved transformational products. Because of the informational and high involved aspects, both quadrants could benefit from it.

#### 2.6.4 Visualizing how comparative advertising should work

In figure 2.13 it has been visualized what has being discussed above. Not only does this lead to the fact that this information will be easier to understand, it will also function as a stepping stone to formulating the hypotheses and making the conceptual model that goes along with it.



### 2.7 Hypotheses

There are six hypotheses which needs to be formulated. This is the result of what has been discussed in section 2.6 and what has been visualized in figure 2.13. By visually presenting the types of comparative advertising and combining them with the quadrants which could benefit from these type of advertisements, it can be seen within a blink of an eye which type of comparative advertising should work for which quadrant. For example, an advertisement which lays the emphasis on a unique feature of the own branded product should has a positive outcome for products which belong to quadrants one and two: products which are of a low involvement and are either informational (1) or transformational (2). When it is being counted out, it can be seen that there are six relationships defined within the figure. Thus, six hypotheses needs to be formulated here. It needs to be mentioned that each of the hypotheses mentioned below all have a null hypothesis that goes along with it. These will not be mentioned here separately. A null hypothesis assumes the opposite of the hypothesis mentioned. This means, in contrast to H1 to H6, that the null hypothesis assumes that there is no significant relation to be found between the independent and dependent variables mentioned. The hypotheses are:

H1: Using one dimension comparisons has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a low involvement.

H2: Emphasizing a unique feature of the own product has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a low involvement.

H3: Emphasizing a unique feature of the own product has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a low involvement.

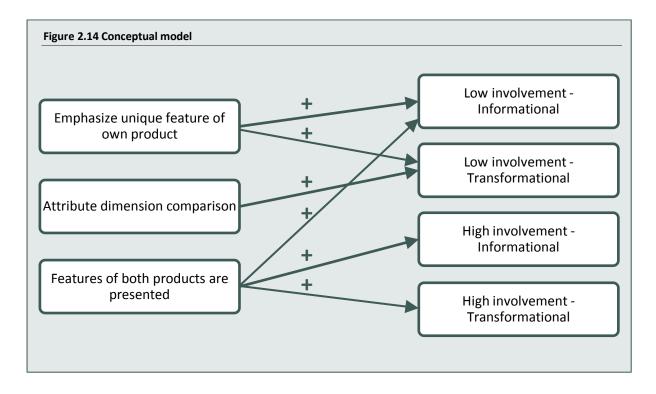
H4: Presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a low involvement.

H5: Presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a high involvement.

H6: Presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a high involvement.

### 2.8 Conceptual model

After presenting these hypotheses a conceptual model can be drawn in which all the hypotheses are visually presented. In figure 2.14 this is done. On the left you can see all the independent variables. The right column in this model shows the dependent variables within the hypotheses. The link between the two columns shows the type of relationship between the independent variables and the dependent variable.



### 3. Methods

How is data gathered and analyzed? That is the question this chapter is all about. This chapter consists of five different parts which together will provide an answer to this question. The first section (3.1) is devoted to the design. Within this part it is theoretically discussed how this research is executed. The second part of this chapter (3.2) is called procedure and materials. In this section the practical procedure of data gathering is being explained. How is the data gathered? Which practical methods are used in order to receive data which fit this research? These are the questions which the procedure section will provide an answer to. Along with the procedure, it is also important to highlight the materials which are being used. How are these materials found? How are they used in this research? And why are these particularly materials used? Questions which are important to discuss in this part of this chapter. In section 3.3 it is explained who are the desired participants for this research. From who is data wanted? A question which needs to be answered before actually gathering data. The biggest section of this chapter is section 3.4. There are multiple obstacles recognizable in this research which could influence the outcomes of the data. If these obstacles are not tackled in advance, this could become problematic for drawing conclusions about these data in the end. It therefore is an important section to reflect on within this chapter. In the last section of this chapter, section 3.5, it is explained how the hypotheses, as formulated in section 2.7 and 2.8, are tested. Which statistical tests should be used and are used on the data gathered. In this section it is stated why the statistical test chosen fits this research.

### 3.1 Design

This research will make use of a 2 x 3 x 4 within-subject design. To find out whether the advertising planning grid needs to be complemented with the different types of comparative advertisements, it is important to find out what the effects of these comparative advertisements are on brand attitude for all the different types of products. As stated in the theoretical framework, there are three different types of comparative advertisements and four types of products. The three types of comparative advertisements are: attribute dimension comparison, emphasizing on a unique feature and presenting the features of both products. The four different types of products (or quadrants) are: informational – low involvement, transformational – low involvement, informational – high involvement and transformational – high involvement. This would make this research a 3 x 4 design.

But there is more to it. As mentioned, brand attitude needs to be measured as well. And it needs to be measured on two different occasions. Before encountering an advertisement, and after encountering an advertisement. This would make it possible to see a possible shift in brand attitude

caused by a comparative advertisement. Because there are two measuring points as a result of measuring brand attitude pre-ad and post-ad, the design will become a 2 x 3 x 4 design.

There will be no distinction made between participants and what they will asked to do. Therefore, this research will make use of the so-called within subjects design experiment (Greenwald, 1976; Keren & Lewis, 1993) making this design a 2 x 3 x 4 within-subjects design.

### 3.2 Procedure and materials

Within the 2 x 3 x 4 design there are two dependent variables which need to be measured: the post-ad brand attitude and the pre-ad brand attitude. All the other variables in this research, the types of comparative advertisements and the quadrants of products, are independent and will not be measured by using participants, but by using theory.

There are twelve advertisements needed for this research which will function as the independent variables: three different types of comparative advertisements for each of the four quadrants of products. These advertisements are found on the internet. These advertisements were found by using different search terms on Google and YouTube. It might be clear that finding advertisements which follow these conditions is quite hard. There is no database to be found in which all of these advertisements are included. This made finding the right advertisements, consistent to all the conditions, a bit problematic. To overcome this problem, all the comparative which were to be found using different terms on Google and YouTube were downloaded first. In total, 49 advertisements were found in this first quest. It turned out that there were enough advertisements available to have at least one advertisement per each possible relationship. All the advertisements used are presented textually in table 3.1 on the following page. If the advertisement is a printed version (if it is not a commercial) it is also being presented in Appendix A. With each advertisement it is indicated which independent variables are being met by using this advertisement.

The dependent variables, brand attitude pre-ad and post-ad, needs to be measured. As mentioned, this will be done prior to encountering the twelve advertisements and after seeing the twelve advertisements. Each advertisement used is for a different product by a different brand. No brand is used multiple times. The brand attitude pre-ad is measured on the basis of a name, logo and a very short description (one or two sentences). The brand attitude post-ad is measured on the basis of the advertisements. By implementing these two measuring points it is possible to notice a shift in brand attitude.

Brand attitude is being measured based on five items: unappealing-appealing, undesirable-desirable, negative-positive, low quality-high quality, not advisable to choose-advisable to choose. Brand attitude is a concept which is tried to be measured numerous times in the past. It therefore has an overwhelming number of items which can be used to measure it. In total, there are 52 items

		Type of motivation					
		Informational	Transformational				
		<b>DuckDuckGo</b> On a billboard of search engine DuckDuckGo it is stated: "Google tracks you. We don't. Search better at DuckDuckGo.com	Orville Redenbacher  In an advertisement you see a comparison made between the popcorn of Orville Redenbacher and thei competitors. The same amount of popcorn by Orville i much more lighter and fluffier. That is why the stack o popcorn with them is higher.				
	Low involvement	Vicks In an advertisement by Vicks a comparison is made with Robitussin. They are stating that their medicine relieves sore throat pain for eight hours, while the medicine by Robitussin does the same for only four hours	Dunkin' Donuts  In an advertisement, which was presented online, a comparison was made with Starbucks. The results of ai independent test showed that the coffee by Dunkin' Donuts was rated higher than by Starbuck. Dunkin' Donuts used these outcomes to state the following in their ad: "in a recent national blind taste test, more Americans preferred the taste of Dunkin' Donuts over Starbucks. It is just more proof of it's all about the coffee (not the couches or music)"				
lecision		Adidas (commercial)  In a commercial you see a man running through a desert when a voiceover says: "This man runs on Nike".  Than the camera shifts over to a different position and you see a cameraman running around that guy while the voiceover goes: "the man wearing the 50 pound camera wears Adidas"	Burger King In an advertisement the hamburgers by Burger King ar compared to those of McDonald's stating there is 75% more meat in them. They show this by presenting a label with al clothing sizes and replace the M with the logo of McDonalds while the XXL is replaces by the XXL hamburger of Burger King				
Type of decision		Saab  In an advertisement Saab is comparing their new car with Volvo (which is known as a manufacturer of safe cars). This ad states: "to crash with a Volvo is extremely safe. If you're sitting in a Saab".	Apple (commercial)  A woman named Megan wants a computer. She is undecided whether she would like to buy a Windows driven PC or an Apple Macintosh. She has a lot of demands, such as no viruses, crashes or headaches. B saying this all the PC's are being eliminated and the only Macintosh there remains available by fulfilling al requirements.				
	High involvement	Nederlandse Energie Maatschappij In an ad by the Dutch utility company the Nederlandse Energie Maatschappij they compare their product with their competitors by stating the prices for their services and what you would save when you would switch to them	Samsung In an advertisement Samsung is comparing their smartphone with the Apple iPhone by comparing the features both products have				
		Verizon  Verizon is comparing their service with the same service provided by AT&T in this advertisement. They are doing this based on the coverage both companies have and stating that they have 5 times more 3G coverage than AT&T	EasyJet  In an advertisement EasyJet is comparing their products with the same products by Ryanair. They are referencing to the fact that if you would book a flight to Barcelona, Paris, Milan or Venice you would actuall go to the airports of those cities and not the airports of the adjacent cities				

which together are proving whether someone has a positive or negative attitude toward a brand (Spears & Singh, 2012). Letting every participant fill out a survey in which they would get to see twelve advertisements and let them rate 52 items for every brand twice would be too much. Therefore, a selection of items will be made here in the same way this is done by many other researchers (ibid.). This will be based on the given definition of brand attitude and how close the different items are related to this definition. The definition this research is using on brand attitude is "the way people think and feel about the products or services provided by one company". By doing so, the same reasoning as Spears & Singh (2012) is used for not using all the items there are. A lot of the 52 items mentioned relate to the user experience of the branded products rather than the attitude towards the brand itself. That is why a lot of the items were excluded quite rapidly. In the end the five items were chosen which were related the closest to the definition of brand attitude as it is being used in this research. The selected items are unappealing-appealing, undesirable-desirable, negative-positive, low quality-high quality, not advisable to choose-advisable to choose.

According to Spears & Singh (2012) previous studies on brand attitude have used seven-point semantic differential scales, as described by Osgood (1964). This research will make no difference to that and will make use of the same type of scales. What this means is that the given items, which will be used to measure brand attitude, will be answered by a seven-point range scale. For instance, score 7 with appealing will mean that the brand is very appealing, a score of 1 with this same item means that the brand is very unappealing to use. This will go for all the items given. How higher the score, how more positive it is rated.

### 3.3 Sample

This research has no particular target group which it aims for. It is all about brand attitude and the effects advertisements can have on this brand attitude. Therefore, no particular target group is defined, because everybody can be influenced by advertisements. Most of the times companies have their own target group of people when advertising a product. In this research, there is no distinction made in the targeted audiences by advertisers. Therefore, this experiment does not do so either. However, because of the situation of the researcher, which is being a graduate student in an international orientated master in the Netherlands, the respondent will be more inclined to be, but not solely, relatively young Dutch people (age 18-25).

### 3.4 Overcoming some obstacles

1

There are some factors distinguishable which can manipulate this research. These will be discussed below. The first factor is the diversity of advertisements and how these are being used. Second, the order of the advertisements used in this experiment could influence each other. Third, the length of

the experiment could influence the willingness of participants to fully complete the experiment. Fourth, during the experiment there is a possibility participants find out what the experiment is about, this could interfere with the outcomes.

## 3.4.1 Resolving the possibility that other advertorial factors influence the outcomes

To find out whether the possible change of brand attitude is only due to the comparison made in the advertisement and not because other factors which can come into play in an advertisement, a pretest was developed and set out in which the attitude towards the ad was measured. This is done by letting twenty-one people rate nine statements for each advertisement which will be used for the analysis of measuring brand attitude. The nine statements which were used came from a research on attitude towards the ad conducted by De Run (2005). He used nine statements which were to be answered on a seven point Likert scale. The items used are presented in table 3.2. For each adver-

tisement the Cronbach's alpha was calculated for these nine items in order to find out whether there is a consistency to be found between the different items asked. This is important to know because it tells us whether you are measuring what you want to measure (De Vocht, 2009; Field, 2005). The Cronbach's Alphas for all the advertisements are presented in table 3.3. As can be seen, there were four advertisements with a score below the desirable 0.7, which is defined as acceptable George and Mallery (2003). However, the lowest score was 0.66. Because this is a pre-test and these four scores are not too low, the decision is made to continue and rate the Cronbach's alphas for all the advertisements as sufficient enough in order to combine them and make one item out of nine. The

### Table 3.2 Items used to determine the attitude towards the ad, according to De Run (2005)

- 1. The advertisement is good
- 2. The advertisement is interesting
- 3. The advertisement is informative
- 4. The advertisement is appropriate
- 5. The advertisement is easy to understand
- 6. The advertisement is objective
- 7. The advertisement is distinctive
- 8. The advertisement is inappropriate (reverse scored)
- 9. The advertisement is offensive (reverse scored)

Table 3.3 Cronbach's Alpha and mean score of the advertisements used for measuring attitude towards the ad on a 7 point Likert scale

Advertisement	C. alpha	Mean
DuckDuckGo	0.83	5.11
Vicks	0.69	5.25
Adidas	0.77	4.81
Burger King	0.90	5.16
Orville Redenbacher's	0.73	4.62
Dunkin' Donuts	0.76	4.30
Saab	0.88	4.58
Nederlandse Energie Maatschappij	0.71	4.79
Verizon	0.88	4.99
EasyJet	0.73	4.78
Apple	0.71	4.75
Samsung	0.66	4.67
All advertisements combined	0.71	4.82

Cronbach's alpha for the combined items (per advertisement) is 0.71, which makes it sufficient

enough to make one variable for all the advertisement. There is no advertisement which is significantly different than most of the advertisements. The mean score of the attitude towards the ad for all the ads is 4.82 with a standard deviation of 0.29. Which means that every score for the attitude towards the ad between 4.24 and 5.4 for all the twelve advertisements falls into the normal distribution of scores (De Vocht, 2009). In table 3.3 the mean scores for the twelve advertisements are presented as well. As can be seen, there is no score outside of this normal distribution. This making the conclusion that the advertisements chosen do not significant differ from each other, which means that a possible shift in brand attitude which may be found is not influenced by the attitude towards the ad, but solely by the way a comparison is made within the ad. Please note that this reasoning is not based on an Anova Post Hoc (Bonferroni) because the data available for this test was not sufficient enough. Therefore, the choice is made to do this based on using basic statistical tests (mean and standard deviation) and using the outcomes of this to estimate whether there is a significant outlier between the used advertisements. Because this is a pre-test, it should not be a problem to conclude that the advertisements used do not significant differ from each other in such a way that this could influence the outcomes of this research in a different way than what is being researched: a shift of brand attitude as a result of a certain type of comparative advertisement for a certain type of product.

### 3.4.2 Resolving the possibility of advertisements influencing each other

Second, to overcome any effect of one advertisement having a positive influence of the next, there is made use of a randomizer (or counterbalance). The online program used for this survey will randomize the questions for different participants. This will exclude any possibility of a positive influence one advertisement could have on the next, or what is called: confounding (De Vocht, 2009; Field, 2005).

### 3.4.3 Resolving the possibility of early withdrawal

Third, a filler task is not been used in this experiment. Some initial trials with a couple of participants resulted mostly in the feedback that the online experiment took a bit too long. Most took 20 - 25 minutes to complete the experiment and stated that if they were not asked by the researcher personally to be part of a try-out they most likely would not complete the experiment. This resulting in reconsidering making use of a filler task which would make the total time being spent on the experiment much longer than 20 - 25 minutes.

There is also been a deliberate choice of having two separate measuring points in order to counter the possibility of an early withdrawal. There was also the option to have to separate experiments. However, when making two experiments and have participants to do them both with a cou-

ple of days in between the possibility is there to get a lower response because people would give up their time twice (Field, 2005).

### 3.4.4 Resolving the possibility of (un)desired answers

Fourth, extra logos and comparative advertisements are included to overcome a possibility that participants will know what the experiment is for. For every advertisement used in part two of the experiment, in part one the participant is asked to give an answer to five questions concerning the logo and short description of the brand which belong to the advertisement. This could make it easy for participants to guess what this experiment is about, which could influence the way they answer the questions.

To overcome this problem, extra logos which have nothing to do with this research are included. The same goes for a couple of extra comparative advertisements. These extra logos and advertisements, and the corresponding items, will be deleted right after collecting the data and will therefore not be any part of this research. Besides this, participants are also asked what they think the purpose of the experiment was. When giving the correct answer to this question the respondent deleted because it can then interfere with the data when he or she knows what the purpose was.

### 3.4.5 Resolving the possibility of linguistic barriers

Because the experiment is conducted in the Netherlands the online survey is in both Dutch and English. Most, but not all, participants of this experiment will be Dutch because of the situation of the researcher. The assumptions here are made that most of the non-Dutch participants will not understand Dutch and at the same time not all Dutch participants will understand English. Needless to say, it is important that participants will understand exactly what is being asked in the experiment. Therefore, to nullify any linguistic barrier, the experiment is formulated in both languages. Therefore, participants have the opportunity to choose which language they prefer when participating. By formulating everything in the exact order for both the versions (English and Dutch), the gathered results can easily be combined with each other.

### 3.5 Testing the hypotheses

1

Before the hypotheses can be tested, the different items which are used to measure brand attitude for each advertisements needs to be computed. This means that for all the five items for each brand, both before presenting an advertisement and after an advertisement, the Cronbach's Alpha needs to be measured. The outcomes of these measurements can be seen in table 3.4. As what come clear from this overview is that there is no Cronbach's Alpha lower than 0.89. According to George and Mallery (2003) this means that there is an excellent coherence between the five items for each brand. Therefore, all the items can be computed into one variable for each brand, both prior to an

advertisement (pre-ad) and after an advertisement (post-ad). In table 3.4 it is also included what the independent variables are per each advertisement used.

Table 3.4 Cronbach's Alphas and mean scores of the advertisements used for measuring brand attitude on a 7 point Likert scale							
	Type of product		Type of	Cronbach's alpha		Mean	
	Motiva- tion**	Involve- ment***	advertise- se- ment****	Pre-ad	Post-ad	Pre-ad	Post-ad
DuckDuckGo*	I	L	Е	0,95	0,96	3,27	3,96
Vicks*	I	L	F	0,93	0,94	4,57	4,44
Adidas	I	L	А	0,96	0,96	5,37	4,88
Orville Redenbacher*	Т	L	Е	0,94	0,97	3,78	4,17
<b>Dunkin' Donuts</b>	Т	L	F	0,94	0,96	4,39	4,31
Burger King*	Т	L	А	0,95	0,96	3,92	3,85
Saab	I	Н	E	0,94	0,96	4,24	4,46
Nederlandse Energie Maatschappij*	I	Н	F	0,93	0,96	3,52	3,88
Verizon	I	Н	А	0,93	0,97	3,73	4,80
Apple	Т	Н	E	0,92	0,97	5,25	4,84
Samsung*	Т	Н	F	0,95	0,97	5,41	5,13
EasyJet	Т	Н	А	0,89	0,94	4,00	4,38

<sup>\*</sup> advertisements used for testing hypotheses

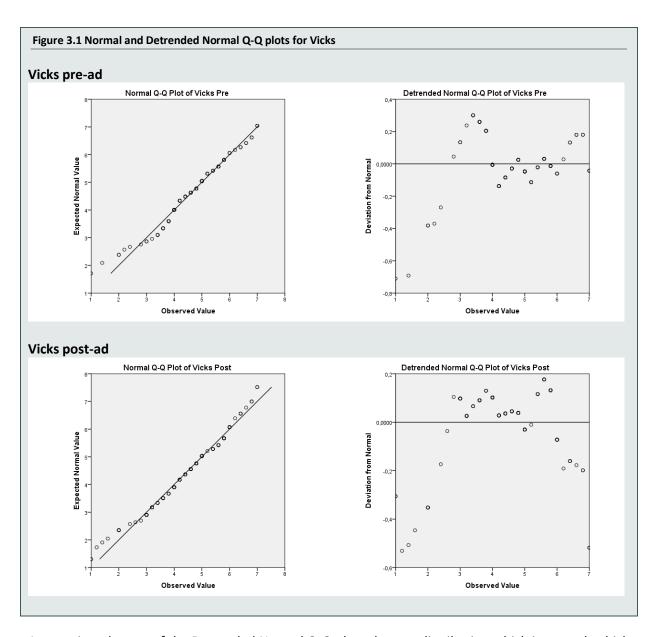
The hypotheses will be tested using a Wilcoxon signed ranks test. Although the design of this research would suggest a general linear model test, De Vocht (2009) and Field (2005) are recommending something different. As mentioned, two measuring points are incorporated within this experiment. One prior to encountering an advertisement, one after have seen a comparative advertisement. It is suggested by De Vocht (2009) and Field (2005) that when wanting to find out whether a shift in outcomes is significant between two measuring points you need to make use of a paired samples T test. However, there are some conditions which need to be met before this test can be used effectively (ibid.). One of these conditions is that the sampling distribution for the tested variables is normal. To find out whether this is the case with the variables used in this research all the variables are tested using Normal and Detrended Normal Q-Q plots (ibid.). In Appendix B the plots are included for all the advertisements. Below this paragraph, in figure 3.3 the plots for Vicks are presented as an example which will be discussed here. If there is a normal distribution the dots visible in the Normal Q-Q plots should create a linear line (De Vocht, 2009). As can be seen for both the pre-ad and post-ad this is the case for both plots. As for the Detrended Normal Q-Q plots, the dots should be nearby or on the horizontal line without creating a systematic pattern (ibid.). When taking

<sup>\*\*</sup> I = Informational, T = Transformational

<sup>\*\*\*</sup> L = Low involvement, H = High involvement

<sup>\*\*\*\*</sup> E = Emphasize unique feature, F = Features of both products presented, A = Attribute dimension comparison

a look at the plots for Vicks in figure 3.1 it can be seen that this is not normally distributed. The dots are not nearby the horizontal line. Moreover, there is also a bit of a systematic pattern to be found within these two plots. This does not only counts for the plots by Vicks. All the Normal Q-Q plots in Appendix B shows us that all the dots are more or less creating a linear line as how it supposed to be if the distribution is normal. However, none of the Detrended Normal Q-Q plots shows that the variables have a normal distribution. Likewise to the Detrended Normal Q-Q plots by Vicks each plot shows that the dots are not close by or on the horizontal line, or that they show a systematic pattern, or both.



As mentioned, none of the Detrended Normal Q-Q plots shows a distribution which is normal, which means that the conditions of the paired samples T test is not met and therefore the Wilcoxon signed rank test needs to be used. Because none of the Detrended Normal Q-Q plots shows a normal distri-

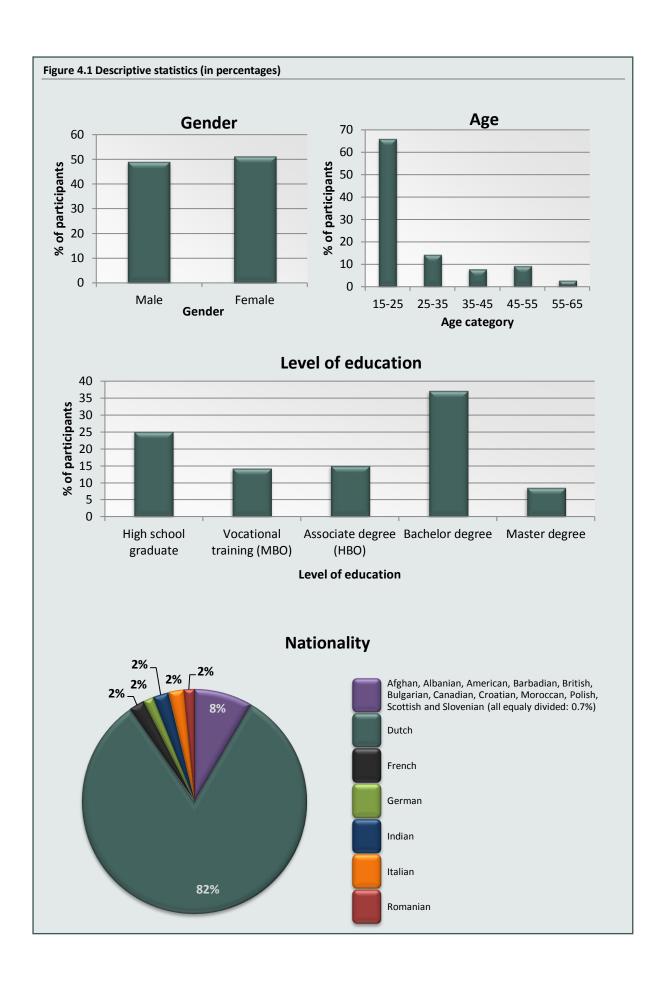
bution, according to De Vocht (2009), an alternative test needs to be used. They suggest the use of the Wilcoxon signed rank test because it does the exact same thing as the paired samples T test but it takes into consideration the absent of a normal distribution in outcomes for the tested variables (ibid.). The outcomes for the complete Wilcoxon signed ranks test is included in Appendix C. With each hypothesis discussed, in chapter four, a small part of this complete table is presented separately.

### 4. Results

How to use comparative advertising for different types of products? This is the sixth sub question formulated in the introduction. This chapter is in its total devoted to this question. It consists of three sections. In section 4.1 some descriptive statistics are presented. In this part it is discussed who the participants are. This is done on four different levels: gender, age, nationality and education. Section 4.2 is where it is all about. In this section the six formulated hypotheses, as in section 2.7, are tested, in the way it is discussed in section 3.5. Per each hypothesis it is explained how the two independent variables can be retrieved in the used advertisement. After doing so, the dependent variables and the statistical tests are presented. This giving each hypothesis a complete overview of information needed in order to conclude whether the hypothesis is accepted or rejected. After discussing all the six hypotheses a small sidetrack is realized by also discussing the six different options which are not tested using hypotheses. This will be done in section 4.3. Please note that this is not part of the research, but it can give some valuable information for the concluding chapter.

### 4.1 Descriptive statistics

In total 140 people participated in this experiment. Of which 48.9% was male, against 51.1% being female. Mostly younger people have participated in this experiment. 65.7% was 24 years old or younger. As mentioned before, this is the result of the situation the researcher is in, being a student in an international study in the Netherlands. This also explains the variety in nationalities between the participants. The biggest group of participants is Dutch (81.8%). The other 18.2% consists of seventeen other nationalities: Afghan, Albanian, American, Barbadian, British, Bulgarian, Canadian, Croatian, Moroccan, Polish, Scottish and Slovenian (each 0.7%). German and Romanian (both 1.5%). French, Indian and Italian (each 2.2%). As for the level of education, it turns out the biggest group of people, 37.1%, has completed a bachelor's degree. This in contrast to being a high school graduate (25%), vocational training (the Dutch MBO) (14.3%), associate degree (the Dutch HBO) (15%) and master's degree (8.6%). Because discussing these descriptive statistics can be a lot of information to digest at once, all these statistics are visualized in figure 4.0. As for the gender, age and level of education, these are presented in different bar charts. It is chosen to use these charts because they also tells something about the distribution of the variety in the personal characteristics of the participants. The nationality is presented using a pie chart. This is because a bar graph would not give any information because there is one nationality (Dutch) which has a much bigger amount of participants in contrast to the rest. It is therefore chosen to use a pie chart in this matter. It is still visible that the Dutch nationality is way bigger than the other nationalities, but these other nationalities are now still visible.



### 4.2 Testing hypotheses

After discussing the descriptive statistics, the data collected using the experiment can now be used to test the six hypotheses. Each hypothesis will be discussed individually in different sections. As mentioned, the output of the complete Wilcoxon signed rank test for every combination of independent variables is presented in Appendix C. However, per each hypothesis discussed below, a small part, depending on which independent variables are being tested, will be highlighted in these sections as well. In each section the hypothesis is being presented once again as a reminder to indicate what is being tested. The advertisement which belong to the independent variables within the hypothesis is being presented and discussed briefly. After that is done the outcomes of both the descriptive tests and the Wilcoxon signed rank test is being discussed. The descriptive tests are being used to mention the means for the pre-ad brand attitude and the post-ad brand attitude. At the end of each section it is concluded whether the null hypothesis is being rejected or approved and thus concluding whether there is a relationship to be found between the independent variables and brand attitude.

## 4.2.1 Attribute dimension comparisons for transformational products of a low involvement

The first hypothesis (H1) which is tested states: using one dimension comparisons has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a low involvement. The concepts in this hypothesis were measured by using an advertisement of Burger King. Burger king was founded in 1954 and became the second largest fast food chain in the world, after McDonalds. Both fast food chains are known for their hamburgers (Burger King, n.d.). Hamburgers are bought for self-enrichment, not because you absolutely need

them. This makes hamburgers transformational products. Besides being transformational they are also low involved: not a lot of effort is needed before choosing which burger to buy. The advertisement used is presented in figure 4.1 and is a direct comparison with McDonalds by showing their logo in it as well.

This advertisement has no influence on brand attitude for Burger King. In the pre-ad test it turns out that Burger King scored a 3.92 on a seven



point brand attitude scale. Meaning that Burger King was rated just below neutral. In the post-ad test Burger King scored a 3.85. This shows that there was a small decrease of brand attitude for

Burger King after the comparative advertisement was shown. In table 4.1 the output of the Wilcoxon signed rank test for this advertisement is presented. This shows that there is no significant difference in outcomes between the brand attitude pre-ad and post-ad. Meaning that H1 is rejected and the null hypothesis to H1 is not disproved: there is no significant positive relationship between using a one dimension comparison advertisement and brand attitude for products which are transformational and of a low involvement.

Table 4.1 Wilcoxon signed rank test Burger King					
	Z	Asymp. Sig. (2-tailed)			
Burger King post - pre	135	.892			

## 4.2.2 Emphasizing a unique feature for informational products of a low involvement

The second hypothesis (H2) which is tested states: emphasizing a unique feature of the own product has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a low involvement. The concepts within this hypothesis were measured by using an advertisement by DuckDuckGo. Just as Google, DuckDuckGo is an online search engine. In contrast to Google, DuckDuckGo uses different algorithms for used keywords. Most primarily, it uses information coming from crowdsourced websites, such as Wikipedia (DuckDuckGo, n.d.). Being a search engine makes the product provided by DuckDuckGo informational, because it is used to solve a problem. Because it does not takes a lot of effort choosing a search engine, it also

functions as a low involvement product. The advertisement used is presented in figure 4.2 and is a direct comparison with Google by referencing them in the ad.

This advertisement has a significant relationship on brand attitude for DuckDuckGo. In the pre-ad test it turns out that DuckDuckGo scored a 3.27, which can be seen as a slight



negative brand attitude. In the post-ad measurement, DuckDuckGo scored a 3.96, which can be interpreted as neutral. This shows a increase of brand attitude for DuckDuckGo as a result of the advertisement. In table 4.2 the output of the Wilcoxon signed rank test for this advertisement is presented. This shows that there is a significant difference in outcomes between the brand attitude pre-ad and post-ad. This meaning that the null hypothesis is disproved. The means for the pre-ad and post-ad shows that the brand attitude is increased after seeing the comparative advertisement.

This means that there is a positive relationship between the comparative advertisement and brand attitude for DuckDuckGo. Therefore H2 is accepted: there is a significant positive relationship between a comparative advertisement which emphasizes on a unique feature of the own product and brand attitude for products which are informational and of a low involvement.

Table 4.2 Wilcoxon signed rank test DuckDuckGo				
	Z	Asymp. Sig. (2-tailed)		
DuckDuckGo post - pre	-5.606	.000		

## 4.2.3 Emphasizing a unique feature for transformational products of a low involvement

The third hypothesis (H3) which is tested states: emphasizing a unique feature of the own product has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a low involvement. The concepts within this hypothesis were measured by using an advertisement by Orville Redenbacher. Orville Redenbacher, founded in 1969, is a company completely focused in the production of popcorn (Orville Redenbacher, n.d.). From the beginning they have always tried to position themselves as a brand for popcorn with the lightest and fluffiest popcorn (ibid.). Popcorn is a product which is transformational: it is bought for self-enrichment, you want the popcorn, it is not a product which you absolutely need. It also functions as

a low involvement product, because it does not takes a lot of effort for a consumer to choose which popcorn you would like. The advertisement used is presented in figure 4.3 and is an indirect comparison with their competitors.

This advertisement has significant relationship brand attitude Orville on for Redenbacher. In the pre-ad test it turns out that Orville Redenbacher scored a 3.78, which can be seen as a slight negative brand attitude. In the post-ad measurement, Orville Redenbacher scored a 4.17, which can be interpreted as sligthly better than neutral. This shows a small increase of brand attitude for Orville Redenbacher as a result of the advertisement. In table 4.3 the output of the Wilcoxon



signed rank test for this advertisement is presented. This shows that there is a significant difference in outcomes between the brand attitude pre-ad and post-ad. This meaning that the null hypothesis

is disproved. The means for the pre-ad and post-ad shows that the brand attitude is increased after seeing the comparative advertisement. This means that there is a positive relationship between the comparative advertisement and brand attitude for Orville Redenbacher. Therefor H3 is accepted: there is a significant positive relationship between a comparative advertisement which emphasizes on a unique feature of the own product and brand attitude for products which are transformational and of a low involvement.

Table 4.3 Wilcoxon signed rank test Orville Redenbacher				
	Z	Asymp. Sig. (2-tailed)		
Orville Redenbacher post - pre	-3.876	.000		

## 4.2.4 Presenting features of both products for informational products of a low involvement

The fourth hypothesis (H4) which is tested states: presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a low involvement. The concepts within this hypothesis were measured by using an advertisement by Vicks. Vicks, founded in the 1890s, is one of the oldest companies which manufactures and sells medicine. They are mostly known for their "over-the-counter" medicines for coughing, colds and the flu (Vicks, n.d.). These types of medicines are informational: you buy them because you need them against a certain problem you have (a cold, coughing or the flu). These medicines are relatively cheap to buy. It does not cost you a lot of effort to buy them. It therefore also functions as a low involvement product. The

advertisement used is presented in figure 4.4 and is a direct comparison with their competitor Robitussin.

This advertisement has no significant relationship with brand attitude for Vicks. In the pre-ad test it turns out that Vicks scored a 4.57, which can be seen as a slight positive brand attitude. In the postad measurement, Vicks scored a 4.44, which still can be interpreted as slight



positive attitude. This shows a very small decrease of brand attitude for Vicks as a result of the advertisement. In table 4.4 the output of the Wilcoxon signed rank test for this advertisement is presented. This shows that there is not a significant difference in outcomes between the brand attitude pre-ad and post-ad. This meaning that the null hypothesis cannot be rejected. Therefore, H4

cannot be accepted and will be rejected: there is no significant positive relationship between a comparative advertisement which presents features of both products and brand attitude for products which are informational and of a low involvement.

Table 4.4 Wilcoxon signed rank test Vicks					
	Z	Asymp. Sig. (2-tailed)			
Vicks post - pre	929	.353			

## 4.2.5 Presenting features of both products for informational products of a high involvement

The fifth hypothesis (H5) which is tested states: presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a high involvement. The concepts within this hypothesis were measured by using an advertisement by the Nederlandse Energie Maatschappij (a Dutch electric utility). Founded in 2005, the Nederlandse Energie Maatschappij is the biggest independent electric utility in the Netherlands and is the fourth electric utility in the Netherlands (Nederlandse Energie Maatschappij, n.d.). Taking on a contract with an electric utility is a product which you need, it therefore is a product which is informational. A contract like this is something which you put a lot of effort in before actually choosing a contract. In other words: it also functions as a high involvement product. The advertisement used is presented in figure 4.5 and is a direct comparison with the three competitors of the Nederlandse Energie Maatschappij which are

bigger then themselves on the Dutch market: Nuon, Essent and Eneco. The heading of the advertisement states (translated): "who is the cheapest?". Below that a comparison is made between all the four utility companies based on the costs for house of 1,850m<sup>3</sup> and 3,500 kWh in the province of Friesland (in the north of the Netherlands). Below the colored boxes it is calculated what a consumer would pay with each of the utility companies with these details. At the bot-



tom of the ad it is calculated how much you would save as a consumer when you would switch over to the Nederlandse Energie Maatschappij.

This advertisement has a significant relation-ship on brand attitude for the Nederlandse Energie Maatschappij. In the pre-ad test it turns out that the Nederlandse Energie Maatschappij scored a 3.52, which can be seen as a slight negative brand attitude. In the post-ad measurement, the Nederlandse Energie Maatschappij scored a 3.88, which can be interpreted as just below neutral. This shows a increase of brand attitude for the Nederlandse Energie Maatschappij as a result of the advertisement. In table 4.5 the output of the Wilcoxon signed rank test for this advertisement is presented. This shows a significant difference in outcomes between the brand attitude pre-ad and post-ad. This meaning that the null hypothesis is disproved. The means for the pre-ad and post-ad shows that the brand attitude is increased after seeing the comparative advertisement. This means that there is a positive relationship between the comparative advertisement and brand attitude for the Nederlandse Energie Maatschappij. Therefore H5 is accepted: there is a significant positive relationship between a comparative advertisement which presents features of both products and brand attitude for products which are informational and of a high involvement.

Table 4.5 Wilcoxon signed rank test Nederlandse Energie Maatschappij				
Z Asymp. Sig. (2-tailed)				
Nederlandse Energie Maatschappij post - pre	-3.724	.000		

## 4.2.6 Presenting features of both products for transformational products of a high involvement

The sixth hypothesis (H6) which is tested states: presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a high involvement. The concepts within this hypothesis were measured by using an advertisement by Samsung, Samsung Electronics to be more precise. Samsung Electronics is the flagship subsidiary of Samsung. It is specialized in all sorts of high tech electronica and digital media. Since a couple of years, Samsung Electronics specialized themselves in smartphones as well. They became a worldwide market leader with their smartphones (Samsung, n.d.). These smartphones fall into the category of being transformational products. Smartphones are not necessarily needed and they are really bought because you want one for self-enrichment. They are also relatively expensive. Before buying a smartphone, many costs are made. Either in financial costs (buying the product) and/or in time (choosing the product). In other words: a lot of effort is put in before buying it. It therefore belong to the high involvement products. The advertisement used is presented in figure 4.6 and is a direct comparison with the biggest competitor of Samsung Electronic's smart-phones: Apple with their apple iPhone.

This advertisement has а significant relationship on brand attitude for Samsung. In the pre-ad test it turns out that Samsung scored a 5.41, which can be seen as a reasonable positive brand attitude. In the post-ad measurement, Samsung scored a 5.13, which can still be interpreted as a positive attitude. However it is still positive, this do shows us that there is a decrease of brand attitude for Samsung as a result of the advertisement. In table 4.6 the output of the Wilcoxon signed rank test for this advertisement is presented. This shows that there is a significant difference in outcomes between the brand attitude pre-ad and post-ad. This meaning that the null hypothesis is disproved. The means for the pre-ad and post-ad shows that the brand attitude is decreased after seeing the comparative advertisement. This



means that there is a negative relationship between the comparative advertisement and brand attitude for Samsung. Therefore, not only the null hypothesis is rejected, H6 is rejected as well: there is a significant negative relationship between a comparative advertisement which presents features of both products and brand attitude for products which are transformational and of a high involvement.

Table 4.6 Wilcoxon signed rank test Samsung				
	Z	Asymp. Sig. (2-tailed)		
Samsung post – pre	-3.043	.002		

### 4.3 A small side path: some more testing

As mentioned within the method section (chapter 3) not six, but twelve comparative advertisements were used in this experiment. The remaining advertisements which were not tested above will be tested here simultaneously. It should be noted that this is not a part of the research question. It is just a bit of extra testing because the data needed for this is available. The following six advertise-

ments are relationships of the same kind as the hypothesized relationships. These were not hypothesized because the theory used within the theoretical framework did not provided a good reason to do include these relationships within this research. In table 4.7 these non-hypothesized relationships are presented shortly by mentioning the independent variables (type of motivation, type of involvement and type comparative advertisement). Also, in the last column it is displayed which advertisement embodies these independent variables.

Table 4.7 Independent variables per each non hypothesized advertisement with a significant result on brand attitude					
Type of product					
Motivation	Involvement	Type of advertisement	Advertisement by		
Informational	Low involvement	Attribute dimension comparison	Adidas		
Transformational	Low involvement	Features of both products presented	Dunkin' Donuts		
Informational	High involvement	Emphasize unique feature	Saab		
Informational	High involvement	Attribute dimension comparison	Verizon		
Transformational	High involvement	Emphasize unique feature	Apple		
Transformational	High involvement	Attribute dimension comparison	EasyJet		

With this information it is possible to test whether the types of advertisements have a positive influence on brand attitude for the different types of products. Because the theoretical framework showed that these independent variables should not have a significant influence on brand attitude all the relationships described above are tested with the null hypotheses: no relation is there to be found with these combinations of independent variables on brand attitude. In table 4.8 the means are presented for each brand both pre-ad and post-ad.

Table 4.8 Means for brand attitude for the brands within relationships that are non-hypothesized				
	Mean			
	Pre-ad	Post-ad		
Adidas	5,37	4,88		
Dunkin' Donuts	4,39	4,31		
Saab	4,24	4,46		
Verizon	3,73	4,80		
Apple	5,25	4,84		
EasyJet	4,00	4,38		

These means are of course already showing an increase or decrease in brand attitude after the comparative advertisement was presented. It does not however show whether the increase or decrease in brand attitude is significant. Likewise to how this is been tested with the six hypotheses above, this also needs to be tested using the Wilcoxon signed rank test. These outcomes already have been presented in Appendix C, but will also be presented in table 4.9 once again.

The outcomes of the test shows that there is one null hypothesis which needs to be accepted. That is the null hypothesis that belongs to the advertisement by Dunkin' Donuts, meaning that there is no significant relationship between a comparative advertisement which presents features of both products and brand attitude for products which are transformational and of a low involvement.

Table 4.9 Wilcoxon signed rank tests				
	Z	Asymp. Sig. (2-tailed)		
Adidas post - pre	-3.947	.000		
Dunkin' Donuts post - pre	-7.14	.475		
Saab post - pre	-2.612	.009		
Verizon post - pre	-8.084	.000		
Apple post - pre	-3.190	.001		
EasyJet post - pre	-4.131	.000		

There are however five significant levels which are under 5%, meaning that there is a significance between the independent variables and the dependent variable measured. These were measured by using advertisements by Adidas, Saab, Verizon, Apple and EasyJet. In table 4.10 the relationships are presented. It is also mentioned whether this is a positive or negative relationship. This is concluded by using table 4.8. If the mean is lower post-ad than it was pre-ad, and the relationship is significant, the relationship is of a negative nature. This also counts for the opposite.

Table 4.10 Significant results found in the non-hypothesized relationships			
Advertisement	Relationship found		
Adidas	There is a significant negative relationship between using a one dimension comparison advertisement and brand attitude for products which are informational and of a low involvement		
Saab post	There is a significant positive relationship between a comparative advertisement which emphasizes on a unique feature of the own product and brand attitude for products which are informational and of a high involvement		
Verizon post	There is a significant positive relationship between using a one dimension comparison advertisement and brand attitude for products which are informational and of a high involvement		
Apple	There is a significant negative relationship between a comparative advertisement which emphasizes on a unique feature of the own product and brand attitude for products which are transformational and of a high involvement		
EasyJet	There is a significant positive relationship between using a one dimension comparison advertisement and brand attitude for products which are transformational and of a high involvement		

### 5. Conclusion

After discussing the theory this research was based on, the methods which were used in conducting this research and the actual findings in the results chapter, it is now time to conclude this research paper by answering the last sub question (number seven). This question stated: are the existing advertising planning grids complete or are additions needed in the scope of comparative advertising? If so, how? By answering this sub question, while the other six sub question already have been answered, the research question this paper was all about, is also being answered. This research question will be repeated here one more time:

To what extent is brand attitude, for different types of products, influenced by different types of comparative advertisements and does this calls for a change in the advertising planning grids?

This chapter will not only provide answers to both this research question and the sub question, it will also go deeper into some other aspects. It will use a structured outline. As can be seen from the research question it actually consists out of two parts. The first part of this question asks whether different types of comparative advertisements would have an effect on brand attitude for different types of products. This part of the research question is answered in section 5.1. In section 5.2 the second part of the research question will be answered. As can be seen above this part goes into the advertising grids and if changes are needed as a result of this research. This is also in line with the seventh sub question. Not only will this section go into the implications for the existing literature, it will also discuss what the implications of this research are for the practice. By discussing sections 5.1 and 5.2 the empirical part of this research is closed. Section 5.3 will go deeper into the methodological part of this research by highlighting some known limitations of this research. In section 5.4 it is briefly discussed what the opportunities are for future research as a result of this research.

### 5.1 The effects of comparative advertising (RQ part 1)

Four out of the six tested hypotheses had a significant result. These were H2, H3, H5 and H6:

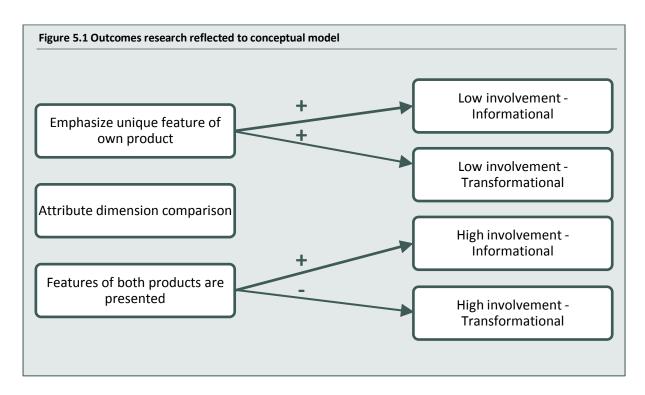
H2: emphasizing a unique feature of the own product has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a low involvement.

H3: emphasizing a unique feature of the own product has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a low involvement.

H5: presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are informational and of a high involvement.

H6: presenting features of both the products of the own brand as well as the competitive brand has a significant positive relationship in terms of brand attitude for the advertised brand's products which are transformational and of a high involvement.

Although H6 showed a significant result, it was a negative result. This hypothesis was tested using an advertisement by Samsung. The results showed a decrease in brand attitude after the advertisement was presented to the audience. This leaves us with three significant results which were of a positive nature. H2 was tested with an advertisement by DuckDuckGo. H3 was tested with an advertisement by Orville Redenbacher. And H5 was tested with an advertisement by the Nederlandse Energie Maatschappij. Now the outcomes of these tested hypotheses are known, the conceptual model, as presented in section 2.7, can be presented here once again. However, it will now not be conceptual anymore, but factual. Based on the outcomes of this research. This is presented in figure 5.1.



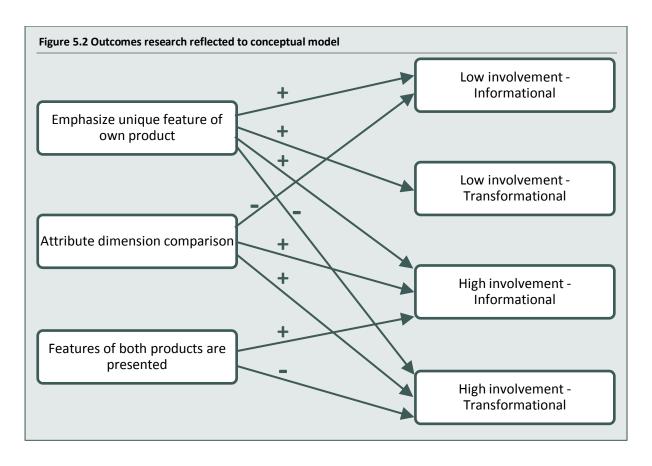
### 5.1.1 A small side path

As what has been discussed in section 4.3, there were more advertisements tested, but they are not a part of this research in a way that these advertisements were used for hypotheses. However, because these advertisements were tested as being hypotheses they can be reflected to this model above as well. All of these advertisements also embody a type of advertisement for a certain type of product. Please note that this is not a part of this research, but this information is given for two reasons. First, it is food for thought where it can function as extra information for researchers when they would like to continue research on this topic. Second, because the information is available it would be a waste to not mention the outcomes.

Five out of the six advertisements which were tested, but not hypothesized, showed a significant result. Two of them were however of a negative nature: the advertisements by Adidas and Apple. The advertisements by Verizon, Saab and EasyJet all showed a positive significant result. Before being to incorporate these outcomes to the reviewed conceptual model, it is important to see which independent variables these advertisements embodied in order to measure brand attitude. In table 5.1 these independent variables are displayed per advertisement.

Table 5.1 Independent variables per each non hypothesized advertisement with a significant result on brand attitude				
	Type of product			
	Motivation	Involvement	Type of advertisement	
Adidas	Informational	Low involvement	Attribute dimension comparison	
Saab	Informational	High involvement	Emphasize unique feature	
Verizon	Informational	High involvement	Attribute dimension comparison	
Apple	Transformational	High involvement	Emphasize unique feature	
EasyJet	Transformational	High involvement	Attribute dimension comparison	

After presenting table 5.1, figure 5.2 can be referred to directly. Within this figure the conceptual model is supplemented once again. This model shows that by including the non-hypothesized relationships the model looks way more complicated because twice as much positive significant results are incorporated in this model. As well as two extra negative significant outcomes. This makes the model more elaborate, which shows more opportunities, but also more pitfalls. As mentioned, this model is to showcase the complete results of the experiment conducted. It will not be a part for answering the research question. However, in the following section it will once again be included within a smaller section which is again devoted to a small side path.



### 5.2 Implications on theory and practice (RQ part 2)

The second part of the research question was devoted to what the implications the outcomes of the first part of the research question have on the existing theory, the advertising planning grids. This is being discussed in this section. It is mentioned a couple of times that the Rossiter-Percy grid is being considered as the more complete grid. Therefore, only this grid is being discussed within this section. By doing so the implications on theory are being discussed. After this is done, the implications on the practice are also discussed briefly. Thereby the relevance of this research, as discussed in section 1.5, is being stressed one more time.

### **5.2.1** Implications on theory

When reflecting the outcomes of this research on the Rossiter-Percy grid it is evident that changes will not be made on the content which is presented in the grid itself, but on the recommendations given by Rossiter et al. (1991) on how to advertise when determined which type of products you try to sell. This is done in figure 5.3. It was discussed extensively in section 2.4 for each quadrant distinguishable on how to advertise for certain types of products. There are four alterations to be made to this figure concerning the outcomes of this research. First, Rossiter et al. (1991) recommended comparative advertisement solely for products which are high involved and informational. The outcomes of this research showed that comparative advertising is not only to be used within this quadrant.

Moreover, there are multiple types of comparative advertisements to be found. Not just one as Rossiter et al. (1991) are suggesting. Therefore, this recommendation is deleted. Second, there are three additions done within this grid. This is in line with the three significant positive outcomes on relationships as described in sections 4.2 and 5.1. It is mentioned there that advertisements in which a comparison is made by emphasizing a unique feature of the own branded product in contrast to the

Figure 5.3 How to advertise for different types of products Type of motivation Informational **Transformational** .ow involvement - The benefit which needs to be emphasized The ad should use a simple problemis emotional authenticity solution formats - This emotion needs to be unique to the - The ad does not have to be liked by evervone - The ad must be liked by the targeted - The ad should at least stresses one benefit audience from using the product in the ad The brand needs to be associated with the ad implicitly - The benefits shoud be claimed extremely - The benefits should be easy to remember - Repetition is the key by making the same kind of advertisements - In the ad a comparison can be made with products by competitors in which a unique - In the ad a comparison can be made with products by competitors in which a unique feature of the own product is emphasized feature of the own product is emphasized Type of decision Correct emotional portrayal is very important if the product is in the early stages of the life cycle - The points made in the ad need to be accepted, but does not have to be liked - Emotional authenticity is paramount. This should be tailored to certain groups within - The initial attitude toward the brand is the the target group overriding consideration People should be able to identify - A small exaggeration is desired, but do not themselves with the product overclaim the features - The advertisements should provide - The claimed benefits need to be information convincing (do not underclaim) - It is recommended to overclaim, but do - A refutational approach needs to be not underclaim considered when the target audience has **High involvement** objections Repetition, in slightly different ways, is important and serves as reinforcement - In the ad a comparison can be made by presenting the features of the own branded product as well as for the competitive branded products which has the same functions

branded product by a competitor has a positive influence on brand attitude for the company who sponsored the ad. This goes for products that are low involved, both informational and transformational. Last significant positive result found was the relationship between comparative advertisements which presents the features of the own product as well as the competitive product for products which are high involved and transformational. These outcomes are included in figure 5.3.

This figure shows a more complete grid on how to advertise according to the Rossiter-Percy grid because it includes the significant positive relationships which were found testing the different hypotheses in this research. Combining this figure with the grids of brand awareness (figure 2.4) and brand attitude (figure 2.5) as discussed with the Rossiter-Percy grid in the theoretical framework this grid supplements the existing theory by Rossiter et al. (1991) and it thereby is an answer to the second part of the research question.

### 5.2.1.1 A small side path

Likewise to the first part of this conclusion, a small side path can be taken once more by also taking the non-hypothesized relationships into account. These relationships have been discussed more extensively in section 5.1.1. In short, there were three relations found in the tests outside of this research which were also of a significant positive relationship. The first one was the use of a comparative advertisement in which a branded product is compared to a competitive product based on a unique feature which is absent with the competitive product for products that are informational and high involved. The other two significant positive relationships are the use of comparative advertisements in which the own branded product is compared to one of the competitors based on a single dimension for products that are high involved, both informational and transformational. In figure 5.4 (on the following page) these relationships are included in the recommendations and considerations grid as how it was presented in figure 5.3.

### **5.2.2** Implications on practice

The implications on the practice are less extensive as for the theory. But there are still some implications to be mentioned. First, this research shares a new light on how to use comparative advertising. Not all comparative advertisements have the desired success. Some advertisements even backfired by showing a significant negative relationship. For practitioners in the field of advertising, the outcomes of this research tells them why they succeeded or failed using certain comparative advertisements to promote certain types of branded products.

Second, when a company wants to determine a marketing strategy in which the use of advertisements is wanted, they could see if it is wise for them to use comparative advertisements. This all depends on the types of products they try to sell. Once determined which quadrant their product

belong to, they now have, depending on the quadrant, at least one option for using a type of comparative advertisement which showed to be successful for that specific quadrant of products.

Figure 5.4 How to advertise for different types of products

### Type of motivation

### Informational

### Type of monv

### **Transformational**

## Low involvement

- The ad should use a simple problemsolution formats
- The ad does not have to be liked by everyone
- The ad should at least stresses one benefit from using the product in the ad
- The benefits shoud be claimed extremely
- The benefits should be easy to remember
- In the ad a comparison can be made with products by competitors in which a unique feature of the own product is emphasized

- The benefit which needs to be emphasized is emotional authenticity
- This emotion needs to be unique to the brand
- The ad must be liked by the targeted audience
- The brand needs to be associated with the ad implicitly
- Repetition is the key by making the same kind of advertisements
- In the ad a comparison can be made with products by competitors in which a unique feature of the own product is emphasized

## Type of decision

- Correct emotional portrayal is very important if the product is in the early stages of the life cycle
- The points made in the ad need to be accepted, but does not have to be liked
- The initial attitude toward the brand is the overriding consideration
- A small exaggeration is desired, but do not overclaim the features
- The claimed benefits need to be convincing (do not underclaim)
- A refutational approach needs to be considered when the target audience has objections
- In the ad a comparison can be made by presenting the features of the own branded product as well as for the competitive branded products which has the same functions
- In the ad a comparison can be made with products by competitors in which a unique feature of the own product is emphasized
- In the ad a comparison can be made with products by competitors based on one single dimension

- Emotional authenticity is paramount. This should be tailored to certain groups within the target group
- People should be able to identify themselves with the product
- The advertisements should provide information
- It is recommended to overclaim, but do not underclaim
- Repetition, in slightly different ways, is important and serves as reinforcement
- In the ad a comparison can be made with products by competitors based on one single dimension

# High involvement

### 5.3 Limitations

This research has a couple of limitations. These are the advertisements used in the experiment, the types of comparative advertisements used in this research, and the sample size. These limitations will be subsequently discussed below.

### 5.3.1 Advertisements used in testing

The number of advertisements used in the experiment is a limitation in this research. It is attempted to exclude any other possible influences on brand attitude to find out whether the advertisements differ significant from each other using the pre-test in which attitude towards the ad was measured. It turned out no significant outcomes were measured in this pre-test. However, the advertisements used were by real brands and were advertisements that have been used in the past. Because these brands were already known this could have had an effect on brand attitude pre-ad and post-ad due to experiences. This could interfere with the outcomes. The only possibility to overcome this problem was to use non-existing ads and brands in this experiment. However, due to time restraints of this research it was decided to use existing advertisements and run a pre-test on attitude towards the ad to exclude as much interference as possible.

### 5.3.2 Types of comparative advertisements

Second, there are more types of comparative advertisements distinguishable. These were discussed in the theoretical framework, but due to limited time options these were not tested. It was in my believe that if these types were included as well the experiment became too big to gain enough participants in order to have some valid conclusion. That is why the choice was made not to incorporate both theories surrounding the types of comparative advertisements. This is however a limitation because it does not complete the advertising planning grids to the fullest extent possible with comparative advertising.

### **5.3.3 Sample**

The third limitation distinguishable is of a methodological character. As presented, the sample size of this research is not normally distributed. Mostly young Dutch people have participated in this research. This does not have to be a limitation in itself, but it is a small limitation within this research because a normal distribution of the sample size is desired when there is no target group. Now almost 82% of all participants were Dutch while the other 18% consists of a total of seventeen nationalities. It was not only the nationalities which were not normally distributed, the same goes for the age categories. While there were a number of people with an age between 55 and 65 who completed the experiment, there were over 65% of the participants who were in the lowest age category

(between 15-25 To overcome this problem, a different statistical test was used which takes into account that the sample size, as well as the outcomes, were not normal distributed.

### **5.4 Future research**

In an extend to these limitations future research could benefit the advertising planning grid and this research to keep on making these grids more and more complete. As mentioned, this research is not complete. Out of the two theories discussed which are defining the different types of comparative advertisements, only one is included within this research. In order to make a better differentiation on comparative advertisements and what does and does not work for gaining a better brand attitude, future research is recommended in which the theory by Zhang et al. (2002) is included.

Another reason for future research is to overcome the limitation of the sample size. In this research 65% of all the respondents has an age under 25. Although this does not have to be a problem, it could interfere with the outcomes for certain brands. Example given: Saab. The assumption can be made that most of these people do not have the resources to buy a new car of this type. Therefore, their perception could be different than from the people that are actually able to buy a car. So by including a more diverse sample in future research, it could strengthen the conclusions made.

### 6. References

### Α

Arens, W. F., Weigold, M. F., & Arens, C. (1996). Contemporary advertising. Chicago: Irwin.

Armstrong, G., & Kotler, P. (2000). Marketing: an introduction. New Jersey: Prentice Hall.

Ash, S. B., & Wee, C. H. (1983). Comparative advertising: A review with implications for further research. *Advances in consumer research*, 10 (1), 370-376.

### В

- Beard, F. (2010). Comparative Advertising Wars: An Historical Analysis of Their Causes and Consequences. *Journal of Macromarketing*, *30* (3), 270-286.
- Bearden, W. O., Ingram, T. N., & LaForge, R. W. (1998). *Marketing: principles & perspectives*. Boston: MS.
- Bhasin, K. (2011, November 2). *COKE VS. PEPSI: The Amazing Story Behind The Cola Wars* [Web log post]. Retrieved on April 14, from http://www.businessinsider.com/.
- Burger King. (n.d.). *Company info, about Burger King.* Retrieved on May 1, 2013, from http://www.bk.com/en/us/company-info/about-bk.html

### C

Chang, C. (2007). The relative effectiveness of comparative and noncomparative advertising: evidence for gender differences in information-processing strategies. *Journal of Advertising*, *36* (1), 21-35.

### D

- De Run, E.C. (2005) Attitude Towards the Ad: Assessing Measurement Invariance In Cross-Ethnic Research. Downloaded on May 2, 2013, from http://www.anzmac.org/conference/2005/cd-site/pdfs/9-Marketing-Int-C-Cultural-Env/9-de Run.pdf
- De Vocht, A. (2009). Basishandboek SPSS 16 voor Windows. Utrecht: Bijleveld Press.
- Donthu, N. (1998). A cross-country investigation of recall of and attitude toward comparative advertising. *Journal of Advertising*, *27* (2), 111-122.
- DuckDuckGo. (n.d.). About. Retrieved on May 1, 2013, from https://duckduckgo.com/about

#### Ε

Ehrenberg, A. S. C., & G. J. Goodhardt (1989). "Understanding Buyer Behavior." *Consumer Psychology in Behavioral Perspective*. London: Routledge.

### F

Field, A. (2005). Discovering statistics using SPSS. London: SAGE publications.

### G

- Gardner, M. P. (1985). Does attitude toward the ad affect brand attitude under a brand evaluation set? *Journal of Marketing Research*, 22 (2), 192-198.
- George, D., & Mallery, P. (2003). SPSS for Windows step by step: A simple guide and reference. 11.0 update (4th ed.). Boston: Allyn & Bacon

- Greenwald, A. G. (1976). Within-subjects designs: to use or not to use? *Psychological Bulletin, 83* (2), 314.
- Gotlieb, J. B. & Sarel, D. (1991). Comparative advertising effectiveness: The role of involvement and source credibility. *Journal of Advertising*, 20 (1), 38-45.

### ı

- Imber, J., & Toffler, B. A. (2000). Dictionary of marketing terms. New York: Barron's Educational Series, Inc.
- Iyer, E. S. (1988). The influence of verbal content and relative newness on the effectiveness of comparative advertising. *Journal of Advertising*, *17* (3), 15-21.

### K

- Keren, G., & Lewis, C. (1993). A Handbook for Data Analysis in the Behaviorial Sciences: Methodological Issues. New Jersey: Lawrence Erlbaum Associates, Inc.
- Kotler, P. (1997). *Marketing Management: Analysis, Planning, and Control* (9th edition). New Jersey: Prentice-Hall.

### L

- Lane, V., & Jacobson, R. (1995). Stock market reactions to brand extension announcements: the effects of brand attitude and familiarity. *The Journal of Marketing*, *59* (1), 63-77.
- Lavidge, R. J., & Steiner, G. A. (1961). A model for predictive measurements of advertising effectiveness. *The Journal of Marketing*, *25* (6), 59-62.
- Lutz, R. J. (1975). Changing brand attitudes through modification of cognitive structure. *Journal of Consumer Research*, 1 (4) 49-59.

### M

- Maurer, T. J., & Pierce, H. R. (1998). A comparison of Likert scale and traditional measures of self-efficacy. *Journal of applied psychology*, *83* (2), 324-329.
- Meester, M. (2011, August 29). *Het woonwarenhuis uit Waalwijk*. De Volkskrant. Retrieved on February 5, 2013, from http://www.volkskrant.nl/
- Mills, B. (1995). Comparative Advertising: Should it be Allowed?. *European Intellectual Property Review, 17,* 417-417.
- Miskolczi-Bodnár, P. (2004). Definition of comparative advertising. *European Integration Studies*, 1 (3), 25-44.
- Mortimer, K. (2002). Integrating advertising theories with conceptual models of services advertising. *Journal of Services Marketing*, *16* (5), 460-468.
- Mitchell, A. A. (1986). The effect of verbal and visual components of advertisements on brand attitudes and attitude toward the advertisement. *Journal of Consumer Research*, 13 (1), 12-24.
- Mitchell, A. A. & Olson, J.C. (1981). Are product attribute beliefs the only mediator of advertising effects on brand attitude? *Journal of Marketing Research*, 18 (3), 318-332.
- Muehling, D. D. (1987). Comparative advertising: The influence of attitude-toward-the-ad on brand evaluation. *Journal of Advertising*, *16* (4), 43-49.

### Ν

- Nederlandse Energie Maatschappij. (n.d.). *Homepage*. Retrieved on May 1, 2013, from http://www.nle.nl/
- Nudd, T. (2011, April 13). *Apple's 'Get a Mac', the complete campaign*. [Web log post]. Retrieved on May 6, 2013, from http://www.adweek.com/adfreak/apples-get-mac-complete-campaign-130552.

### 0

- O'Guinn, T. C., Allen, C. T., & Semenik, R. J. (2011). *Advertising and integrated brand promotion*. Nashville: South-Western Pub.
- Orville Redenbacher. (n.d.). *About us, history*. Retrieved May 1, 2013, from http://www.orville.com/about-us/history.
- Osgood, C. E. (1964). Semantic Differential Technique in the Comparative Study of Cultures. *American Anthropologist*, 66 (3), 171-200.

### Ρ

- Park, C. W., & Young, S. M. (1986). Consumer response to television commercials: The impact of involvement and background music on brand attitude formation. *Journal of Marketing Research*, 23 (1), 11-24.
- Prasad, V. K. (1976). Communications-effectiveness of comparative advertising: A laboratory analysis. *Journal of Marketing Research*, *13* (2), 128-137.

### Q

Quinn, G. (2009, October 19). *Comparative Advertising: BK vs. McDonalds and Wendy's* [Web log post]. Retrieved on April 16, 2013, from http://www.ipwatchdog.com/.

### R

- Ratchford, B. T. (1987). New insights about the FCB grid. Journal of advertising research, 27, 24-26.
- Reisinger, D. (2010, April 8). 'I'm a Mac/I'm a PC' ads coming to an end? [Web log post]. Retrieved on May 4, from http://news.cnet.com/8301-13506\_3-20002008-17.html
- Richards, J. I., & Curran, C. M. (2002). Oracles on advertising: Searching for a definition. *Journal of Advertising*, 31 (2), 63-77.
- Rogers, E. M. (1995). Diffusion of innovations. New York: Simon and Schuster Inc.
- Rossiter, J. R., Percy, L., & Donovan, R. J. (1991). A better advertising planning grid. *Journal of Advertising Research*, *31*, 11-21.

### S

- Samsung. About Samsung. Retrieved on May 1, 2013, from https://www.samsung.com/nl/about samsung
- Simonin, B. L., & Ruth, J. A. (1998). Is a company known by the company it keeps? Assessing the spillover effects of brand alliances on consumer brand attitudes. *Journal of Marketing Research*, 35 (1), 30-42.
- Spears, N., & Singh, S. N. (2004). Measuring attitude toward the brand and purchase intentions. *Journal of Current Issues & Research in Advertising*, *26* (2), 53-66.
- Strong Jr, E. K. (1925). Theories of selling. *Journal of applied psychology*, 9 (1), 75.

### T

Till, B. D., & Busler, M. (2000). The match-up hypothesis: physical attractiveness, expertise, and the role of fit on brand attitude, purchase intent and brand beliefs. *Journal of Advertising*, 29 (3), 1-13.

### V

- Vakratsas, D., & Ambler, T. (1999). How advertising works: what do we really know? *The Journal of Marketing*, 63 (1), 26-43.
- Vaughn, R. (1980). How advertising works: A planning model. *Journal of Advertising Research*, 26 (1), 57-66.
- Vicks. (n.d.). About, timeline. Retrieved on May 1, 2013, from http://www.vicks.com/about/timeline/

### W

- Wells, W., J. Burnett & S. Moriarty. (1998). *Advertising Principles and Practices, 4th ed.* New Jersey: Prentice-Hall.
- Wilkie, W. L., & Farris, P. W. (1975). Comparison advertising: Problems and potential. *The Journal of Marketing*, 39 (4), 7-15.

### Ζ

Zhang, S., Kardes, F. R., & Cronley, M. L. (2002). Comparative advertising: Effects of structural alignability on target brand evaluations. *Journal of consumer psychology*, *12* (4), 303-311.

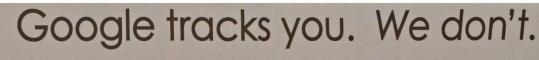
# 7. Appendices

## 7.1 Appendix A - Advertisements used in the experiment

In the two grids below the ads used in the experiments are presented. From left to right, top to bottom: Vicks, Verizon, DuckDuckGo, Nederlandse Energie Maatschappij, Orville Redenbacher, EasyJet, Saab, Dunkin´ Donuts, Apple and Burger King. Please note that the commercials are not included.









Search better at DuckDuckGo.com





BEL GRATIS 0800-4664 OF KIJK OP NEDERLANDENERGIE.NL



Pa



IK ZEG DOEN.







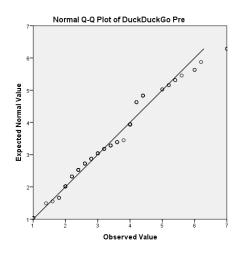


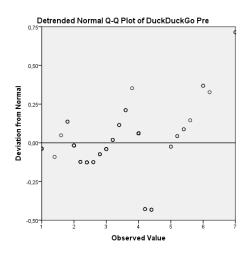




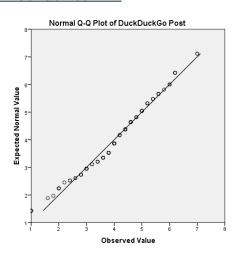
# 7.2 Appendix B - Q-Q plots

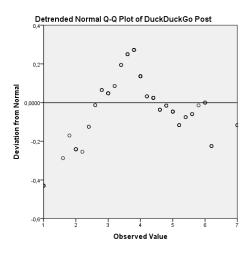
## DUCKDUCKGO PRE-AD



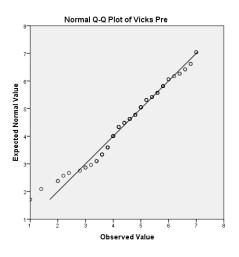


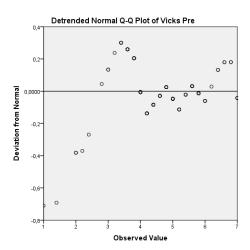
# DUCKDUCKGO POST-AD



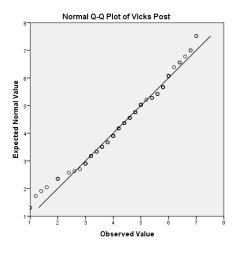


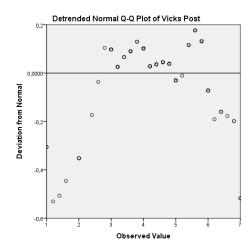
### **VICKS PRE-AD**



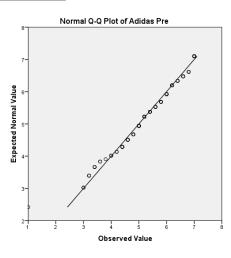


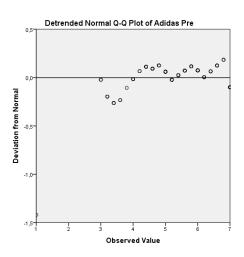
#### **VICKS POST-AD**



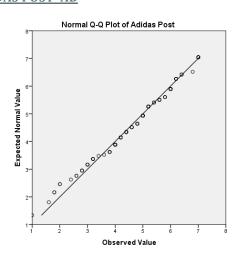


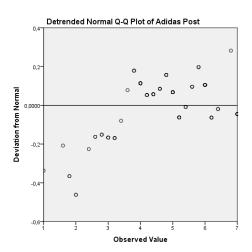
#### **ADIDAS PRE-AD**



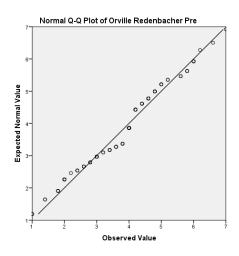


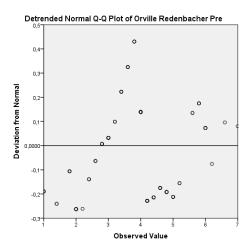
## **ADIDAS POST-AD**



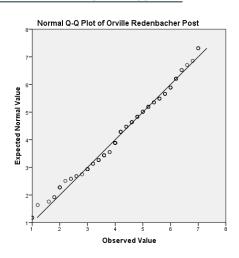


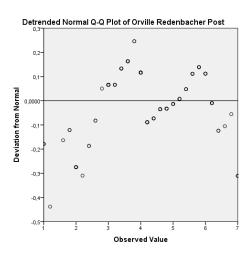
### **ORVILLE REDENBACHER PRE-AD**



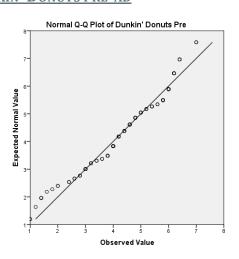


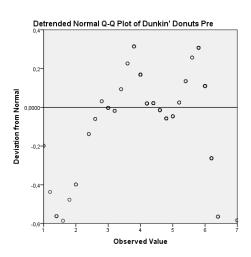
#### **ORVILLE REDENBACHER POST-AD**



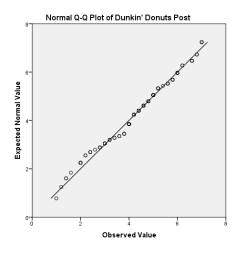


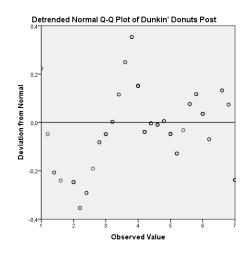
# **DUNKIN' DONUTS PRE-AD**



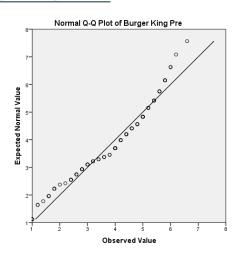


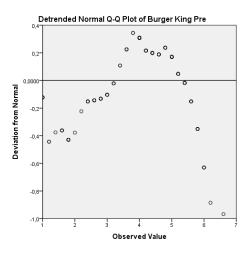
### **DUNKIN' DONUTS POST-AD**



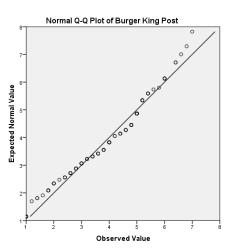


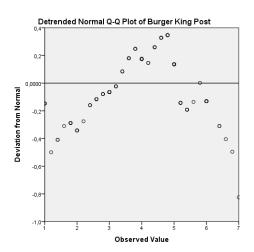
#### **BURGER KING PRE-AD**



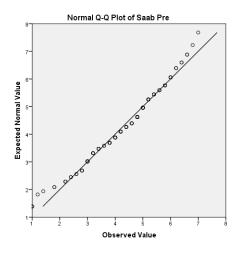


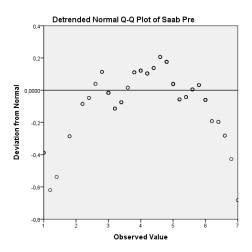
# BURGER KING POST-AD



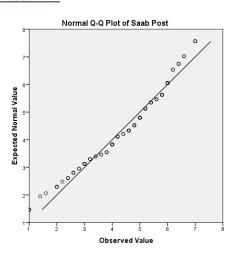


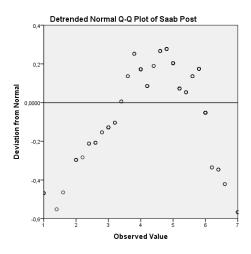
### **S**AAB PRE-AD



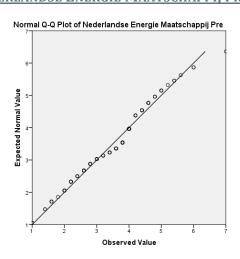


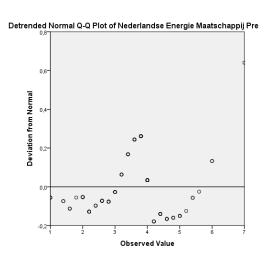
#### **S**AAB POST-AD



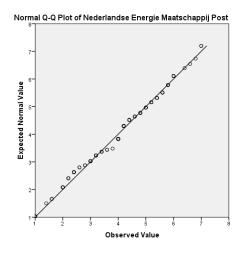


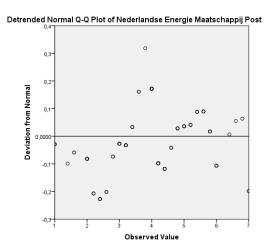
### NEDERLANDSE ENERGIE MAATSCHAPPIJ PRE-AD



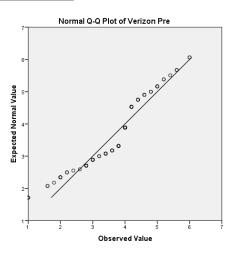


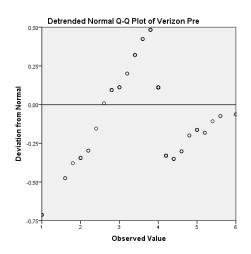
### NEDERLANDSE ENERGIE MAATSCHAPPIJ POST-AD



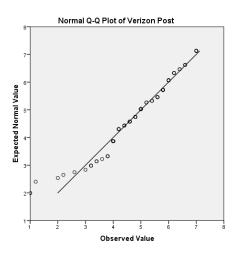


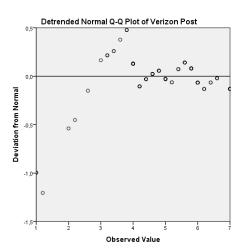
#### **VERIZON PRE-AD**



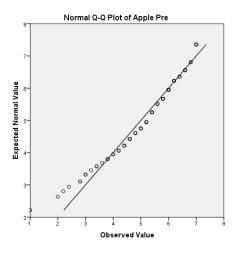


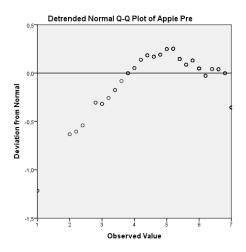
## **VERIZON POST-AD**



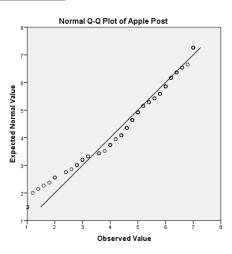


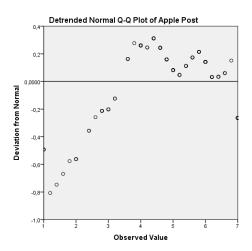
#### **APPLE PRE-AD**



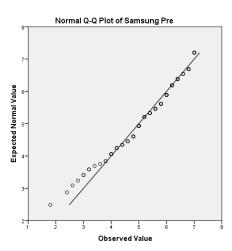


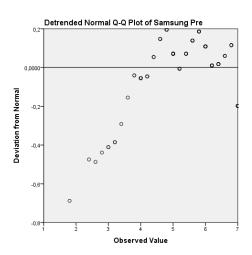
#### **APPLE POST-AD**



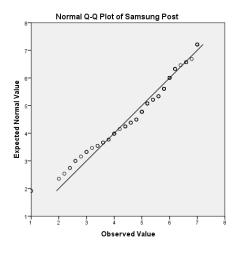


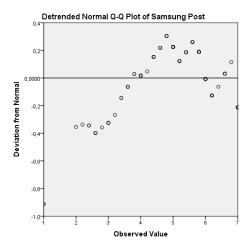
### **SAMSUNG PRE-AD**



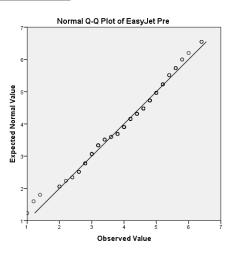


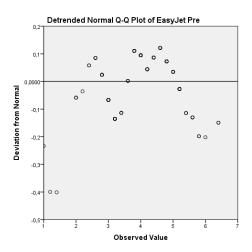
### **SAMSUNG POST-AD**



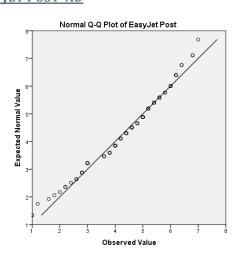


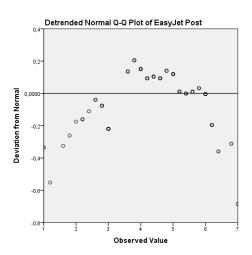
#### **EASY ET PRE-AD**





## **EASYIET POST-AD**





# 7.4 Appendix C - Wilcoxon signed rank tests

		N	Mean Rank	Sum of Ranks
DuckDuckGo Post - DuckDuckGo	Negative Ranks	28	39,86	1116,00
Pre	Positive Ranks	80	59,63	4770,00
	Ties	21		
	Total	129		
Vicks Post - Vicks Pre	Negative Ranks	58	60,06	3483,50
	Positive Ranks	54	52,68	2844,50
	Ties	17		
	Total	129		
Adidas Post - Adidas Pre	Negative Ranks	68	61,13	4157,00
	Positive Ranks	39	41,56	1621,00
	Ties	28		
	Total	135		
Burger King Post - Burger King	Negative Ranks	51	61,13	3117,50
Pre	Positive Ranks	61	52,63	3210,50
	Ties	20		
	Total	132		
Orville Redenbacher Post - Orvil-	Negative Ranks	33	53,17	1754,50
le Redenbacher Pre	Positive Ranks	77	56,50	4350,50
	Ties	23		
	Total	133		
Saab Post - Saab Pre	Negative Ranks	47	57,09	2683,00
	Positive Ranks	74	63,49	4698,00
	Ties	12		
	Total	133		
Nederlandse Energie Maat-	Negative Ranks	36	42,03	1513,00
schappij Post - Nederlandse	Positive Ranks	66	56,67	3740,00
Energie Maatschappij Pre	Ties	23		
	Total	125		
Verizon Post - Verizon Pre	Negative Ranks	10	30,80	308,00
	Positive Ranks	98	56,92	5578,00
	Ties	21		
	Total	129		
Dunkin' Donuts Post - Dunkin'	Negative Ranks	57	59,82	3409,50
Donuts Pre	Positive Ranks	55	53,06	2918,50
	Ties	19		
	Total	131		
EasyJet Post - EasyJet Pre	Negative Ranks	34	60,46	2055,50
	Positive Ranks	86	60,52	5204,50
	Ties	14	·	
	Total	134		
Apple Post - Apple Pre	Negative Ranks	63	62,11	3913,00
	Positive Ranks	44	42,39	1865,00
	Ties	23	,	,
	Total	130		
Samsung Post - Samsung Pre	Negative Ranks	65	63,69	4140,00
	Positive Ranks	46	45,13	2076,00
	Ties	22	,	-,
		133		

Wilcoxon signed rank tests				
	Z	Asymp. Sig. (2-tailed)		
DuckDuckGo post - pre	-5.606	.000		
Vicks post - pre	929	.353		
Adidas post - pre	-3.947	.000		
Burger King post - pre	135	.892		
Orville Redenbacher post - pre	-3.876	.000		
Dunkin' Donuts post - pre	-7.14	.475		
Nederlandse Energie Maatschappij post - pre	-3.724	.000		
Verizon post - pre	-8.084	.000		
Saab post - pre	-2.612	.009		
EasyJet post - pre	-4.131	.000		
Apple post - pre	-3.190	.001		
Samsung post - pre	-3.043	.002		