



**LOUVAIN**  
School of Management

**UNIVERSITE CATHOLIQUE DE LOUVAIN**  
**LOUVAIN SCHOOL OF MANAGEMENT**

A BRAND'S TRANSITION TO SOCIAL MEDIA: EFFECTS ON BRAND IMAGE

Promoteur : Anne-Cécile JEANDRAIN

Mémoire-recherche présenté par  
Ashling MC PHILLIPS

en vue de l'obtention du titre de  
Master 120 crédits en sciences de gestion

ANNEE ACADEMIQUE 2015-2016

## **Acknowledgements**

To my thesis director, Anne-Cécile Jeandrain, thank you for following my research, guiding me and giving me helpful advice.

I would also like to thank my parents and my friends for encouraging and supporting me every step of the way. I am especially grateful to my father for proofreading my research.

Finally, I would like to thank every person that has contributed to my research by answering my questionnaire.

## Table of Contents

Introduction.....	3
Part 1 – Exploratory Research.....	5
Chapter 1 – Social Media – An Overview.....	5
1.1 What Social Media is and is not.....	5
1.2 Changes in Consumer Behaviour .....	12
Chapter 2 – Brand Image.....	19
2.1 Definitions .....	20
2.2 Measuring Brand Image .....	24
2.3 Summary.....	27
Chapter 3 – Research Model.....	28
Part 2 – Quantitative analysis .....	33
Chapter 1 – Methodology.....	33
1.1 Research design .....	33
1.2 Research Sample.....	38
1.3 Respondents.....	38
1.4 Procedure .....	39
1.5 Measurement of variables .....	40
1.6 Data Analysis.....	42
Chapter 2 – Results.....	44
2.1 Manipulation check.....	44
2.2 Hypotheses testing .....	47
2.3 Changes in Brand Image.....	57
2.4 Summary.....	60
Chapter 3 – Discussion, Recommendations and Limits.....	61
3.1 Discussion.....	61
3.2 Managerial Recommendations.....	67
3.3 Limits.....	69
Conclusion.....	71
Bibliography .....	73

## Tables

Table 1. Classification of Social Media by social presence/media richness and self-presentation/self-disclosure.....	8
Table 2. Social Networks - Examples.....	10
Table 3. Brand image definitions.....	21
Table 4. Brand associations.....	23
Table 5. Questionnaire texts for low/high transparency and interactivity.....	35
Table 6. Scenario distribution.....	39
Table 7. Cronbach's alphas.....	43
Table 8. Cronbach's alphas before/after.....	44
Table 9. Scenario correspondence to transparency and interactivity levels.....	45
Table 10. One Sample T test.....	46
Table 11. Homogeneity of variances.....	50
Table 12. ANOVA test.....	50
Table 13. Means.....	51
Table 14. Paired Samples T Test.....	57
Table 15. Summary of Rejection of Hypotheses.....	60
Table 16. Mean Differences in Scenarios.....	66

## Figures

Figure 1. Mindmap - Social Media.....	11
Figure 2. Brand personality list (Aaker, 1997).....	25
Figure 3. Adapted brand personality list (Koebel and Ladwein, 1999).....	25
Figure 4. Research model to be tested.....	30
Figure 5. Mediation.....	48
Figure 6. Moderation.....	54
Figure 7. Changes in Brand Image - Brand Profiles.....	64

## **Introduction**

Social media arise in the era of the digital revolution and information exchange. Many companies use social media as an opportunity for their businesses. Tsimonis and Dimitriadis (2013) have identified four main reasons why companies choose to use social media. The first reason is to build up and reinforce the relationship with customers. The second is to reach a greater audience. The third reason is that with social media, brand awareness can be increased. Last but not least, social media can be used to increase sales.

Nonetheless, companies struggle with social media because they are not familiar with it and do not know how it may impact their businesses. They must be aware that in this particular context, marketing is no longer uni-directional but has become rather multi-directional (Hennig-Thurau *et al.*, 2013). In fact, social media enable consumers to engage and participate with their brands. Consumers request that brands share information with them. Consequently, brands need to adapt to a more transparent and interactive situation.

Because of the specific characteristics of social media (i.e. transparency and interactivity), their influence on businesses is questionable. Hence, it is worth examining to what extent a brand is affected by those singularities. Indeed, it is important to know whether a brand is perceived differently when it decides to go onto social media. For this reason, this research aims at answering the following question: “Does a brand’s transition to social media impact its brand image?” As a matter of fact, very little research has been conducted into whether brand image undergoes changes due to social media.

In order to investigate this problematic, two main steps are carried out: an exploratory research is conducted and followed by a quantitative analysis.

The exploratory research is theoretical and is divided into three chapters. Chapter 1 gives an overview of social media: it begins by describing the concept; then, the changes in consumer behaviour that are induced by the context of social media are examined – this research focuses mainly on perceived interactivity and perceived transparency. In Chapter 2, the construct of brand image is analysed and proposed methods to measure it are identified. Finally, Chapter 3 presents the research model that results from the theoretical analysis and formulates hypotheses that will be tested in the quantitative study.

The quantitative analysis is a practical part with the objective of testing the hypotheses from the research model thanks to data collected from a survey that was conducted. The questionnaire was administered to Facebook users in order to compare changes in brand image perception through the elaboration of a fictitious brand case. The survey results are then analysed and commented upon. The quantitative study is concluded with a reflection on the managerial implications of the results and limitations to the study.

## **Part 1 – Exploratory Research**

Chapter 1 – Social Media – An Overview
--

This first chapter addresses the matter of social media and the changes they induce on consumer behaviour.

### **1.1 What Social Media is and is not**

When thinking about social media, everyone has a vague idea of what it is and could come up with some definition that would be associated with one's own use of the media. However, social media are quite complex and encompass several concepts that should not be confused with one another.

The general idea is that social media enable people to interact with each other without any boundaries. People from all over the world can talk to each other at any time during the day. Moreover, they have access to a lot of information on social media and can easily share information, leave comments and give their opinion about practically any subject. A great amount of content is thus easily available for anybody looking for information about almost anything.

Hence, one of social media's main characteristics is its interactive feature that is used to connect people to each other and to share information. Liu and Shrum (2002) define interactivity as "the degree to which two or more communication parties can act on each other, on the communication medium, and on the messages and the degree to which such influences are synchronized" (p. 54). However, social media are not the only one that possess these features. This is why it is important to differentiate social media from other concepts such as Web 2.0 and user-generated-content (UGC) that are also characterized by interactivity and information sharing. Nevertheless, it will be seen that they are all linked to each other.

In order to understand what social media are, one has to understand where they come from. Thus, a brief summary of its origins and a definition of some terms one comes across – Web 2.0 and UGC – when reading about social media in the existing literature will be given. After having examined both Web 2.0 and UGC, a classification of social media will be presented followed by a presentation of social networks.

### **Web 2.0**

First of all, let's be clear about the fact that social media would not exist without the Web, and more specifically without Web 2.0. When the first web bubble burst in the early 2000s, everything went quiet for a while - but shortly after, a new generation of Web appeared, where websites became more interactive and user-oriented than previous websites (Hoegg *et al.*, 2006). What existed before Web 2.0 is referred to as Web 1.0. Fundamentally, Web 2.0 is not something new; it is a different use of the Web (Berthon *et al.*, 2007).

The two different terms exist because there has been a different approach to the Web that is characterized by a shift in the use of the Web that occurred in the early 2000s: "Contrasting Web 2.0 with Web 1.0 can be thought of in terms of technology that has enabled a shift in focus from companies to consumers, individuals to communities, nodes to networks, publishing to participation, and intrusion to invitation. While Web 2.0 is technological, its effects are sociological and little short of revolutionary in their implications for business" (Berthon *et al.*, 2007, 2012, p.262). This shift is the moment when the Internet as it is known today was born: "The real power of the Internet - and the characteristic that differentiates it from traditional media - is its potential for interactivity" (Stewart and Pavlou, 2002, p.380). This generation of Web is called Web 2.0. The Web 2.0 is more of an approach to creating web software (Kaplan and Haenlein, 2010). It has enabled the possibility to interact, share content and information with each other and is a more user-friendly and user-oriented form of the Web (Parameswaran and Whinston, 2007). In this sense, one can say that Web 2.0 has enabled social media to

exist. Indeed, social media aim at being social and must therefore be used on interactive and user-oriented websites.

### ***User-generated-content (UGC)***

Furthermore, social media must be differentiated from user-generated-content (UGC). UGC is the result of what is being produced while being active on social media (Smith *et al.*, 2012). For instance, the content from blogs, the comments, the reviews, etc. are considered to be UGC because they emanate from the use of social media (Liu-Thompkins and Rogerson, 2012). Consumers, through their creativity, contribute to the content available online. Hence, UGC derives from social media, which in turn, derive from the Web 2.0.

### ***Classification of Social Media***

There are numerous definitions of social media. Tuten and Solomon (2013) define social media as the “[...] online means of communication, conveyance, collaboration, and cultivation among interconnected and interdependent networks of people, communities, and organizations enhanced by technological capabilities and mobility” (p.2). According to this definition, social media cover a very broad range of concepts. Mangold and Faulds (2009) share the same vision of social media, the authors state that “social media encompasses a wide range of online, word-of-mouth forums including blogs, company-sponsored discussion boards and chat rooms, consumer-to-consumer e-mail, consumer product or service ratings websites and forums, Internet discussion boards and forums, moblogs (sites containing digital audio, images, movies, or photographs), and social networking websites, to name a few” (p. 358). The authors give examples of different forms that social media can take. Hence, blogs, social networking sites, commerce communities, virtual worlds, and the others all fall under the category of social media.

By the same reasoning, Kaplan and Haenlein (2010) propose a classification of social media according to the social presence/media richness on the one hand and self-presentation/self-disclosure on the other hand. The authors define social presence richness as “the acoustic, visual and physical contact that can be achieved” (p. 61) and self-presentation can be understood as follows: “in any type of social interaction people have the desire to control the impressions other people form of them” (p. 62). These two dimensions allow classifying different forms of social media. Self-presentation can either be low or high. Social media with low self-presentation take into account collaborative projects (e.g. Wikipedia), content communities (e.g. Youtube) and virtual game worlds (e.g. World of Warcraft). Social media with high self-presentation take into account blogs, social networking sites (e.g. Facebook) and virtual social worlds (e.g. Second Life). The level of social presence can either be low (collaborative works and blogs), medium (content communities and social networking sites) or high (virtual game worlds and virtual social worlds). Table 1 hereafter presents Kaplan and Haenlein’s (2010) classification.

**Table 1. Classification of Social Media by social presence/media richness and self-presentation/self-disclosure**

		Social presence/ Media richness		
		Low	Medium	High
Self-presentation/ Self-disclosure	High	Blogs	Social networking sites (e.g., Facebook)	Virtual social worlds (e.g., Second Life)
	Low	Collaborative projects (e.g., Wikipedia)	Content communities (e.g. YouTube)	Virtual game worlds (e.g., World of Warcraft)

Source: Kaplan and Haenlein (2010)

The category that will be of interest in this research is the one that forms the intersection between a high self-presentation and a medium social presence, namely social networking sites such as Facebook, Twitter, Instagram or even LinkedIn.

### ***Social Networks***

Boyd and Ellison (2008) suggest that social networking sites possess three main characteristics: the first is that they allow individuals to create a profile, which can be public to a certain extent; the second is that these sites allow users to connect with other users of the same social networking site; last but not least, the third is that these sites allow a person to view the connections that a user has and the connections another user has. Berthon *et al.* (2012) share the same view about social networking sites, they also add the aspect of messaging: “Networks (e.g., Facebook) are services on which users can find and add friends and contacts, send messages to friends, and update personal profiles” (p.263). The messaging feature is also mentioned by Kaplan’s and Haenlein’s (2010) that define social networking sites as follows: “social networking sites are applications that enable users to connect by creating personal information profiles, inviting friends and colleagues to have access to those profiles, and sending e-mails and instant messages between each other. These personal profiles can include any type of information, including photos, video, audio files, and blogs” (p. 63).

Overall, the important thing to remember about social networks is that they can be considered as a sub-category of social media. Some of the most popular social networks that pop to one’s mind when thinking about them are for example, Facebook, Twitter, Instagram, etc. Table 2 hereafter lists a few of the most well known social networks and gives a short description of their purpose.

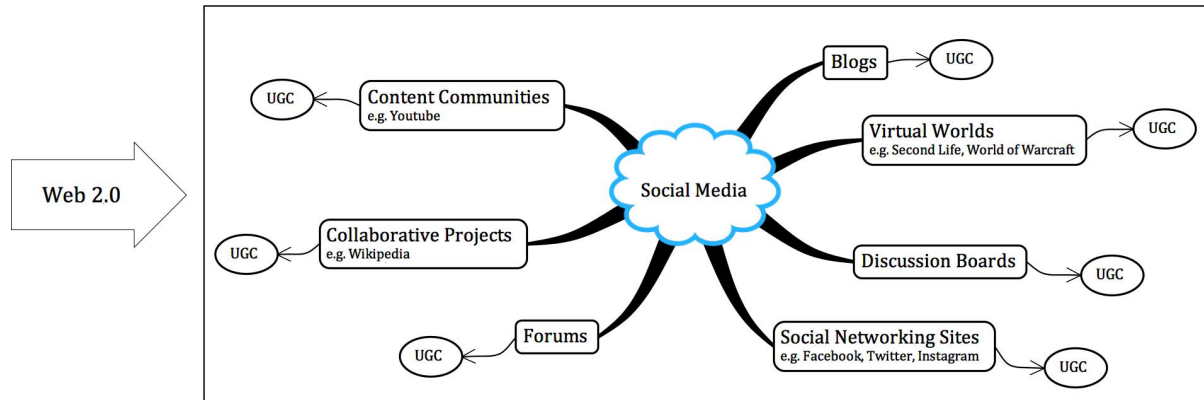
**Table 2. Social Networks - Examples**

<b>Facebook</b>	Mission: “Founded in 2004, Facebook’s mission is to give people the power to share and make the world more open and connected. People use Facebook to stay connected with friends and family, to discover what’s going on in the world, and to share and express what matters to them” (Facebook, n.a.).
<b>Pinterest</b>	“The visual bookmarking tool that helps you discover and save creative ideas” (Pinterest, n.a.).
<b>LinkedIn</b>	Mission: “To connect the world's professionals to make them more productive and successful. When you join LinkedIn, you get access to people, jobs, news, updates, and insights that help you be great at what you do” (LinkedIn, n.a.)
<b>Twitter</b>	Mission: “To give everyone the power to create and share ideas and information instantly, without barriers” (Twitter, n.a.).
<b>Instagram</b>	What is Instagram? “Instagram is a fun and quirky way to share your life with friends through a series of pictures. Snap a photo with your mobile phone, then choose a filter to transform the image into a memory to keep around forever. We're building Instagram to allow you to experience moments in your friends' lives through pictures as they happen. We imagine a world more connected through photos” (Instagram, n.a.)

### ***Summary***

Briefly, the difference between the three concepts mentioned can be understood as follows: “Social Media is a group of Internet-based applications that build on the ideological and technological foundations of Web 2.0, and that allow the creation and

exchange of User Generated Content” (Kaplan and Haenlein, 2010). This difference is illustrated in Figure 1 below.



**Figure 1. Mindmap - Social Media**

As Kaplan and Haenlein (2010) observe, social media exist as a result of the existence of Web 2.0. Indeed, Web 2.0 allows having interactive and user-oriented websites. Therefore, social media websites arise thanks to Web 2.0. Hence, social media differ from Web 2.0. In fact, the websites that arise thanks to Web 2.0 do not all pertain to the category of social media. Furthermore, Figure 1 depicts different kinds of social media websites. These can be e.g. content communities, blogs, collaborative projects, social networking sites, etc. They can all be considered as social media. While using these different types of social media, users produce content. The content that is produced is what is referred as user-generated-content (UGC). However, UGC cannot be regarded as social media. It is a mere product of social media. Hence social media must be differentiated from both Web 2.0 and UGC. Nonetheless, as mentioned earlier, these concepts are all linked to each other.

Now that there is a clearer understanding of how to position social media among other concepts, we can go into further detail about the changes that are brought in consumer

behaviour as a result of the usage of social media. The focus for the rest of this research will mainly be on social networking sites.

## **1.2 Changes in Consumer Behaviour**

In this section, the new challenges that appear for companies and brands that are involved with social media will be presented.

Customers are able to react to the information that they receive through social media thus leading to interaction between multiple parties: the brand, the initial customer reacting and other customers that can join a conversation build upon the existing conversation. Nonetheless, it is important to note that not all parties have to participate in this interaction. For instance, it is possible that different customers discuss a brand on social media without the brand knowing (e.g. this can happen if a brand is not using social media): “Communication about brands happens, with or without permission of the firms in question. It is now up to firms to decide if they want to get serious about social media and participate in this communication, or continue to ignore it” (Kietzmann *et al.*, 2011, p. 242). The fact that almost any brand can be talked about on social media should be an incentive for companies and brands to participate in social media. Indeed, if they care about their brand image, they should at least try to monitor these types of media and to be aware of what is being said about them.

The specific characteristics of social media have undoubtedly generated changes in consumer behaviour because consumers have access to more information and can take over the control of brands by openly giving their opinions.

The primary objective of social media is for people to connect to each other, to show and update their personal profiles, to share pictures and videos and to exchange messages. However, a consequence of social media is that users become empowered as consumers. This empowerment comes from the fact that they have access to a lot of information

(Andzulis *et al.*, 2012). Consequently, as information is found on social media and can be shared, commented on and criticized, it has become much easier for consumers to react. Therefore, consumers have the tendency to become more active than before because, thanks to social media, they now possess the tools to do so. Hence, changes in consumer behaviour can be observed when compared to reactions to traditional marketing.

In the following subsections, some of the main reasons why consumer behaviour changes due to social media will be reviewed. The main reasons that have been identified and that will be discussed are perceived interactivity, proactivity, transparency and trust.

### ***Perceived Interactivity***

Interactivity is a feature that is absent from traditional marketing and one-way communication, but it is an essential feature for social media and for social networks. Nonetheless, some companies do not use their social networking pages and accounts in an interactive manner. They use them only to push messages. As a consequence, this draws less attention and less interest from customers. Indeed, interactivity is essential to users – the more interactive brand posts are, the more likely it is that they will get likes and comments (De Vries *et al.*, 2012).

Interactivity has often been defined as a process, a function or a perception McMillan and Hwang (2002). Hence, there is a difference between the understanding of interactivity and perceived interactivity. There are numerous definitions of interactivity. According to Coyle and Thornson (2001), “A website that is described as interactive should give good mapping, quick transitions between a user’s input and resulting actions, and a range of ways to manipulate the content” (p.67). Rafaeli (1998) defines interactivity as “an expression of the extent that in a given series of communication exchanges, any third (or later) transmission (or message) is related to the degree to which previous exchanges referred to even earlier transmissions” (p.111). Jensen

(1998) notes that interactivity “is a measure of a media’s potential ability to let the user exert an influence on the content and/or form of the mediated communication” (p.201).

In the present study, interactivity will be studied from the user’s perspective – the focus will be on perceived interactivity. Wu (2006) conceptualized perceived interactivity given a multi-dimensional model: perceived control, perceived responsiveness and perceived personalization. The model was made to study the perceived interactivity of websites. McMillan and Hwang (2002) have also studied interactivity from the user perception point of view. They state, “the focus on perception is consistent with marketing, advertising and communication traditions” (p.30). In their study, the authors observe that perceived interactivity is conceptualized through three dimensions: direction of communication, user control and time. Direction of communication refers to who is communicating with whom. The best scenario is an interpersonal two-way communication between companies, consumers and consumers with one another. User control refers to the way consumers control the information they are given on the web. Last but not least, time: “The perception of Web-based interactivity is influenced by the speed at which messages can be delivered and at which people can process messages” (p.30).

However, these three dimensions have been changed and slightly rephrased to three other corresponding dimensions for understanding and clarity purposes. Hence, McMillan and Hwang’s (2002) tri-dimensional construct of perceived interactivity includes: real time conversation, no delay and engaging.

- Real time conversation refers to a website’s ability to interact quickly and positively with customers.
- No delay refers to a website’s loading features; the faster the better.
- Engaging refers to the quality of the content and the ability to capture customers’ attention.

### ***Proactivity***

“The interactive nature of these digital media not only allows sellers to share and exchange information with their customers but also allows customers to share and exchange information with one another as well” (Sashi, 2012, p.255). Social media have the ability to bring people together so that the relationship that is created is not only between the brand and its customers but also between customers themselves.

According to Jore (2012), a proactive person is someone that does not stay passive when confronted with their environment or that does not only react to their environment. A proactive person is rather entrepreneurial and tries to change their environment. Bateman and Crant (1993) state, “the prototypic proactive personality, as we conceive it, is one who is relatively unconstrained by situational forces, and who effects environmental change. Other people, who would not be so classified, are relatively passive” (p.105). Hence, it is suggested that some people are more proactive than others.

Bateman and Crant (1993) have developed a scale that measures proactive behaviour. Jore (2012) has used this scale and translated it from English to French. It results in a uni-dimensional scale of proactive behaviour with 17 items.

### ***Perceived Transparency***

The fact that consumers have access to more and more information leads them to ask for more information. It is now not uncommon for them to ask for more transparency from brands and companies. For instance, it is usually very much appreciated if a company makes an error and then shows that it is willing to recognize it. Moreover, if companies fail to be transparent they would suffer from it: “Companies that struggle with transparency risk being perceived by customers as insincere or manipulative. These types of organizations may find it difficult to interact with the authenticity that has

become a must for business-customer interactions in social media” (Heller Baird and Parasnis, 2011, p.33). Furthermore, Kang and Hustvedt (2014) state, “transparency is one of the basic conditions in establishing positive relationships between consumers and corporations” (p. 254). Thus, being transparent is an important aspect for companies.

What does it mean to be transparent? First of all, it must be acknowledged that there are different levels of transparency. There is the real transparency and there is what consumers perceive as transparency, namely perceived transparency. The latter is the one that is of interest in this research. Dapko (2012) has explored themes associated to perceived transparency across the literature of different fields (marketing, accounting and finance, IT, political science, management, public health and communications) in order to come up with a definition. It resulted that there are three common elements to each of the fields, which form the three dimensions of perceived transparency, namely “being open”, “being forthright” and providing stakeholders with “relevant” information. The author says, “a firm may be perceived as open if it affords stakeholders the opportunity to learn about it” (p. 46). Furthermore, a firm is forthright if “it gets straight to the point and proactively opens itself up to stakeholders without regard for consequences” (p.46). Hence, Dapko’s (2012) definition of transparency and the one that is also adopted for the purpose of this research is the following: “the extent to which a stakeholder perceives a firm’s conduct as forthright and open regarding matters relevant to the stakeholder” (p. 71). Nonetheless, Dapko’s study results in a one-dimensional construct of perceived transparency that is measured through a 4-item scale.

### ***Trust***

Social media strengthen information exchange because consumers trust their peers more than they trust marketers: “Social media increase the level of trust in consumers and indirectly encourage intention to buy through social networking sites. Social media empower participants to generate content through online communities, reviews and recommendations. Consumers, facilitated by social media, generate online social support for their peers. Consequently, these interactions establish trust in the networks used” (Hajli, 2014, p. 400). Consumers have the tendency to check product or service reviews before purchasing them. In fact, they consider this type of information as more valuable than what a marketer would say about his own product. They feel they can rely on this type of information because they can relate. Their peers are just ordinary people like them that have tested the product or service and that give an honest opinion about it. Furthermore, when consumers start trusting a brand, they usually also create more positive attitudes towards the brand (Anwar *et al.*, 2011). Nonetheless, trust can also appear as a result of brands creating pages on social networking sites such as Facebook (Lorenzo-Romero *et al.*, 2011). For instance, when brands are transparent, this allows their consumers to trust them. In fact, it is reassuring for customers to know what companies are doing (Kirby, 2012). Hence, transparency has a positive effect on trust. Dapko (2012) also finds that being transparent increases trust.

Trust is a construct that can be considered from different points of view. For instance, Morgan and Hunt (1994) study trust in the relationship between two people. According to them, there is trust “when one party has confidence in a exchange partner’s reliability and integrity” (p. 23). However, it is not the relation between two individuals that is analysed here but the relation between a brand and a group of consumers. Therefore, for the purpose of this research will use Gurviez and Korchia’s (2002) definition of trust: “La confiance dans une marque, du point de vue du consommateur, est une variable psychologique qui reflète un ensemble de présomptions accumulées quant à la crédibilité, l’intégrité et la bienveillance que le consommateur attribue à la marque”

(p.7). Indeed, this choice has been made because their research focalizes on the role of trust when analysing the relation between consumers and brands. The authors propose a tri-dimensional model of trust, which takes into account credibility, integrity and benevolence.

- Credibility can be understood as the brand's ability to fulfil customer needs with respect to expected performance.
- Integrity implies that the brand should be loyal to its promises. Hence, the brand should be honest when stating what needs it can fulfil.
- Benevolence suggests that the brand should take into account customer needs before its own needs. Therefore, a long-term relation should be insured.

### ***Summary***

With social media, consumers face a large amount of information. They are constantly exposed to it and this easy access to information has led consumers to become more active. Consumers' behaviour changes, they want to be aware of everything and request that information they need is provided to them as quickly as possible. What is important is that companies and brands on social media act in an appropriate way, i.e. that they interact with consumers and display the right amount of transparency.

Hence, the main characteristics that have been identified as being specific to social media are interactivity and transparency because they are what distinguish social media from other types of media. Moreover, a relation between transparency and trust is suspected. In addition, a relation between proactivity and interactivity is also suspected.

- Perceived interactivity will be analysed thanks to McMillan and Hwang's (2002) tri-dimensional construct that is composed of: real-time conversation, no delay and engaging.

- Proactivity will be measured according to Jore's (2012) translation of Bateman and Crant's (1993) proactive behaviour scale that results in a one-dimensional construct.
- Perceived transparency will be tested using Dapko's (2012) one-dimensional construct
- Trust will be measured with Gurviez and Korchia's (2002) tri-dimensional construct that consists of: credibility, integrity and benevolence.

## Chapter 2 – Brand Image

The previous chapter gave an overview of social media and explained the changes induced in consumer behaviour. This research argues that social media may influence brand image. More specifically, it is believed that the singularities of social media, namely transparency and interactivity are responsible for causing changes in brand image.

From a managerial point of view, brand image is very significant. Brand image has been shown to have an impact on purchasing behaviour (Malik *et al.*, 2012), brand satisfaction and brand loyalty (Chung *et al.*, 2015). Furthermore, knowing how the brand is perceived and being aware of strengths and weaknesses is an asset for decisions about positioning and communication (Lambin and de Moerloose, 2008). Being aware of whether the brand's actions on social media have an impact on brand image is thus critical. Hence, considering the managerial importance and implications of the concept, the present study will focus on how it is influenced by social media.

In order to have a better understanding of brand image, the concept will be defined thoroughly in the next section. Brand image is a concept that has largely been studied in the extant literature. Numerous authors have given a series of different definitions and only some definitions will be reviewed. In fact, an exhaustive list is not the purpose of this section. Although there are a great number of definitions and no consensus of one definition, it can be noticed that the general idea and views about brand image are rather complementary.

## **2.1 Definitions**

The concept of brand image has been studied from the 1950s and has been recognized as an important part of consumer behaviour. Indeed, it is commonly accepted that brand image is one of the reasons that pushes consumers to buy products – physical dimensions are hence not the only motivator (Dobni and Zinkhan, 1990).

Lambin and de Moerloose (2008) separate brand image in three different levels; perceived brand image, real brand image and wanted brand image. Perceived brand image is the way that consumers understand the brand's image. Real brand image is the way that the brand really is, based on the company's internal opinions. Last but not least, wanted brand image is the way that the company wants its customers to perceive the brand. Hence, it is understood that there can be disparities between each level of brand image. For the purpose of this research, the focus will be on perceived brand image, which is the level that is the most commonly studied.

Dobni and Zinkhan (1990) have provided a taxonomy of brand image definitions following five major axes: blanket definitions; symbolism; meanings and messages; personification; cognitive or psychological elements. Some of the definitions that fall in these categories are listed in Table 3.

Table 3. Brand image definitions

<b>Blanket definitions</b>	"The sum of the total impressions" (Herzog, 1973)
	"Everything the people associate with the brand" (Newman, 1957)
	"The product perception" (Runyon and Stewart, 1987)
<b>Symbolism</b>	"Often products are associated with symbols, either socially extant or created by or for the advertiser" (Frazer, 1983)
	"From this perspective (i.e. semiotics) commodities are studied as signs whose meaning is the consumer's 'brand image'" (Noth, 1988)
<b>Meanings and messages</b>	"The concept of brand image aptly sums up the idea that consumers buy brands not only for their physical attributes and functions but also because of the meanings connected with the brands" (Levy and Glick, 1973)
	"The set of meanings and associations that serve to differentiate a product or service from its competition" (Reynolds and Gutman, 1984)
<b>Personification</b>	"Products are assumed to have personality image, just as people do" (Sirgy, 1985)
	"Also known as 'brand personality' or 'brand character', it involves nothing more than describing a product as if it were a human being" (Hendon and Williams, 1985)
<b>Cognitive or psychological elements</b>	"The total set of attitudes, the halo of psychological meanings, the association of feeling, the indelibly written aesthetics messages over and above the bare physical qualities" (Martineau, 1957)
	"the mental construct developed by the consumer on a basis of a few selected impressions among the flood of total impressions" (Reynolds, 1965)

Source: Dobni and Zinkhan (1990)

Dobni and Zinkhan's (1990) classification provides a general overview of the different perspectives that the definition of brand image can take. Nonetheless, it can be observed that some of these definitions are restrictive. For instance, Hendon and Williams (1985) state that brand image would be the equivalent to brand personality, thus limiting the concept to human features. Therefore, it is necessary to have a look at more recent definitions.

Dobni and Zinkhan (1990) state that brand image is a consumer's interpretation of a brand, which makes it a subjective concept. Being subjective, it is also characterized by perception. This means that the perception one has about a brand is more important than the reality of the brand. Indeed, Heude (2000) adds that brand image is a simplification of reality; in fact, consumers only remember a few characteristics about the brand. Overall, brand image is formed through marketing activities, by context and by individuals' own unique characteristics. As a result, there can be as many brand images as there are consumers (Malik *et al.*, 2012).

Aaker (1991) asserts that brand image is "a set of associations, usually organized in some meaningful way" (p.109). Similar to Aaker's (1991) view, a widely accepted definition of brand image is Keller's (1993) definition because it emphasizes the importance of associations in brand image. The author defines brand image as "perceptions about a brand as reflected by the brand associations held in consumer memory" (p.3). It refers to the way targets interpret the brand through its products, services and communication. The brand associations can thus come from the brand's marketing activities, from the consumer's direct experience with the brand and from what a consumer reads about the brand through media vehicles. Moreover, Keller (1993) separates three kinds of brand associations: attributes, benefits and attitudes. The definitions of these different types of association are listed in Table 4.

**Table 4. Brand associations**

<b>Attributes</b>	<p>“Attributes are those descriptive features that characterize a product or service - what a consumer thinks the product or service is or has and what is involved with its purchase or consumption” (Keller, p.4)</p> <p>Attributes can either be linked to the product or not be linked to the product (price, packaging, consumers, product usage).</p>
<b>Benefits</b>	<p>“Benefits are the personal value consumers attach to the product or service attributes-that is, what consumers think the product or service can do for them” (Keller, p.5)</p> <p>The nature of benefits can either be functional (linked to physiological needs), experiential (feelings linked to the usage of the product, sensory needs) or symbolic (need for social approval).</p>
<b>Attitudes</b>	<p>“Brand attitudes are defined as consumers' overall evaluations of a brand” (Keller, p.5).</p>

However, Korchia (2000) notices some limitations in Keller's definition of brand image. Indeed, he sees the fact that Keller's definition does not allow a brand to be compared to other brands as a weakness. For instance, according to Heude (2000) brand image is partly created by comparisons made with other brands. Nevertheless, given the notoriety of the definition, Keller's (1993) definition of brand image is chosen for this research although there is no comparison with other brands. Keller's (1993) definition has some advantages: it benefits from a high notoriety and it allows using associations to measure it. Measuring brand image is discussed in the next section.

## 2.2 Measuring Brand Image

Qualitative or quantitative methods or a combination of both can be used to measure brand image. For this study, the quantitative method will be used. The extent to which brand image is changed due to the usage of social media remains unexplored to our knowledge. It should be remembered that according to Keller (1993), brand image is defined as “perceptions about a brand as reflected by the brand associations held in consumer memory” (p.3). Hence, to measure brand image and by taking into account the latter definition, Chandon (2003) suggests using a list of associations such as Aaker’s (1997) brand personality list. This list is used in the present study but as the questionnaire was in French, an adaptation of Aaker’s (1997) brand personality list associations to the French context was used (Koebel and Ladwein, 1999).

Aaker’s (1997) theoretical brand personality framework identifies five dimensions of the construct (sincerity, excitement, competence, sophistication and ruggedness). The brand personality list takes into account a list of adjectives that are usually used to define human personality and applies it to brands. Figure 2 hereafter gives an overview of Aaker’s brand personality list. Whereas brand image is supposed to define a broader set of associations linked to a brand, brand personality refers only to those that describe individuals. Hence, brand personality can be characterized as a subset of brand image. Furthermore, as the brand personality list asks respondents to rate a set of adjectives, it asks them to give their opinion about how well these adjectives fit a brand – it is thus studied from a perceptual viewpoint (Michel, 2009). Thus, the perceptual dimension of brand image is the one that is adopted for this research.

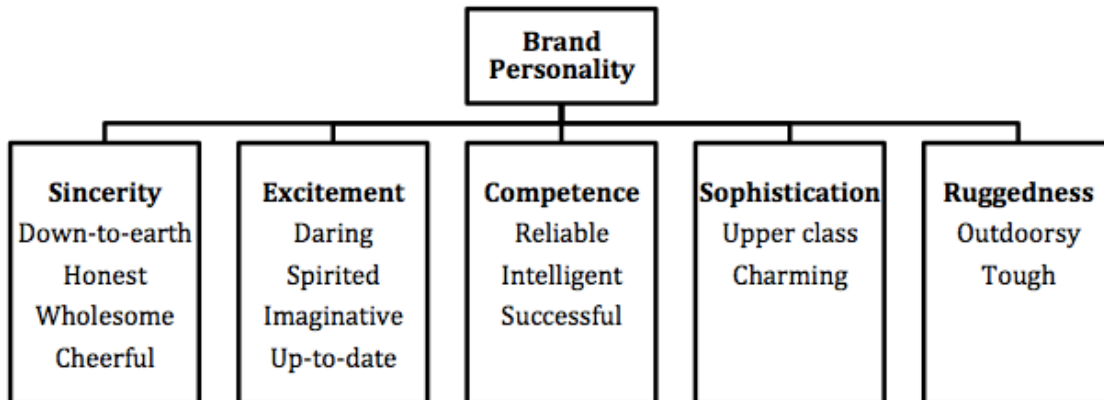


Figure 2. Brand personality list (Aaker, 1997)

Koebel and Ladwein (1999) have modified Aaker's (1997) scale of brand personality into a construct of six dimensions that is adapted to a French-speaking audience. The dimensions used are the following: "consciencieuse", "domination", "masculinité", "expansivité", "séduction" and "compétence". Adjectives are grouped into each of these dimensions and form symbolic associations of brand image. Figure 3 gives a representation this modified brand personality list.

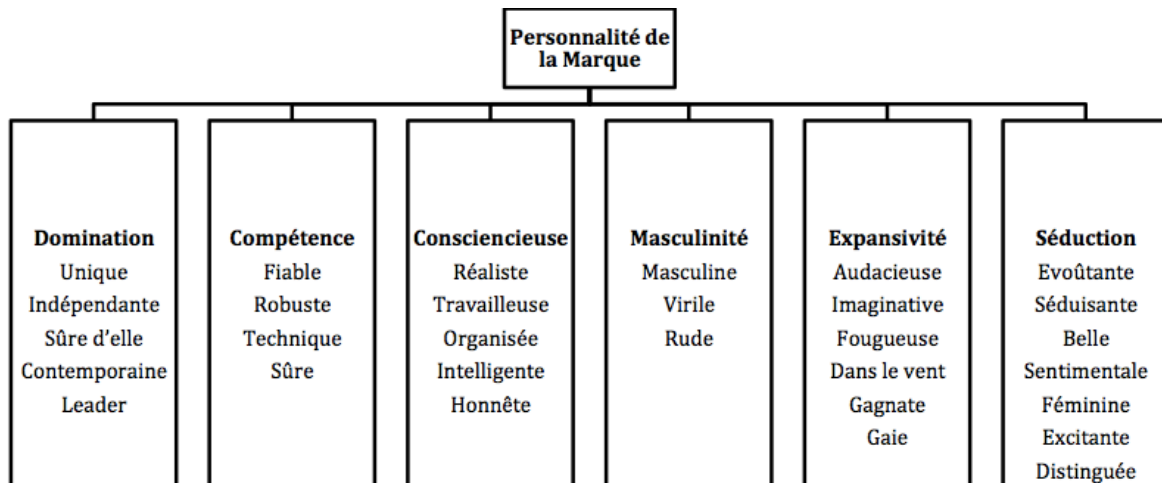


Figure 3. Adapted brand personality list (Koebel and Ladwein, 1999)

When asking respondents to rate the adjectives on a Likert scale, these allow creating a brand profile. The brand profile can then be compared with other brands. In this

research, a brand profile will be created in both cases: before the brand is on social media and after its transition to social media. This allows comparison and seeing whether changes occur in a brand's image, adopting the perceptual dimension and using the adapted brand personality list.

Furthermore, in order to complete the analysis of brand image, an additional measure of brand image is used that is adapted to the online context, and thus to the social media environment. In fact, Kwon and Lennon (2009) measure offline and online brand attitude and brand beliefs in order to identify changes in brand image. The authors suggest that the online context of a brand may be different than its offline context thus leading to discrepancies in the brand image. In this respect, it must be acknowledged that there are differences between a "traditional" brand and an e-brand. The term e-brand, also known as online brand, should be understood as a brand that exists within the framework of the Web (Lewi, 2013). According to Lewi (2013), brands and e-brands both pursue the same objective (developing and securing the loyalty of clients) but have opposing methods. The notion of e-brand has been presented as being opposed to a brand precisely because of the context of the Web, in which everything goes fast and changes all the time. On the contrary, a brand seeks stability and consistency over time.

For the context of this research, Kwon and Lennon (2009) method is partially adopted. The scale for measuring online and offline brand attitude will be used. In fact, the items for brand beliefs are more adapted to website characteristics. Therefore, they are not retained in this research. Hence, only brand attitude items are used. They are particularly useful as they are associated with positivity and negativity. Therefore, one can observe whether the passage to social media is positive or negative for brand image, depending on the manner in which the brand behaves on social networking sites.

### 2.3 Summary

Brand image is important from a managerial point of view because it can influence purchasing behaviour (Malik *et al.*, 2012), brand satisfaction and brand loyalty (Chung *et al.*, 2012). Hence, it is essential to know whether brand image changes when a brand goes onto social media.

Numerous definitions of brand image exist and no agreement has been found about one definition. Nonetheless, Keller's (1993) brand image definition is retained for this research because of its notoriety in literature: "perceptions about a brand as reflected by the brand associations held in consumer memory" (p.3). According to the author, associations can be of three different types: attributes, benefits and attitudes.

As the present research aims at examining perceived brand image, the perceptual dimension of brand image is studied. According to Chandon (2003), a way to measure brand image through its associations is by using Aaker's (1997) brand personality list. Hence, Koebel and Ladwein's (1999) adapted version of the brand personality list to the French context is used. Furthermore, Kwon and Lennon (2009) suggest measuring offline and online brand attitude in order to determine if there are changes in brand image that result from the online environment. As the study focuses on analysing a change in brand image after a transition to social media, this scale is appropriate and hence also used.

### Chapter 3 – Research Model

Chapter 2 showed the complexity of brand image because of the lack of consensus on a definition of the concept. This chapter presents the research model and formulated hypotheses.

Theoretically, the impact of social media on brands has been studied extensively. Indeed, several studies have shown that they can positively affect some aspects of consumer behaviour like “awareness, information acquisition, opinions, attitudes, purchase behavior, and post-purchase communication and evaluation” (Mangold and Faulds, 2009, p.358). Perhaps most notably, authors have found that social media impact purchase intention (Hutter *et al.*, 2013), thus leading to higher sales (Kaplan and Haenlein, 2010; Kietzmann *et al.*, 2011; Hanna *et al.*, 2011; Tsimonis and Dimitriadis, 2013; Girona and Korgaonkar, 2014).

However, there is a lack of literature studying the impact of social media on brand image. More specifically, to our knowledge, the effects of the underlying characteristics of social media (i.e. transparency and interactivity) on brand image have not been analysed. Hence, given the importance of understanding a brand’s image from a managerial point of view, there is an interest in explaining the impact of a brand’s shift to social media on brand image.

Concerning transparency, Tapscott and Ticoll (2012) observe that transparent companies are more successful: these companies can build trust, compete better and gain higher profits. Kang and Hustvedt (2013) find that transparency has a direct impact on trust and attitudes towards the company. Besides, there is an indirect impact towards purchasing intentions and positive WOM. Nonetheless, these studies apply to

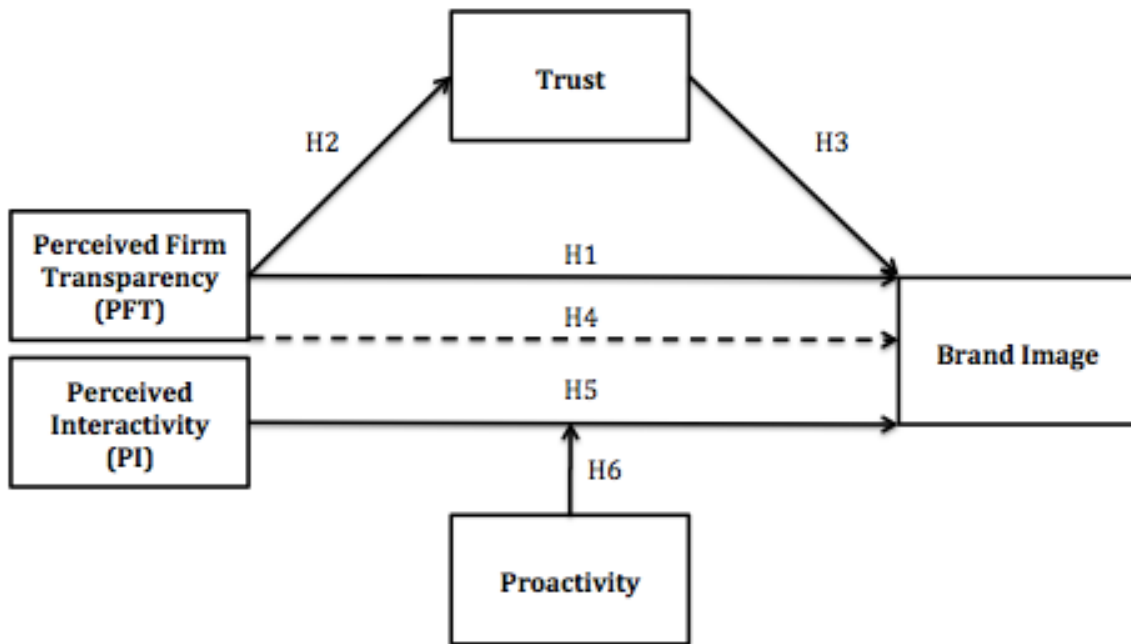
transparency in general and not specifically to the social media context. As it has been mentioned earlier, transparency is an important attribute of social media. In fact, because consumers demand more information about brands and thus request that they become more transparent, questioning whether this could impact brand image seems relevant.

Regarding interactivity, Wang *et al.* (2012) observe that it has a positive effect on consumer involvement. In addition, the authors note that consumer involvement has a positive effect on consumers' purchase intentions and on their willingness to initiate word-of-mouth (WOM). With respect to WOM, Chu and Kim (2011) have examined and acknowledged the influence of interactivity on electronic word-of-mouth (eWOM). As eWOM reaches a great amount of people on social media (King *et al.*, 2014), negative comments can have a negative impact on brand image (Shang *et al.*, 2006). These studies pinpoint aspects that can be affected by interactivity. Indeed, the fact that negative eWOM can damage brand image shows that what happens online has an influence on brands. This gives a first hint at establishing the possible link between interactivity and brand image.

Furthermore, studies have analysed the impact of brand communications on brand image. For instance, according to Bruhn *et al.* (2012), social media communications have a positive influence on brand image. Additionally, Chu and Kim (2015) analysed ads on social media according to their level of perceived interactivity and find that a low or high level of interactivity does not change consumer attitude towards the brand.

Although several aspects of interactivity and transparency within the context of social media have been explored, it appears that no literature has studied their direct effect on brand image. There is a literature gap concerning the effect of a brand's presence on social media regarding how it can impact brand image. Therefore, this study brings a contribution to the existing literature by proposing that these two main components of social media influence brand image.

Figure 4 below shows the hypotheses and displays the research model that will be tested.



**Figure 4. Research model to be tested**

The proposed model includes a dependent variable - brand image - and two independent variables, namely perceived firm transparency (PFT) and perceived interactivity (PI). Furthermore, it is suggested that trust mediates the relationship between perceived firm transparency and brand image. In addition, proactivity acts as a moderator on the relationship between perceived interactivity and brand image.

Let us remind ourselves of the main question that we are trying to answer with this research: “Does a brand’s transition to social media impact its brand image?”

### ***Mediation***

#### **Hypothesis 1: There is an effect of perceived firm transparency on brand image**

Dapko's (2012) study shows that transparency is beneficial for firms in terms of customer appreciation, sales, profits and loyalty. Hence, the present study suggests that it is also positive for brand image. If this hypothesis is verified, it will be interpreted through the observed effect, in other words the relation between perceived transparency and brand image will be explained through the effect of a mediator. In this context, it is hypothesized that trust acts as a mediator between perceived transparency and brand image.

#### **Hypothesis 2: There is a positive effect of perceived firm transparency on trust**

As a consequence from the transparency manipulation, there should be a higher level of trust for those respondents that were exposed to transparency.

#### **Hypothesis 3: There is a positive effect of trust on brand image**

In order for trust to be a mediator, it must also have an effect on brand image. Thus, trust should have a positive effect on brand image.

#### **Hypothesis 4: Effect of transparency on brand image when trust is neutralized**

Finally, the first three hypotheses are not sufficient in order to prove the influence of perceived transparency on brand image through trust. Hence, it has to be tested whether the effect of perceived transparency disappears or diminishes when controlling the effect of trust. If the effect of trust disappears, it is a case of full mediation. If the effect of trust diminishes but stays significant, it is a case of partial mediation.

### ***Moderation***

#### **Hypothesis 5: Perceived interactivity has a positive effect on brand image**

It is proposed that interactivity influences brand image. In fact, the reasoning is that if a consumer perceives a brand as being interactive, the brand's image will be positively affected.

#### **Hypothesis 6: The influence of perceived interactivity on brand image is moderated by proactivity**

Furthermore, it is also suggested that proactivity moderates the relationship between interactivity and brand image. It appears reasonable to assume that in an environment – social media – where consumers react to information provided, proactivity will have a moderating influence on the outcome. In fact, proactive consumers should be the ones that willingly interact with brands. Hence, their behavior should strengthen the effect of perceived interactivity on brand image.

## **Part 2 – Quantitative analysis**

The aim of the study is to identify whether the fact of going onto social media for a brand can impact its brand image. Through the literature review, reasons have been identified that show that social media induce fundamental changes in the way marketing is conducted. Indeed, digital marketing differs from traditional marketing in various ways. For instance, digital marketing or marketing on social media requires that brands become more interactive with their consumers. Furthermore, it has also been suggested that the use of social media induces changes in consumer behaviour. In fact, as their role changes and becomes pivotal, they are empowered and can also ask brands to make an effort and become more transparent. Thus, challenges appear regarding brand images when going onto social media, namely perceived transparency and perceived interactivity. Furthermore, it has been suggested that trust mediates the relationship between transparency and brand image and proactivity moderates the relationship between perceived interactivity and brand image.

<h3><b>Chapter 1 – Methodology</b></h3>
---

In the previous chapter, the research model and hypotheses were presented. This chapter will outline the methodology. It will go through the following points: research design, research sample, respondents profile, research procedure, variables measurement and data analysis.

#### **1.1 Research design**

This research aims at analysing the impact of brands' different usages of social networking sites, i.e. Facebook for this current study, on brand image. The hypotheses are that perceived transparency and perceived interactivity have a positive impact on brand image. Furthermore, it is hypothesized that trust mediates the relationship between transparency and brand image and that consumer proactive behaviour

moderates the relationship between perceived interactivity and brand image. In order to test the hypotheses, a quantitative research method is used.

In order to carry out the research and thus confirm hypotheses, an online survey has been developed to measure the relationships between different variables (cf. Appendix 1 – Questionnaire). This method will allow analysing the influence of perceived transparency and perceived interactivity (independent variables) on brand image (dependent variable).

In order to test the hypotheses, a fictitious case study will be used that contains four different scenarios (cf. Appendix 2 – Scenarios). The scenarios depict different levels of transparency and interactivity. The different levels (high-high, low-low, high-low and low-high) are manipulated to test their influence on brand image.

For this study, the survey was sent through the Internet, i.e. Facebook, in order to reach enough respondents and collect data.

### ***Experimental manipulation***

One goal of this research is to explore the effects of social media's perceived transparency and perceived interactivity on consumer perception of a brand's image. Therefore, the manipulations consist in introducing transparency and interactivity stimuli in the developed scenarios. These manipulations are implemented to see whether brand perception differs when a brand displays lower or higher levels of both transparency and interactivity and whether it is perceived as such by the consumers.

There are four scenarios: the first one has both low levels of transparency and interactivity; the second one has both high levels of transparency and interactivity; the third scenario displays a high transparency and a low interactivity; last but not least, the fourth scenario has a low level of transparency but a high level of interactivity.

Practically, the scenarios were constructed in such a way that they would differ according to their respective levels of transparency and interactivity. Hence, a participant that received a questionnaire where scenario 1 was put in place (low transparency and low interactivity) would read about the brand's poor interactivity levels and poor transparency display. Table 5 hereafter shows what was introduced in the questionnaires in order for the respondents to perceive the different levels of the brand's transparency and interactivity:

**Table 5. Questionnaire texts for low/high transparency and interactivity**

Transparency	Low	La page Facebook de Medallion's Potato Chips n'a pas fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise n'a également pas encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises.
	High	La page Facebook de Medallion's Potato Chips a fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise a également encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises.
Interactivity	Low	Sur sa page Facebook, Medallion's Potato Chips ne poste pas beaucoup de nouvelles à propos de sa marque. Par ailleurs, le contenu qui est partagé n'est pas engageant, ni varié, ni intéressant. Il arrive que la marque réponde aux questions de ses consommateurs mais ce n'est pas systématique et généralement, les réponses ne sont pas données immédiatement mais quelques jours plus tard. Quelques consommateurs se sont plaints car leurs commentaires ont été effacés.
	High	Sur sa page Facebook, Medallion's Potato Chips poste beaucoup de nouvelles à propos de sa marque. Le contenu qui est partagé est engageant, varié et intéressant. La marque répond systématiquement aux questions de ses consommateurs. De plus, généralement, les réponses sont données dans l'heure qui suit.

These manipulations have been introduced in order to observe whether respondents' perception of the brand is different depending on the scenario they are confronted to.

### ***Development of stimuli***

For the sake of this study, it was decided to base the scenarios on a fictitious case to avoid biasing our investigation on different levels and to be able to control variables such as preconceived opinions, attitudes, company reputation, perceived quality, external environment and influences. By choosing a fictitious case, it is ensured that all respondents are confronted with the same level of information and any associations that respondent could have with a real case are thus blocked. Hence, externalities related to prior consumer knowledge are avoided.

The choice of the fictitious brand case was inspired from an existing scenario provided by Keller and Aaker (1992). In their research, the authors took into account two main stimuli: product category and core brand. Regarding the product category, “foods that could be eaten as snacks were chosen as the product class because we believed subjects would have purchase and usage experience” (p. 40). The core brand was chosen as stated: “To avoid confounding quality with other possible brand associations, we used hypothetical brands that combined unfamiliar brand names with information about quality” (p.41). The authors also tested fictitious brand names to select the most appealing ones for potato chips – the snack product that was chosen for their fictitious brand case. They came up with two scenarios – one displayed a high quality product and the other one displayed an average quality product. For the present research, the scenario with average quality was selected and used as the fictitious brand’s description. The choice of average over high quality was made because it is believed to be more likely to be perceived as realistic by the readers:

*“The company’s main product is Crane’s Potato Chips. This brand has shown small sales growth in the 15 years of its existence. Consumers have shown some loyalty to Crane’s and will sometimes pay a premium price for the potato chips. Retailers keep it well-stocked, but not in a prominent position in the store” (p.41).*

For the questionnaire (cf. Appendix 1 – Questionnaire), that was directed at French speaking respondents, the scenario was translated and the brand name was changed for the second name proposed by the authors to avoid any connotation with the French word “crâne”. Thus, the brand name used in the brand description for this study is “is Medallion Potato Chips”. The product category and core brand were kept for the same reasons as Keller and Aaker (1992) chose them for their study. Moreover, potato chips are neither gender-specific nor age-specific, which allows sending the questionnaire to anyone. Finally, this scenario was adopted to serve as the brand description of the case study used in the present study, from which four scenarios were derived (scenarios where the levels of transparency and interactivity varied from low to high).

The four scenarios were elaborated on basis of scientific articles related in the literature review. They were formulated so that different levels of transparency and interactivity would be perceived. The text for transparency was adopted and partly modified from Dapko’s (2012) study, where scenarios of low transparency and high transparency are presented. Regarding the interactivity part, the text was elaborated so that it would reflect the dimensions of perceived interactivity as described by McMillan and Hwang (2002). Hence, the scenarios reflect and respect the stimuli that are being analysed in the present study. The different scenarios are created with the purpose of comparing whether consumers possess different perceived brand images when the levels of transparency and interactivity differ.

### ***Pre-test***

An intermediary questionnaire was created to conduct a pre-test and make sure that the stimuli were clearly understood. At the end of the questionnaire, participants were asked to give remarks if things were unclear. As there were four scenarios, a total of 24 questionnaires were filled (6 participants per questionnaire). Some minor changes were introduced that concerned questionnaire layout, e.g. font size and correcting typos. Moreover, the difference between interactivity and transparency in the scenarios where

the levels low/high differed was not perceived as good as expected. Thus, some changes were added to the transparency scenario. In fact, it was decided to add in the transparency part of scenarios 3 and 4 (scenarios with mixed levels of transparency and interactivity) a statement that the company was or was not transparent.

## **1.2 Research Sample**

For the purpose of this study, no defined consumer type was chosen. The only major requirement was that respondents should be familiar with Facebook as the scenarios talk about the transition of a brand onto a social networking site, i.e. Facebook. Facebook was selected because it is most used and well-known social networking site with more than 1.5 billion monthly active users worldwide (Statista, n.a.)

Nonetheless, the population to whom the questionnaire was directed were French-speaking respondents that possess a Facebook account. The questionnaire was distributed through Facebook. The survey was spread among respondents in Belgium and Switzerland. No restrictions were made regarding respondents' gender, age or activity. However, most respondents were students.

The sample size was set to a minimum of 30 respondents per scenario in order to fit statistical requirements for a normal distribution. Hence, data from a minimum of 120 respondents had to be collected and the aim was to collect 200 participant responses. To ensure that no respondent would receive a questionnaire twice, some initial respondents with different backgrounds were selected to fill in the questionnaire and were asked to send the questionnaire to acquaintances, thus creating a snowball effect.

## **1.3 Respondents**

The sample consists of 205 respondents. In the sample, 48.3% were male and 51.7% were female respondents. Moreover, approximately 2% were under 18 years old, 35%

were between 18-24 years, 50% were between 25-34 years, 4% were between 35-44, 4% were between 45-54 and finally 5% were above 54 years. Furthermore, 51% were students, 40% were workers, 1% was retired, 3% were unemployed and 5% had another status.

The dataset had to be checked up to verify whether any participant had to be removed. Some surveys were not fully completed. Thus, these had to be removed which led to unequal distribution of participants per scenario. In total, 205 respondents were kept for analysis. Table 6 shows the distribution for the scenarios.

**Table 6. Scenario distribution**

<b>Scenarios</b>	<b>Medallion's Potato Chips</b>
Low Transparency and Low Interactivity	50 Participants (24.4%)
High Transparency and High Interactivity	50 Participants (24.4%)
Low Transparency and High Interactivity	53 Participants (25.9%)
High Transparency and Low Interactivity	52 Participants (25.4%)
Total	205 Participants (100%)

Among the respondents, 100% possessed a Facebook account and were thus familiar with the functioning of this social networking site.

#### **1.4 Procedure**

The survey was created using SurveyMonkey. Before transferring the collected data to SPSS, it was first exported on an Excel file. Web links were created directly from the website in order to give them to the respondents so that they could fill in their assigned questionnaire (cf. Appendix 1 – Questionnaire).

The respondents were contacted through Facebook and were asked to participate in the survey. Firstly, they read about the purpose of the questionnaire, in which they were told they were participating in the survey for the purpose of completing a master thesis. Besides, they were also told it would last about 10 minutes and they were asked to read carefully the information given about the fictitious brand.

Secondly, respondents were asked to fulfil the questionnaire. The questionnaire was composed of several parts. To begin, respondents had to read a short description of the fictitious brand. Then, they had to answer to a series of questions about the brand image variable. Once this step was completed, respondents were confronted to one of the four scenarios (cf. Appendix 2 – Scenarios) and were asked to read it before answering the rest of the questions. The next questions aimed at collecting data about the rest of the variables, namely perceived transparency, trust, perceived interactivity and proactivity. Moreover, the questions about the brand image variable were asked again (allowing for a before/after comparison). Finally, demographics about the respondents were asked.

### **1.5 Measurement of variables**

As the respondents to whom the survey was sent to were French-speaking, the whole questionnaire was written in French. To measure the variables tested in this study, validated scales that were tested empirically in previous research were used. Nonetheless, some of these had to be translated from English to French. In order to make sure that the translations were correct they were checked by another person and then a native English speaker was asked to translate the items again from French to English to make sure they matched or were close enough from the original items. Most variables were measured by a Likert scale from 1 (totally disagree) to 5 (totally agree). One variable also used a semantic differential scale with four sets of opposing adjectives.

Five variables had to be measured for the research: perceived transparency (independent variable), perceived interactivity (independent variable), trust (mediation variable), proactivity (moderation variable) and brand image (dependent variable).

- Perceived transparency was measured by using Dapko's (2012) one-dimensional four-item scale. Respondents were asked to give their opinion about the statements based on the scenario they had read and give a judgment on a Likert scale from 1 (totally disagree) to 5 (totally agree).
- Perceived interactivity was measured using McMillan and Hwang (2002) scale. This scale is based on three dimensions: real-time conversation, no delay and engaging. However, the "no delay" dimension was not taken into account in this study because it exclusively refers to the speed and responsiveness of a website, which is irrelevant in the context of a social media page. Hence, 7 items regarding the real-time conversation were kept. The engaging dimension initially had 8 items but two were removed. One was removed because it referred to a website's specific features; the second one was removed because no appropriate translation was found. Thus, 6 items remained for the engaging dimension of perceived interactivity. Respondents were asked to give their opinion about the statements based on the scenario they had read and give a judgment on a Likert scale from 1 (totally disagree) to 5 (totally agree).
- Trust is a construct that can be defined through three main dimensions – credibility, integrity and benevolence – according to Gurviez and Korchia (2002). Their scale was used to measure trust. Three items are relative to credibility, three others are relative to integrity and two items are attributed to benevolence. Respondents were asked to give their opinion about the statements based on the scenario they had read and give a judgment on a Likert scale from 1 (totally disagree) to 5 (totally agree).

- Proactivity was measured using Jore's (2012) translation from English to French of Bateman and Crant's (1993) Proactive Personality scale. This is a unidimensional scale composed of 17 items. Respondents were asked to give their opinion about the statements based on the scenario they had read and give a judgment on a Likert scale from 1 (totally disagree) to 5 (totally agree).
  
- Brand image was measured using an adaption to the French context (Koebel and Ladwein, 1999) from Aaker's (1997) brand personality list. Using this framework for measuring brand image has been chosen because it is based on the perceptual dimension of brand image (Michel, 2009), which is what is being analysed in this research. Koebel and Ladwein (1999) identified 6 dimensions to this adapted version and a total of 30 items. Here, respondents were asked to give their opinion about the statements based firstly on a short description of the fictitious brand and secondly based on the scenario they had read and give a judgment on a Likert scale from 1 (totally disagree) to 5 (totally agree). Furthermore, in order to observe a potential change in attitude towards the brand after having been exposed to a scenario, a semantic differential scale has also been used, as suggested by Kwon and Lennon (2009) in their study about the difference between offline and online brand image. The set of words used were: good-bad, pleasant-unpleasant, favourable-unfavourable, like-dislike.
  
- In addition, a set of questions was asked about participants' gender, age and activity.

## **1.6 Data Analysis**

Before starting to analyse the results through SPSS, validity and reliability analyses were conducted for the measures used in the survey. Hence, a factor analysis was made on the different items and dimensions of each scale that was used. In order to see whether the scales were reliable, Cronbach's alpha was checked and had to be superior to .7. For the

items of a same dimension where Cronbach's alpha was high enough, new variables were computed. Table 7 hereafter provides a summary of this analysis.

**Table 7. Cronbach's alphas**

<b>Measures</b>	<b>Variables</b>	<b>Cronbach's <math>\alpha</math></b>	<b>#items</b>
Brand Personality	Domination Q1.1 – Q1.5	.760	5
	Compétence Q1.6 – Q1.9	.511	4
	Consciencieuse Q1.10 – Q1.14	.720	5
	Masculinité Q1.15 – Q1.17	.737	3
	Expansivité Q1.18 – Q1.23	.815	6
	Séduction Q1.24 – Q1.30	.792	7
Brand Attitude	Brand attitude Q2 – Q5	.842	4
Perceived Transparency	Transparency Q6.1 – Q6.4	.911	4
Perceived Interactivity	Real time conversation Q7.1 – Q8.7	.741	7
	Engaging Q7.8 – Q7.13	.784	6
Trust	Credibility Q8.1 – Q8.3	.860	3
	Integrity Q8.4 – Q8.6	.830	3
	Benevolence Q8.7 – Q8.8	.781	2
Proactivity	Proactivity Q14.1 – Q14.17	.872	17

Surprisingly, Cronbach's alpha for "compétence" got a score of .511, which is not satisfying given the fact that results are expected to be superior to .7. The result is even more intriguing given the fact that "competence" is a dimension that is common to both Aaker's (1997) and Koebel and Ladwein's (1999) scales. Looking at Koebel and Ladwein's (1999) research, the dimension "compétence" indicated a score of .82.

Hence, for the scales that were asked twice in the questionnaire, Cronbach's alpha was verified again with the data collected when the questions were asked a second time to the respondents. The results are shown in Table 8 below.

**Table 8. Cronbach's alphas before/after**

<b>Measures</b>	<b>Variables</b>	<b>Cronbach's <math>\alpha</math> - Before</b>	<b>Cronbach's <math>\alpha</math> - After</b>	<b>#items</b>
Brand Personality	Domination	.760	.882	5
	Compétence	.511	.760	4
	Consciencieuse	.720	.751	5
	Masculinité	.737	.773	3
	Expansivité	.815	.897	6
	Séduction	.792	.883	7
Brand Attitude	Brand attitude	.842	.938	4

When the reliability analysis is run on the items that were asked for the second time, Cronbach's alphas are all above the .7 minimum expected score. All the scores are higher than when they were tested for the first time. Furthermore, the dimension "compétence" has an increase from .511 to .760. Although it is not clear why the difference is so big, a possible explanation would be the fact that some respondents have answered to the questions randomly.

## Chapter 2 – Results

In the previous chapter, the methodology was described. This chapter presents the results of the survey. First, the results from the manipulation check will be provided. The following sections will analyse the results from the previously stated hypotheses.

### 2.1 Manipulation check

A manipulation check (cf. Appendix 3 – Manipulation Check) was done to make sure that the difference between each of the four scenarios was correctly perceived. It was

necessary that the different levels of transparency and interactivity were clear to the participants. Hence, items about perceived transparency and perceived interactivity were included in the questionnaire after presentation of the scenarios. These items were measured with a Likert scale from 1 (strongly disagree) to 5 (strongly agree). Depending on the scenario that the respondent is confronted with, the questions must be answered with a significant higher or lower value to 3 – 3 being the test value (neutral option). In order to test this, a one sample t-test was conducted for each scenario on the items from questions 6 and 7 (questions related to transparency and interactivity). Table 9 hereafter shows what scenario corresponded to what levels of transparency and interactivity.

**Table 9. Scenario correspondence to transparency and interactivity levels**

Scenario 1	Low transparency – Low interactivity
Scenario 2	High transparency – High interactivity
Scenario 3	High transparency – Low interactivity
Scenario 4	Low transparency – High interactivity

The results show that for scenarios 1 and 2, there is a significant difference from the value 3 (p-value < 0.05) for all items. However, not all the results are significantly different from the value 3 in scenarios 3 and 4 where there are respectively low interactivity / high transparency and high interactivity / low transparency. Hence, it was concluded that the scenarios where both levels are the same are understood, however, scenarios 3 and 4 need have several items that are not significantly different from the mean. The results are found in Table 10 hereafter.

**Table 10. One Sample T test**

Test Value = 3								
	Scenario 1		Scenario 2		Scenario 3		Scenario 4	
Item	df	Sig. (2-tailed)	df	Sig. (2-tailed)	df	Sig. (2-tailed)	df	Sig. (2-tailed)
<b>Q6.1</b>	49	.000	49	.000	52	.000	51	.001
<b>Q6.2</b>	49	.000	49	.000	52	.063	51	.214
<b>Q6.3</b>	49	.000	49	.000	52	.898	51	.799
<b>Q6.4</b>	49	.000	49	.000	52	.007	51	.124
<b>Q7.1</b>	49	.000	49	.000	52	.000	51	.051
<b>Q7.2</b>	49	.000	49	.000	52	.000	51	.000
<b>Q7.3</b>	49	.000	49	.000	52	.004	51	.001
<b>Q7.4</b>	49	.000	49	.000	52	.000	51	.000
<b>Q7.5</b>	49	.000	49	.000	52	.000	51	.733
<b>Q7.6</b>	49	.019	49	.000	52	.290	51	.004
<b>Q7.7</b>	49	.000	49	.000	52	.000	51	.007
<b>Q7.8</b>	49	.000	49	.000	52	.000	51	.000
<b>Q7.9</b>	49	.000	49	.000	52	.000	51	.000
<b>Q7.10</b>	49	.000	49	.000	52	.000	51	.003
<b>Q7.11</b>	49	.000	49	.000	52	.001	51	.000
<b>Q7.12</b>	49	.000	49	.000	52	.000	51	.000
<b>Q7.13</b>	49	.000	49	.000	52	.000	51	.428

Items Q6.1 to Q6.4 are the transparency related items, whereas items Q7.1 to Q7.13 are the interactivity related items. One can observe that although some values for the interactivity items are not significantly different from .05, this concerns a minority of the items tested. The items concerning the perception of transparency are somehow more problematic in scenarios 3 and 4. Indeed, the transparency scale is composed of four

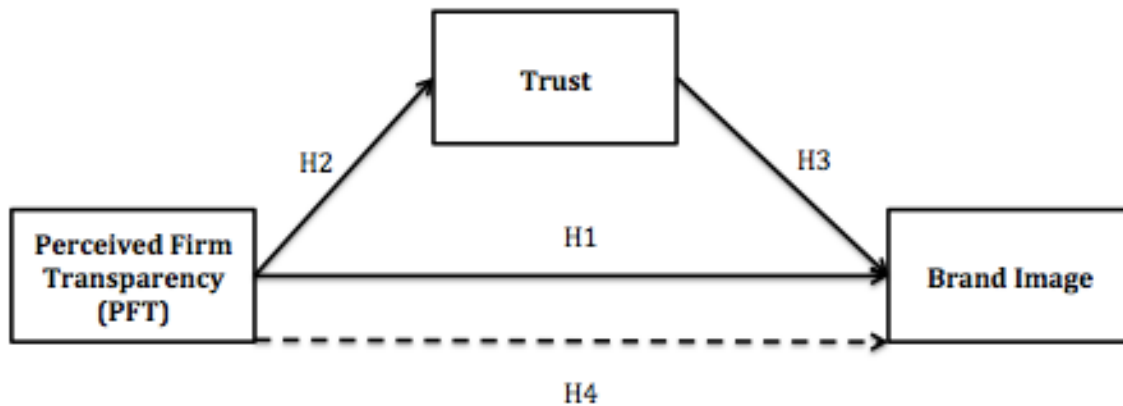
items, in which two are not statistically different from 3 in scenario 3 and three are not statistically different from 3 in scenario 4. A possible explanation for this is that interactivity plays a larger role than transparency and thus may have an influence on the perception of transparency by mitigating the expected results in scenarios 3 and 4. Therefore, the results will be kept as such and some additional precautions will be taken when analyzing the hypotheses.

## **2.2 Hypotheses testing**

This section goes through the analysis of the formulated hypotheses. Firstly, the mediation will be analysed. Some explanations about mediation are given for a clearer understanding of the concept and then, hypotheses H1 to H4 are tested. Secondly, the moderation is analysed. Again, the moderation will be explained and the remaining hypotheses – H5 and H6 – will be tested.

### ***Mediation***

“A mediator is a variable that represents a mechanism by which the variable X influences the variable Y : the variable X influences the mediator and the latter, in turn, influences the variable Y” (Chumpitaz Caceres and Vanhamme, 2003, p. 69, own translation). Figure 5 hereafter depicts the mediation relation in this research.



**Figure 5. Mediation**

In order to test this mediation, there are two independent variables (transparency and trust) and we want to decide if one is acting as a mediator (trust), i.e. controlling the significance of the model. In order to have a mediator, the correlation between transparency and brand image (dependent variable) has to be significant.

Moreover, “it must be stressed at this stage, that if the influence of X on Y disappears completely in the presence of the supposed mediator variable, it is a case of so-called complete mediation. When the influence of X on Y is simply reduced but does not disappear completely when the influence of potential mediator is controlled, we find ourselves in a case called partial mediation” (Chumpitaz Caceres and Vanhamme, 2003, p. 81, own translation).

*Hypothesis 1: There is an effect of perceived firm transparency on brand image*

Here, the impact of perceived firm transparency (categorical variable with two modalities) on brand image (continuous variable) is tested (cf. Appendix 4 – Hypothesis 1). To perform this test, a one-way ANOVA is used. The homogeneity of variances condition is respected. ( $F(1,203)=.166$ ,  $p\text{-value} = .684 > .05 \rightarrow$  homogeneity of variances condition is not rejected). Hence, the ANOVA can be checked.

The ANOVA test is significant ( $F(1,203)=5.954$ ,  $p\text{-value} < .05$ ): there is a significant

effect of perceived firm transparency on brand image. Moreover, the descriptives analysis shows that the mean for a low transparency condition is higher than for a high transparency condition ( $2.71 > 2.38$ ). This means that for the low transparency condition, respondents were more likely to rate the brand negatively on the semantic differential scale. The contrary applies to the high transparency condition. This is in line with what was expected.

**Conclusion: H1 is validated. There is an effect of perceived firm transparency on brand image.**

*Hypothesis 2: There is a positive effect of perceived firm transparency on trust*

Here, the impact of perceived firm transparency (categorical variable with two modalities) on trust (continuous variable) is tested (cf. Appendix 5 – Hypothesis 2). In the complete model, trust has the role of the mediating variable. Nevertheless, in this case it becomes the dependent variable. As for H1, in order to perform this test, a one-way ANOVA is used.

The homogeneity of variances condition is respected. ( $F(1,203)=.122$ ,  $p\text{-value} = .727 > .05 \rightarrow$  homogeneity of variances condition is not rejected). Hence, the ANOVA can be checked.

The ANOVA test is significant ( $F(1,203)=10.7$ ,  $p\text{-value} < .05$ ): there is a significant effect of perceived firm transparency on trust. Moreover, the descriptives analysis shows that the mean for a low transparency condition is lower than for a high transparency condition ( $2.93 < 3.26$ ). Again, this is in line with expectations. Indeed, trust was rated on a Likert scale from 1 (Do not agree at all) to 5 (Totally agree). This means that on average, when respondents faced a low transparency scenario, they found the fictitious brand less trustworthy than when they faced a high transparency scenario.

However, trust has been defined as a tri-dimensional construct that includes credibility, integrity and benevolence (Gurviez and Korchia, 2002). Hence, the ANOVA analysis has to be performed on each of the dimensions to make sure that there is an effect of perceived firm transparency on each of the dimensions of trust.

The homogeneity of variances condition is respected for credibility, integrity and benevolence. The values are found in Table 11 hereafter.

**Table 11. Homogeneity of variances**

Credibility	$F(1,203)=.010$ , p-value = .922 > .05	→ homogeneity of variances condition is not rejected
Integrity	$F(1,203)=.023$ , p-value = .881 > .05	
Benevolence	$F(1,203)=1.699$ , p-value = .124 > .05	

Hence, the ANOVA can be checked. The ANOVA test is significant for credibility and integrity but not for benevolence. This means that there is a significant effect of perceived firm transparency on credibility and integrity but not on benevolence. Hence, benevolence is not taken into account for the rest of the analysis. Table 12 below shows the results from the ANOVA.

**Table 12. ANOVA test**

Credibility	p-value = .006 < .05
Integrity	p-value = .001 < .05
Benevolence	p-value = .194 > .05

Moreover, the descriptives analysis shows that the mean for a low transparency condition is lower than for a high transparency condition for all three dimensions. The means are found in Table 13. Again, this shows that when respondents faced a low transparency scenario, they found the fictitious brand less trustworthy than when they faced a high transparency scenario.

**Table 13. Means**

Credibility	Low Transparency	3.09
	High Transparency	3.41
Integrity	Low Transparency	2.95
	High Transparency	3.38
Benevolence	Low Transparency	2.75
	High Transparency	2.99

**Conclusion: H2 is partly validated. There is an effect of perceived firm transparency on credibility and integrity and on the general construct of trust. However, there is no effect of perceived firm transparency on benevolence.**

*Hypothesis 3: There is a positive effect of trust on brand image*

When testing H3 (cf. Appendix 6 – Hypothesis 3), trust is a continuous variable and so is brand image. Hence, the adequate test to perform is a linear regression. There are two conditions for applying this test: first, normality of the distribution has to be checked for all variables; secondly, making a scatter plot ensures that the relationship between trust (also credibility and integrity) and brand image variables is linear.

1. When checking for normality of distribution for trust, credibility, integrity, benevolence and brand image, a test of normality was conducted. According to the output (Shapiro Wilk test), the only the only variable for which the null hypothesis is not rejected and validates a normal distribution is for the variable trust. However, the Shapiro Wilk test is particularly useful when there are not a lot of observations with the same value. Hence, as the variables were rated on a scale of 1-5, most values would be rated between 2-4. For this reason, normality of distribution for the other variables will be checked based on normal Q-Q plots. Following this procedure, normality of distribution is validated for all variables.

2. Graphically, a negative linear relationship between brand image and trust is observed. The same is observed for the relationship between credibility, integrity, benevolence and brand image.

Once these conditions are verified, the linear regressions can be realized to check that trust is a significant predictor of brand image.

- The R reveals that trust (predictor) can explain 66.4% of the total variance. The result of the ANOVA confirmed the significance of the predictor "trust" on brand image ( $F(1,203) = 160.511$ ,  $p\text{-value} < .05 \rightarrow$  the null hypothesis is rejected.)
- The R reveals that credibility (predictor) can explain 57.3% of the total variance. The result of the ANOVA confirmed the significance of the predictor "credibility" on brand image ( $F(1,203) = 99.416$ ,  $p\text{-value} < .05 \rightarrow$  the null hypothesis is rejected.)
- The R reveals that integrity (predictor) can explain 64.9% of the total variance. The result of the ANOVA confirmed the significance of the predictor "integrity" on brand image ( $F(1,203) = 147.742$ ,  $p\text{-value} < .05 \rightarrow$  the null hypothesis is rejected.)
- The R reveals that benevolence (predictor) can explain 44.6% of the total variance. The result of the ANOVA confirmed the significance of the predictor "benevolence" on brand image ( $F(1,203) = 50.531$ ,  $p\text{-value} < .05 \rightarrow$  the null hypothesis is rejected.)

<b>Conclusion: H3 is validated. Trust, credibility and integrity are predictors of brand image.</b>
---

*Hypothesis 4: Effect of transparency on brand image when trust is neutralised*

Trust is a variable whose effect has to be neutralised (cf. Appendix 7 – Hypothesis 4). It is thus called a covariate. Hence, a univariate procedure is used. Before doing this, several conditions need to be checked.

- 1) Normality of the dependent variable (brand image). There is a normal distribution of the dependent variable.
- 2) Homogeneity of variances: This is respected because  $F(1,203)=2.556$ ,  $p\text{-value}=.111 > .05$ . Hence, the null hypothesis of homogeneity of variances is not rejected.
- 3) Linear relation between the dependent variable (brand image) and the mediator (trust). This condition has already been checked for hypothesis 3.
- 4) Homogeneity of regressions: this means that the interaction between the independent variable (transparency) and the mediator (trust) is not significant. Hence, a model is created that includes this interaction term.
  - a. The interaction term between transparency and trust is found to be significant ( $p\text{-value} < .05$ ); hence, the condition of homogeneity of regressions is not verified and there is an interaction between transparency and trust. Therefore, the outputs can be interpreted.
  - b. The interaction term between transparency and credibility is not significant ( $p\text{-value} > .05$ ); hence, the condition of homogeneity of regressions is verified. Therefore, before interpreting the outputs, the test needs to be run again without including the interaction term.
  - c. The interaction term between transparency and integrity is not significant ( $p\text{-value} > .05$ ); hence, the condition of homogeneity of regressions is verified. Therefore, before interpreting the outputs, the test needs to be run again without including the interaction term.

When checking the effect of trust, the effect of transparency on brand image is not significant. Therefore, it is concluded that there is a case of full mediation. This implies

that trust explains the entirety of the causal relationship between transparency and brand image.

Similarly, when checking the effect of credibility and integrity, the effect of transparency on brand image is not significant. Therefore, it is concluded that there is a case of full mediation. This implies that credibility and integrity explain the entirety of the causal relationship between transparency and brand image.

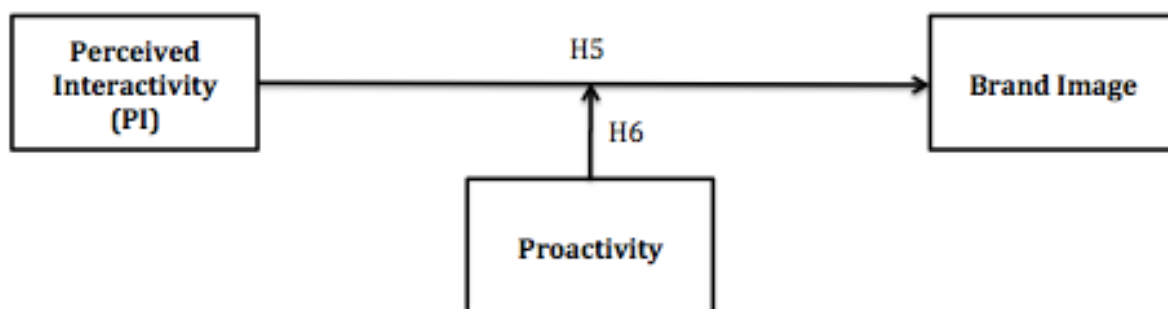
**Final conclusion:**

- 1) There is a total mediation effect, since the effect of transparency does not stay significant when trust/credibility/integrity is neutralized.**

***Moderation***

“A moderating variable is a variable that modulates the direction and / or the strength of the effect of X on Y” (Chumpitaz Caceres and Vanhamme, 2003, p. 70, own translation).

The moderation relation is found in Figure 6 hereafter.



**Figure 6. Moderation**

To test moderation, the interaction effect between perceived interactivity and proactivity will be examined in order to see whether this effect is significantly predicts brand image.

*Hypothesis 5: Perceived interactivity has a positive impact on brand image*

Here, the impact of interactivity (categorical variable with two modalities) on brand image (continuous variable) is tested (cf. Appendix 8 – Hypothesis 5). To perform this test, a one-way ANOVA is used.

The homogeneity of variances condition is respected. ( $F(1,203)=3.750$ ,  $p\text{-value} = .054 > .05 \rightarrow$  homogeneity of variances condition is not rejected). Hence, the ANOVA can be checked.

The ANOVA test is significant ( $F(1,203)=80.489$ ,  $p\text{-value} < .05$ ): there is a significant effect of interactivity on brand image. Moreover, the descriptives analysis shows that the mean for a low interactivity condition is higher than for a high interactivity condition ( $3.06 > 2.01$ )

<p><b>Conclusion: H5 is validated. There is an effect of interactivity on brand image.</b></p>
--

*Hypothesis 6: The influence of perceived interactivity on brand image is moderated by proactivity*

To test the hypothesis that proactivity moderates the relationship between interactivity and brand image, a regression analysis was conducted (cf. Appendix 9 – Hypothesis 6). First, two variables were included in the regression, namely: interactivity and proactivity. These variables accounted for 28.4% of variance in brand image,  $R\text{ Square} = .284$ . Moreover, the ANOVA was significant  $F(2, 204) = 40.047$ ,  $p < .05$ . Nonetheless, only one of the independent variables is significant – interactivity.

In order to do the moderation analysis, the variables are first centralized in order to avoid any case of multicollinearity with the interaction term that is introduced. In fact, an interaction term between both independent variables was created.

Once the interaction term is created, it is added into the regression analysis. Now, these

variables accounted for 31.1% of variance in brand image, R Square = .311. Moreover, the ANOVA is significant  $F(2, 204) = 30.177, p < .05$ . In this model, interactivity is still significant, proactivity is not and the interaction term is significant. This shows that proactivity acts as a moderator.

**Conclusion: H6 is validated. Proactivity moderates the effect of perceived interactivity on brand image.**

### *Additional Analysis*

An additional analysis (cf. Appendix 10 – Additional Analysis) was performed in order to see whether there is an interaction between interactivity and perceived firm transparency, although this was not part of the initial research model. Hence, a two-way ANOVA was performed to analyse whether brand image (dependent variable) varies as a function of both perceived firm transparency (independent variable) and interactivity (independent variable).

This tests induces three more hypotheses:

1. There is no difference in brand image regarding the level of transparency, may it be high or low (regardless of the level of interactivity).
2. There is no difference in brand image regarding the level of interactivity, may it be high or low (regardless of the level of transparency)
3. There is no difference in brand image regarding the levels of both transparency and interactivity

When looking at the statistical outputs, it is observed that the transparency variable is significant ( $F(1,204) = 9.748, p\text{-value} < 0,05$ ). Hence, the null hypothesis is rejected because it is not likely that different levels of transparency displayed will translate into similar brand images. Similarly, interactivity is also significant ( $F(1,204) = 84.926, p\text{-}$

value < 0,05). The null hypothesis is rejected, meaning that displaying different levels of interactivity affects brand image. Finally, the interaction between both variables is checked and is found not to be significant ( $F(1,204) = .144$ , p-value > 0,05). This means that the effect of interactivity on brand image does not vary in function of the level of transparency.

### 2.3 Changes in Brand Image

Paired-samples T tests were performed to see whether the mean differences were different before and after the transition of the fictitious brand – Medallion’s Potato Chips – on Facebook. These paired-samples T tests were performed on the scale from the adapted personality list (Koebel and Ladwein, 1999). Overall, most of the pairs in all four scenarios were significant (p-value < .05), there were some exceptions that can be found in Table 14 below.

**Table 14. Paired Samples T Test**

Domination - Domination_After	Scenario 1	.000
	Scenario 2	.000
	Scenario 3	.001
	Scenario 4	.003
Compétence - Compétence_After	Scenario 1	.000
	Scenario 2	.004
	Scenario 3	.001
	Scenario 4	.067
Consciencieuse - Consciencieuse_After	Scenario 1	.182
	Scenario 2	.157
	Scenario 3	.884
	Scenario 4	.016
Masculinité - Masculinité_After	Scenario 1	.001
	Scenario 2	.002
	Scenario 3	.002
	Scenario 4	.001
Expansivité -	Scenario 1	.000

Expansivité_After	Scenario 2	.035
	Scenario 3	.003
	Scenario 4	.050
Séduction - Séduction_After	Scenario 1	.000
	Scenario 2	.028
	Scenario 3	.000
	Scenario 4	.972

The adapted personality list allowed creating the brand's profile before and after transitioning to social media, according to the scenarios presented to respondents where the levels of interactivity and transparency varied. The brand's profiles are presented in the next section (cf. 3.1 Discussion).

However, it was important to say whether these changes were rather positive or negative. For this reason, a second scale has been used in the questionnaire that measures brand attitude (Kwon and Lennon, 2009). This scale will allow saying whether the changes are associated to rather positive or negative opinions in consumers' minds. Hence, paired-samples T tests were also performed for the brand attitude scale and the means were always statistically different.

Furthermore, a mixed ANOVA (cf. Appendix 11 – Mixed ANOVA) has been performed on brand attitude. In fact, one cannot assume independence of observations given the fact that several data come from the same individuals. Therefore, a mixed ANOVA model planned for repeated measures was used. The objective of the mixed ANOVA is to see whether there is an interaction between the within-subjects and the between-subjects. A within-subjects factor is based on repeated measurements a between-subjects factor is based on non-repeated measures. Repeated measures refer to multiple measures that are taken on the same individual. In the present case, the within-subjects factor is brand attitude and the between-subjects factors are the different scenarios.

Before executing the mixed ANOVA model, some descriptive statistics have to be performed. Indeed, a certain number of conditions need to be fulfilled before conducting

such a test: independence of observations (within different measurement times), normality, homogeneity of variances for non-repeated measures and sphericity.

- A bivariate correlations procedure was used to test the independence of the two continuous variables. The correlation was significant at the 0.01 level. Hence, independence of observations was not verified.
- Then, a normality test was conducted. In a normal distribution, significant value must be greater than .05, which is not the case here. Thus, normality of observations is also not verified. However, Q-Q plots were plotted and show that the normality can be assumed.
- The next test that was performed was the one for homogeneity of variances. This was done using a one-way ANOVA and asking for a homogeneity test. Again, the results were not satisfying. Indeed, the output shows that brand attitude before being presented to a scenario is not significant. As the test is not significant ( $p > 0.05$ ), the null hypothesis of equal variances cannot be rejected. However brand attitude after the introduction of a scenario is significant, which means that there is no homogeneity of variances.
- Finally, sphericity is tested. When checking Mauchly's test of sphericity, the p-value is inferior to .05. Therefore, matrix sphericity cannot be assumed. Hence, it is important to check the line that corresponds to a proposed correction in the output tables (not the line where sphericity is assumed).

Although few of the conditions required for a mixed ANOVA seem to be fulfilled, the test will still be run.

When checking for the tests of within-subjects effects, it is shown on the Greenhouse-Geiser line that the p-value is inferior to .05, which means that there is a main effect of brand attitude before and after being exposed to a scenario. Moreover, when looking at the interaction between brand attitude before or after being exposed to a scenario and a specific scenario (1, 2, 3 or 4), it is significant (p-value < .05).

The next step consists in checking the test of between-subjects effect. It indicates whether the main inter-subjects factor (between-subjects) is significant or not. When looking the condition variable, the p-value is inferior to .05, it is thus significant. Hence, there is a difference between the different types of scenarios.

Furthermore, in order to compare these results, estimated marginal means per scenario are checked. The pairwise comparisons table shows that not all p-values are inferior to .05.

## 2.4 Summary

In order to recapitulate the findings, Table 15 below summarizes what hypotheses were rejected or not.

**Table 15. Summary of Rejection of Hypotheses**

<b>Hypothesis</b>	<b>Rejected?</b>
<b>H1:</b> There is an effect of perceived firm transparency on brand image	No
<b>H1:</b> There is a positive effect of perceived firm transparency on trust	No
<b>H3:</b> There is a positive effect of trust on brand image	No
<b>H4:</b> Effect of transparency on brand image when trust is neutralized	No
<b>H5:</b> Perceived interactivity has a positive effect on brand image	No
<b>H6:</b> The influence of perceived interactivity on brand image is moderated by proactivity	No

## Chapter 3 – Discussion, Recommendations and Limits

The previous chapter analysed the results that came from the hypotheses that were made. These results have the objective to answer the question of whether transitioning to social media has an impact on brand image or not. The present chapter aims at interpreting the findings and answering to the question of this research. Moreover, some managerial recommendations will be given and limitations of the research will be presented as well as some suggestions for future research proposed.

### **3.1 Discussion**

#### ***Mediation***

One of the first steps in this research was to look at the mediating role of trust (credibility, integrity and benevolence) in the relationship between transparency and brand image. Before testing the mediation, the separate relationships between the variables have to be significant. All relationships were significant except for the relationship between transparency and benevolence. Thus, this variable was not further taken into account in the rest of the mediation analysis. In fact, for a mediation to occur, all relationships must be significant. Although unexpected, Gurviez and Korchia (2002) explicitly state in their study that benevolence is the dimension that influences trust the least. Hence, this may explain the fact the construct of trust is significant when taken as a whole but that not all dimensions are significant when taken separately.

Hypothesis 1. There is a positive effect of perceived firm transparency on brand image. This hypothesis was supported. It is also in line with previous research. In fact, Kang and Hustvedt (2014) observe that firms that are transparent are successful in creating positive relationships with consumers. It can be stressed that positive relationships also imply positive brand image. Furthermore, Dapko (2012) notes that transparency is

beneficial for firms in terms of customer appreciation, sales, profits and loyalty. Hence, testing this hypothesis shows that transparency is also beneficial to brand image.

Hypothesis 2. There is a positive effect of perceived firm transparency on trust. Trust is an important aspect of social media. Trust can be the result of the creation of a brand page on social media (Lorenzo-Romero, 2012). The hypothesis was confirmed in the present research and confirms the positive relation between transparency and trust that was identified by several authors (Kirby, 2012; Dapko, 2012). As mentioned above, transparency had a positive effect on the construct of trust. Nonetheless, the effect was not significant for one of trust's dimensions, namely benevolence. This can be explained by the fact that benevolence is the dimension that influences trust the least (Gurviez and Korchia, 2002).

Hypothesis 3. There is a positive effect of trust on brand image. This has also been validated through our research and is consistent with previous findings (Anwar *et al.*, 2011). Trust has a role in enhancing brand attitude. As a result, it can be stressed that it has a positive effect on overall brand image, which is what was predicted.

Hypothesis 4. In line with the predictions, trust was found to be a mediator of the relations between perceived firm transparency and brand image. It was found to be a full mediator. This shows that the entirety of the influence of transparency goes through trust.

### ***Moderation***

Hypothesis 5. Perceived interactivity has a positive impact on brand image. This hypothesis has also been validated. In fact, the scenarios that showed features of interactivity were also perceived as being interactive. It was hypothesized that perceived interactivity would have a positive effect on brand image because on social media, the brands that post a lot get more attention (de Vries, 2012). What influences brands the most positively is when there is a two-way communication between

companies and consumers, but also between consumers McMillan and Hwang (2002). Hence, the validation of the hypothesis is in line with previous research.

Hypothesis 6. The influence of perceived interactivity on brand image is moderated by proactivity. In the context of social media, it was hypothesized that consumers that display a more proactive behaviour would strengthen the relationship between interactivity and brand image in a positive way. As Sashi (2012) noted, the power of social media is to bring people together. Therefore, the willingness of people to adapt to a new environment by being active, and e.g. participating actively in social media proves to be a moderator of the relationship between perceived interactivity and brand image.

### ***Before and After Transitioning to Social Media***

On account of the validation of these hypotheses, it can be concluded that brand image is positively affected when a brand goes on social media, i.e. Facebook, and particularly when it behaves in a transparent and interactive manner with its audience. Therefore, their perceived brand image is enhanced.

The objective of this research was to see whether transitioning to social media has an effect on brand image. The particular aspects that were analysed and from which hypotheses were derived were perceived interactivity and perceived firm transparency. In fact, these two facets appear to be consequences of changes in consumer behaviour that arise when using social media. Indeed, as stated in the literature review, consumers become empowered in the context of social media. Consumers want to have access to as much information as they can. As a result, they ask companies and brands to become more transparent and to act interactively.

The fact that the hypotheses about transparency and interactivity were verified leads to believe that there is a change for brands that transition to social media. Hence, there should be a difference before and after they go on social media. This is also

demonstrated by some tests that were made on the data and by creating the brand's profiles. These profiles were created according to the brand's image after respondent read the brand's short description provided in the questionnaire and also after they had read each scenario. The brand profiles are shown in Figure 7 hereafter.

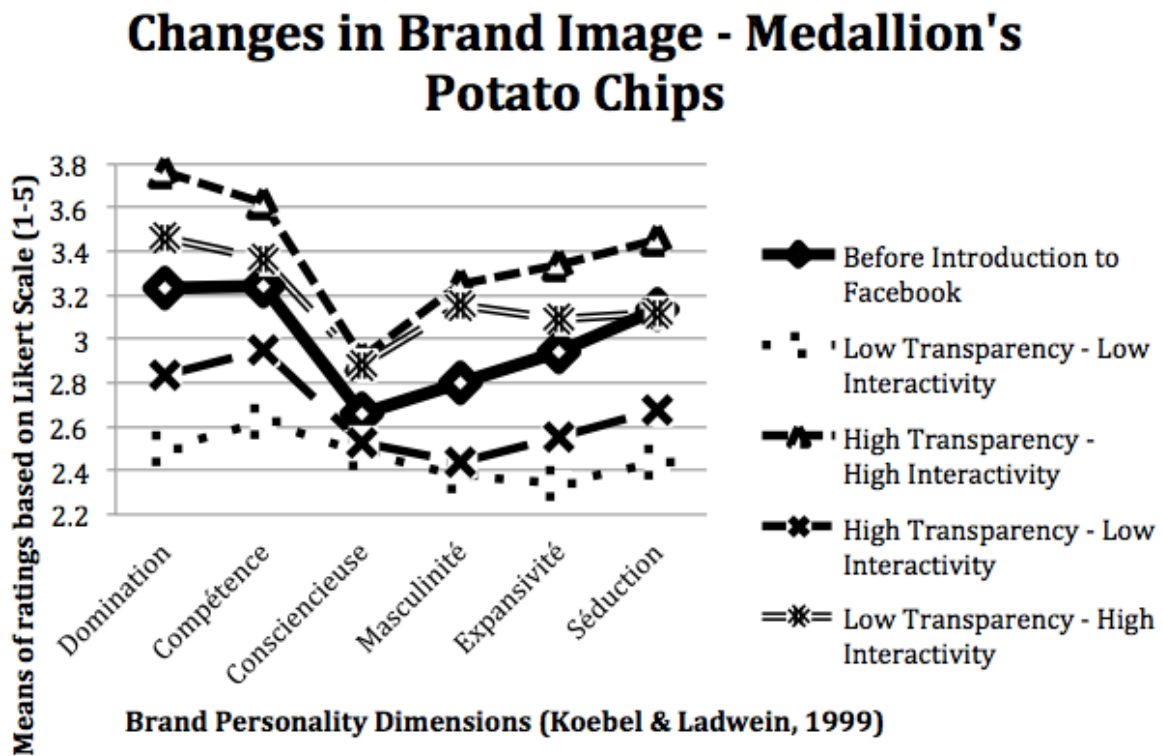


Figure 7. Changes in Brand Image - Brand Profiles

Figure 7 shows how brand image varies according the manner in which the type of information was presented to respondents. The lines were computed according to the means of each dimensions of brand personality (1 being totally disagree and 5 being totally agree). According to Koebel and Ladwein (1999), food brands usually have a brand profile with higher levels of “domination” and “expansivité”. In this case, “domination” is rated quite highly compared to other dimensions but it appears that the fictitious brand's profile is more characterized by a “domination-compétence” profile.

Moreover, usually, there is a low average rate for “consciencieuse”. Overall, these ratings are interesting in terms of positioning of a brand (Koebel and Ladwein, 1999).

It is interesting to see that the lines where both interactivity and transparency had the same levels – low/low or high/high – are found to be the most distant to the central line that shows Medallion’s Potato Chips’ brand profile before being introduced to Facebook. Intuitively, the fact that the scenario with both high transparency and interactivity finds itself at the top of the graph may indicate a more positive perception of the brand given this context the contrary applies to the scenario with both low levels of transparency and interactivity. Furthermore, following this logic, it seems that having a low transparency but high interactivity is positively rated – compared to not being on Facebook – but having a high transparency and low interactivity appears to be negatively rated. Nevertheless, those assumptions are based on visual data. Some more tests confirm the conclusions from the visual data.

Overall, brand attitude differs according to the scenario type, but there are some exceptions. The difference between scenario 1 and scenario 3 is not significant. The same applies for scenarios 2 and 4 and scenarios 3 and 4. Table 16 hereafter explains which relations are significant and which are not.

Table 16. Mean Differences in Scenarios

<b>Scenarios</b>		<b>Significant Mean Difference?</b>
Low Int. – Low Transp. (Scenario 1)	High Int. – High Transp. (Scenario 2)	YES
	Low Int. – High Transp. (Scenario 3)	NO
	High Int. – Low Transp. (Scenario 4)	YES
High Int. – High Transp. (Scenario 2)	Low Int. – High Transp. (Scenario 3)	YES
	High Int. – Low Transp. (Scenario 4)	NO
Low Int. – High Transp. (Scenario 3)	High Int. – Low Transp. (Scenario 4)	NO

These results are in line with the expected outcomes. Indeed, the scenarios where both levels were identical are significantly different from each other. Interestingly, one can observe that for instance the difference between a scenario with low transparency and low interactivity is not significantly different from a scenario with low interactivity and high transparency. Therefore, one can note that consumers value interactivity more than they value transparency. Similarly, one can observe that there is no significant difference between a scenario with high transparency and high interactivity and a scenario with low transparency and high interactivity. This is also in line with what shows in Figure 7 about brand profiles above.

### **Summary**

As a summary to answering the research question: “does transitioning to social media have an affect on brand image?” The general answer is yes. In fact it has been stated in the literature review that social media come with some changes in consumer behaviour that imply that it is important for brands to become more transparent and be interactive while using social media platforms. The results of this research show that displaying both transparency and interactivity have a positive significant impact on brand image. However, what was not necessarily expected is the fact that role of interactivity on social media appears to be more important than the role of transparency. Because if a brand has a high level of interactivity but a low level of transparency, its brand image still changes in a positive way. Moreover, having both low levels of interactivity and transparency affect brand image negatively.

### **3.2 Managerial Recommendations**

According to the results and to the discussion, it seems appropriate to recommend displaying both high levels of transparency and interactivity for brands that have not yet decided to join social media. Even for brands that are already on social media, it is important to do this because consumers value it.

As it was presented in the discussion, going onto social media has an impact on brand image when considering transparency and interactivity. For the fictitious brand of this research, brand profiles were created thanks to the adapted brand personality list (Koebel and Ladwein, 1999). They showed that the brand had a “domination-compétence” profile with low levels of “consciencieuse”. A brand with such a profile should take advantage of its “domination” feature. It usually indicates a strong brand image (Koebel and Ladwein, 1999). The fact that transitioning to social media has reinforced its “domination” shows that the transition was beneficial to brand image.

Other brands should take advantage of going on social media because of the fact that it can enhance their respective brand profile.

Moreover, as it was mentioned, having a good brand image is essential because it impacts purchasing behaviour (Malik *et al.*, 2012), brand satisfaction and brand loyalty (Chung *et al.*, 2015). Nevertheless, if some brands are reluctant to go on social media and to be transparent and interactive, they have the option of choosing to be only one of them – interactive. In fact, results have shown that interactivity is valued more than transparency. At least, brands should reply to the consumers that are reaching out for them on social media rather than ignore them. In fact, the lack of interactivity, even when a high level of transparency is displayed still affects brand image negatively.

As the importance of interactivity in the consumer's eye appears to be crucial, brands should try to communicate with their consumers in an attractive and engaging way in order to enhance their brand image. In fact, the aim of interactivity is to have two-way communication. However, social media have not been created for marketing purposes (Kohli *et al.*, 2015). Consumers do not want to be bombarded with advertising. Hence, brands should focus on entering into meaningful discussions with their consumers. In that sense, it is important that when consumers ask questions, brands reply. Indeed, managers must now engage in conversations with their consumers (Hennig-Thurau *et al.*, 2010). Besides, the way in which replies are given is also of significant importance. In fact, some authors have mentioned this topic in their research: "This implies that brands that are not able (or willing) to present themselves in a human-like way in social media, are probably less successful in gaining and keeping the attention of consumers, and in obtaining positive brand evaluations" (Beukeboom *et al.*, 2015, p. 35).

### **3.3 Limits**

Although some significant results have been found, this research has limitations that should not be forgotten.

Firstly, there is the fact that this research used a fictitious brand. Although using a fictitious brand was chosen over using real brands because it has some advantages. For instance, it ensures that all respondents face the same level of information about the brand and do not have any previous associations to the brand that may influence how they answer the questionnaire. However, it can be difficult to give an opinion on a brand based only on a short description of the fictitious brand – this is particularly true for the adapted brand personality list, which was composed of 30 items. Hence, it could be interesting to use a real brand in future research.

Secondly, it should be noted that some respondents complained about the length of the questionnaire that was composed of a total of 18 questions and lasted about 10 minutes. This length can cause some demotivation for the respondents and they might have not answered honestly to all questions towards the end of the questionnaire thus potentially impairing the quality of the answers and biasing results. Again, this is particularly true for the adapted brand personality scale, which was asked twice in the questionnaire. Moreover, it was asked twice during the questionnaire to read a short text, which can also be a demotivating factor.

Thirdly, this research was only focused on the food sector and it was chosen to study only one fictitious brand. For this reason, the conclusions and recommendations may not necessarily be applicable to any other sector. It would be interesting to research the topic further by applying it to other sectors and by using more brands. In fact, according to Koebel and Ladwein (1999) there are four different types of brand profiles: the first one “dominant-expansif” is usually attributed to foods; the second one “impersonnel” is

for brands that do not have a very strong personality; the third category, “dominant-sexualisé” is generally attributed to clothing brands and perfumes; last but not least, “consciencieux-compétent” is usually assigned to technology brands. Moreover, inside these categories, brands can have different brand profiles with some dimensions that are more accentuated than others. This is the case with the fictitious brand in this research, which should fall under the “dominant-expansif” category but has a “dominant-compétence” profile.

Finally, another identified limit to this research is the fact that the model was not tested in its entirety but the variables were tested separately.

## **Conclusion**

The objective of this research was to explore the effects of a brand's passage to social media on its brand image. In order to analyse this, the context of social media was described, which led to an understanding of the changes in consumer behaviour related to social media. This allowed the identification of perceived interactivity and perceived transparency as two main factors that could affect a brand's image. In order to see whether these elements had an impact on brand image, a quantitative study using a fictitious brand case was conducted.

The conclusion of the analysis was that being interactive and transparent on social media has a positive impact on a brand's image. Moreover, being interactive but not transparent still has a positive impact on brand image. On the contrary, a brand that is neither interactive nor transparent will suffer from it. In addition, a brand that is transparent but is not interactive with its customers will also experience a negative effect on its brand image. To come to these conclusions, two major analyses were conducted, a mediation analysis that went through the four first hypotheses and a moderation analysis that went through the two remaining hypotheses. Four different scenarios were used in order to test this objective. Overall, this research confirms the fact that the social media environment has an impact on brand image. Besides, the study contributes to the extant literature by analysing the effects of transparency and interactivity on brand image within the social media context.

Practically, these conclusions allows us to determine that for a brand that is planning to join social media, it is important that it displays both high levels of transparency and interactivity because this leads to an enhanced brand image. Nonetheless, if a brand cannot achieve transparency, it should at least be interactive because this is also beneficial to its brand image.

This research could thus be beneficial to managers that are unsure about the way they should manage their shift to social media. However, the general recommendations need

to be taken with caution is needed because our study has several limitations that should be noted, in particular the fact that the study is based on a fictitious brand case from the food industry.

At the theoretical level, this research is a first conceptual framework for the changes in brand image that arise from a transition to social media. It could be the basis for researchers to examine real brand cases.

## Bibliography

Aaker, D. A. (1991). *Managing brand equity. Capitalizing on the value of a brand name*. New York: The Free Press.

Aaker, J. L. (1993). Dimensions of Brand Personality. *Journal of Marketing Research*, 34(3), 347-356.

Andzulis, J. M., Panagopoulos, N. G. & Rapp, A. (2012). A review of social media and implications for the sales process. *Journal of Personal Selling & Sales Management*, 32(3), 305-316.

Anwar, A., Gulzar, A., Bin Sohail, F. & Akram, S. N. (2011). Impact of Brand Image, Trust and Affect on Consumer Brand Extension Attitude: the Mediating Role of Brand Loyalty. *International Journal of Economics and Management Sciences*, 1(5), 73-79.

Bateman, T. S. & Crant, J. M. (1993). The Proactive Component of Organizational Behavior: A Measure and Correlates. *Journal of Organizational Behavior*, 14(2), 103-118.

Beukeboom, C. J., Kerkhof, P. & de Vries, M. (2015). Does a Virtual Like Cause Actual Liking? How Following a Brand's Facebook Updates Enhances Brand Evaluations and Purchase Intention. *Journal of Interactive Marketing*, 32, 26-36.

Berthon, P. R. Pitt, L. F., Plangger, K. & Shapiro, D. (2012). Marketing meets Web 2.0, social media, and creative consumers: Implications for international marketing strategy. *Business Horizons*, 55, 261-271.

Boyd, D. M. & Ellison, N. B. (2008). Social Network Sites: Definition, History, and Scholarship. *Journal of Computer-Mediated Communication*, 13, 210-230.

Bruhn, M., Schoenmueller, V. & Schäfer, D. B. (2012), Are social media replacing traditional media in terms of brand equity creation?. *Management Research Review*, 35(9), 770-790.

Chandon, P. (2003). Note on Measuring Brand Awareness, Brand Image, Brand Equity and Brand Value. *INSEAD*.

Chu, S.-C. & Kim, Y. (2011). Determinants of consumer engagement in electronic word-of-mouth (eWOM) in social networking sites. *International Journal of Advertising*, 30(1), 47-75.

Chu, S.-C. & Kim, Y. (2015). The Influence of Perceived Interactivity of Social Media Advertising and Voluntary Self-Disclosure on Attitudes and Intentions to Pass-Along (285-301). In *Effective Advertising Strategies in the Social Media Age*. Hershey, PA: Business Science Reference.

Chumpitaz Caceres, R. & Vanhamme, J. (2003). Les processus modérateurs et médiateurs: distinction conceptuelle, aspects analytiques et illustrations. *Recherche et Applications en Marketing*, 18(2), 67-99.

Chung, K. H., Yu, J. E. & Shin, J. I. (2015). "The relationship among perceived value, brand image, customer satisfaction, and customer loyalty: The moderating effect of gender" (145-149). In Ford Lumban Gaol (Ed.), *Interdisciplinary Behavior and Social Sciences*, London: Taylor & Francis Group.

Coyle, J. R. & Thorson, E. (2001). The Effects of Progressive Levels of Interactivity and Vividness in Web Marketing Sites. *Journal of Advertising*, 30 (3), 65-78.

Dapko, J. (2012). *Perceived Firm Transparency: Scale and Model Development*. PhD Thesis in Philosophy, University of South Florida, Florida.

de Valck, K., van Bruggen, G. H. & Wierenga, B. (2009). Virtual Communities: A Marketing Perspective. *Decision Support Systems*, 47 (3), 185-203.

de Vries, L., Gensler, S. & Leeflang, P.S.H. (2012), Popularity of Brand Posts on Brand Fan Pages: An Investigation of the Effects of Social Media Marketing. *Journal of Interactive Marketing*, 26 (2), 83-91.

Dobni, D. & Zinkhan, M. G. (1990). In Search of Brand Image: a Foundation Analysis. *Advances in Consumer Research*, 17, 110-119.

Facebook. (n.a.). *Facebook*.

[https://www.facebook.com/facebook/info/?tab=page\\_info](https://www.facebook.com/facebook/info/?tab=page_info) (Retrieved on 12.04.2016).

Gironda, J. T. & Korgaonkar, P. K. (2014). Understanding consumers' social networking site usage. *Journal of Marketing Management*, 30(5-6), 571-605.

Gurviez, P. & Korchia, M. (2002). Proposition d'une échelle de mesure multidimensionnelle de la confiance dans la marque. *Recherche et Applications en Marketing*, 17(3), 1-21.

Hajli, M. N. (2014). A study of the impact of social media on consumers. *International Journal of Market Research*, 56(3), 387-404.

Hanna, R., Rohm, A. & Crittenden, V. L. (2011). We're all connected: The power of the social media ecosystem. *Business Horizons*, 54, 265-273.

Heller Baird, C. & Parasnis, G. (2011), From Social Media to Social Customer Relationship Management. *Strategy & Leadership*, 39 (5), 30-37.

Hennig-Thurau, T., Hofacker, C. F. & Bloching, B. (2013). Marketing the Pinball Way: Understanding How Social Media Change the Generation of Value for Consumers and Companies. *Journal of Interactive Marketing*, 27, 237-241.

Hennig-Thurau, T., Malthouse, E.C., Friege, C., Gensler, S., Lobschat, L., Rangaswamy, A. & Skiera, B. (2010). The Impact of New Media on Customer Relationships. *Journal of Service Research*, 13(3), 311-330.

Heude, R. P. (2000). *Guide de la communication pour l'entreprise*. Paris: Maxima.

Hoegg, R., Meckel, M., Stanoevska-Slabeva, K., & Martignoni, R. (2006). Overview of Business Models for Web 2.0 Communities. Paper presented at the Proceedings of GeNeMe, Dresden.

Hollebeek, L. D., Glynn, M. S. & Brodie, R. J. (2014). Consumer Brand Engagement in Social Media: Conceptualization, Scale Development and Validation. *Journal of Interactive Marketing*, 28 (2), 149-165.

Hutter, K., Hautz, J., Dennhardt, S., & Füller, J. (2013). The impact of user interactions in social media on brand awareness and purchase intention: the case of MINI on Facebook. *Journal of Product & Brand Management*, 22(5), 342-351.

Instagram. (n.a.). *FAQ*. <https://www.instagram.com/about/faq/>. (Retrieved on 13.04.2016).

Jensen, J.F. (1998). Interactivity: Tracing a new concept in media and communication studies. *Nordicom Review*, 19(1), 185-204.

Jore, M. (2012). *Apprenance et proactivité*. PhD Thesis in Educational Sciences, Université Paris Ouest Nanterre La Défense.

Kane, G., Fichman, R., Gallagher, J. & Glaser, J. (2009). Community Relations 2.0. *Harvard Business Review*, 87 (11), 45-50.

Kang, J. & Hustvedt, G. (2014). Building Trust Between Consumers and Corporations: The Role of Consumer Perceptions of Transparency and Social Responsibility. *Journal of Business Ethics*, 125, 253-265.

Kaplan, A. M. & Haenlein, M. (2010). Users of the world, unite! The challenges and opportunities of Social Media. *Business Horizons*, 53, 59-68.

Keller, K. L. (1993). Conceptualizing, Measuring, and Managing Customer-Based Brand. *Journal of Marketing*, 57(1), 1-22.

Keller, K. L. & Aaker, D. A. (1992). The Effects of Sequential Introduction of Brand Extensions. *Journal of Marketing Research*, 29(1), 35-50.

Kietzmann, J.H., Hermkens, K., McCarthy, I.P. & Silvestre, B. S. (2011). Social media? Get serious! Understanding the functional building blocks of social media. *Business Horizons*, 54, 241-251.

King, R. A., Racherla, P. & Bush, V. D. (2014). What We Know and Don't Know About Online Word-of-Mouth: A Review and Synthesis of the Literature. *Journal of Interactive Marketing*, 28,167-183.

Kirby, J. (2012). Trust in the Age of Transparency. *Harvard Business Review*. <https://hbr.org/2012/07/trust-in-the-age-of-transparency>. (Retrieved on 23.07.2016).

Koebel, M.-N. & Ladwein, R. (1999). l'Echelle de Personnalité de la Marque de Jennifer Aaker: adaptation au contexte français. *Décisions Marketing*, 16, 81-88.

Kohli, C., Suri, R. & Kapoor, A. (2015). Will social media kill branding?. *Business Horizons*, 58, 35-44.

Korchia, M. (2000). Une nouvelle typologie de l'image de marque. Actes du 16ème congrès international de l'Association Française du Marketing. Montréal, Canada.

Kwon, W.-S. & Lennon, S. J. (2009). Reciprocal Effects Between Multichannel Retailers' Offline and Online Brand Images. *Journal of Retailing*, 85, 376-390.

Lambin, J.-J. & de Moerloose, C. (2008). *Marketing stratégique et opérationnel. Du marketing à l'orientation-marché*, 7<sup>th</sup> edition. Paris: Dunod.

Lewi, G. (2013). *E-branding - Stratégies de marque sur Internet*. London: Pearson.

Linkedin. (n.a.). About Us. [https://www.linkedin.com/about-us?trk=hb\\_ft\\_about](https://www.linkedin.com/about-us?trk=hb_ft_about). (Retrieved on 13.04.2016).

Liu, Y. & Shrum, L. J. (2002). What Is Interactivity and Is It Always Such a Good Thing? Implications of Definition, Person, and Situation for the Influence of Interactivity on Advertising Effectiveness. *Journal of Advertising*, 31(4), 53-64.

Liu-Thompkins, Y. & Rogerson, M. (2012). Rising to Stardom: An Empirical Investigation of the Diffusion of User-generated Content. *Journal of Interactive Marketing*, 26, 71-82.

Lorenzo-Romero, C., Constantinides, E. & Alarcon-del-Amo, M. (2011). Consumer adoption of social networking sites: implications for theory and practice. *Journal of Research in Interactive Marketing*, 5(2), 170-188.

Malik, M. E., Naeem, B. & Munawar, M (2012). Brand Image: Past, Present and Future. *Journal of Basic and Applied Scientific Research*, 13069-13075.

Mangold, W. G. & Faulds, D. J. (2009). Social media: The new hybrid element of the promotion mix. *Business Horizons*, 52, 357-365.

McMillan, S. J. & Hwang, J.-S. (2002). Measures of Perceived Interactivity: An Exploration of the Role of Direction of Communication, User Control, and Time in Shaping Perceptions of Interactivity. *Journal of Advertising*, 31(3), 29-42.

Michel, G. (2009). *Au Coeur de la Marque*. 2<sup>nd</sup> Edition, Paris, Dunod.

Morgan, R. M. and Hunt, S. D. (1994). The Commitment-Trust Theory of Relationship Marketing. *Journal of Marketing*, 58, 20-38.

Muntinga, D. G., Moorman, M. & Smit, E. G. (2011). Introducing COBRAs. Exploring motivations for brand-related social media use. *International Journal of Advertising*, 30(1), 13-46.

Parameswaran, M. & Whinston, A. B. (2007). Social Computing: An Overview. *Communications of the Association for Information systems*, 19, 762-780.

Pinterest. (n.a.). About Pinterest. <https://about.pinterest.com/en>. (Retrieved on 13.04.2016).

Rafaeli, S. (1988). "Interactivity: From new media to communication". In R. Hawkins *et al.* (Eds.), *Advancing communication science: Merging mass and interpersonal processes* (16, 110-134). Newbury Park, CA: Sage.

Sashi, C.M. (2012). Customer engagement, buyer-seller relationships, and social media. *Management Decision*, 50(2), 253-272.

Shang, R.-A., Chen, Y.-C. & Liao, H.-J. (2006). The value of participation in virtual consumer communities on brand loyalty. *Internet Research*, 16(4), 398-418.

Smith, A. N., Fischer, E. & Yongjian, C. (2012). How Does Brand-related User-generated Content Differ across YouTube, Facebook, and Twitter?. *Journal of Interactive Marketing*, 26, 102-113.

Statista. (n.a.). *Number of monthly active Facebook users worldwide as of 1st quarter 2016 (in millions)*. <http://www.statista.com/statistics/264810/number-of-monthly-active-facebook-users-worldwide/> (Retrieved on 15.04.2016).

Stewart, D. W. & Pavlou, P. A. (2002). From Consumer Response to Active Consumer: Measuring the Effectiveness of Interactive Media. *Journal of the Academy of Marketing Science*, 30, 376-396.

Tapscott, D. & Ticoll, D. (2012). *The Naked Corporation: How the Age of Transparency Will Revolutionize Business*. New York: Free Press.

Tsimonis, G. & Dimitriadis, D. (2014). Brand strategies in social media. *Marketing Intelligence & Planning*, 32(3), 328-344.

Tuten, T. and Solomon, M. (2013). *Social Media Marketing*. Essex, UK: Pearson.

Twitter. (n.a.). *About*. <https://about.twitter.com/company>. (Retrieved on 13.04.2016).

Wang, Y.-T., Wu, L.-L., Chen, H.-C. & Yeh, M.-Y. (2012). Interactivity of Social Media and Online Consumer Behavior: the Moderating Effects of Opinion Leadership. In *Thirty Third International Conference on Information Systems*, Orlando.

Wu, G. (2006). Conceptualizing and Measuring the Perceived Interactivity of Websites. *Journal of Current Issues and Research in Advertising*, 28, 87-104.

## Appendix 1 - Questionnaire

Bonjour!

Je vous invite à participer à une enquête qui devrait vous prendre environ 10 minutes dans le cadre de mon mémoire (travail de master) à la Louvain School of Management. Il vous sera demandé de lire attentivement un court cas portant sur une marque fictive, "Medallion's Potato Chips" et de répondre à quelques questions.

Je fais donc appel à votre aide pour répondre le plus honnêtement possible aux questions posées afin de mener à bien mon travail de recherche.

Important: s'il vous plaît ne cliquez pas sur "retour en arrière" dans votre navigateur internet car vous sortiriez de l'étude et toutes vos données seraient alors perdues. Il est nécessaire d'effectuer l'enquête jusqu'à la fin pour qu'elle puisse être prise en compte dans l'étude.

L'enquête est strictement anonyme. Merci de votre aide.

Ashling Mc Phillips

Veillez lire attentivement la description de la marque Medallion's Potato Chips et ensuite répondre aux questions qui vous seront posées à propos de la marque. Il est important que vous preniez votre temps pour lire la description.

Medallion's Potato Chips en 5 points:

1. La société Medallion est active dans le domaine de l'alimentaire.
2. Le principal produit de la société est *Medallion's Potato Chips*.
3. Cette marque a connu une petite croissance des ventes au cours des 15 années de son existence.
4. Les consommateurs ont montré une certaine fidélité à Medallion et sont parfois prêts à payer un prix élevé pour les chips.
5. Les détaillants sont bien approvisionnés, mais ne placent pas les produits dans une position de premier plan dans le magasin.

**\* 1. Si Medallion's Potato Chips était une personne, la marque serait...**

Veillez indiquer votre degré d'accord avec les propositions suivantes en cochant, sur chaque ligne, une bulle entre 1 (pas du tout d'accord) et 5 (tout à fait d'accord)

	1. Pas du tout d'accord	2. Pas d'accord	3. Ni pas d'accord, ni d'accord	4. Plutôt d'accord	5. Tout à fait d'accord
Réaliste	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Travailleuse	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Organisée	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Intelligente	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Honnête	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Unique	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Indépendante	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Sûre d'elle	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Contemporaine	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Leader	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Masculin	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Virile	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Rude	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Audacieuse	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Imaginative	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Fougueuse	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Dans le vent	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Gagnante	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Gaie	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Envoûtante	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Séduisante	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Belle	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Sentimentale	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Féminine	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Excitante	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Distinguée	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Fiable	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Robuste	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Technique	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Sûre	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

**\* 2. Vous qualifiez la marque présentée (Medallion's Potato Chips), de...**

Bonne      Mauvaise

**\* 3. Vous qualifiez la marque présentée (Medallion's Potato Chips), de...**

Sympathique      Peu sympathique

**\* 4. Vous qualifiez votre attitude envers la marque présentée (Medallion's Potato Chips), de...**

Favorable      Non favorable

**\* 5. Quelle est votre appréciation de la marque (Medallion's Potato Chips)?**

Je l'aime      Je ne l'aime pas

Veillez lire attentivement le passage suivant, il est essentiel pour pouvoir répondre aux questions suivantes.

Depuis quelques mois, Medallion's Potato Chips a rejoint les réseaux sociaux afin de jouir d'une plus grande visibilité. Medallion's Potato Chips a sa propre page Facebook. Imaginez que vous vous soyez rendu sur la page Facebook de Medallion's Potato Chips afin de vous renseigner sur le processus de production des chips. Voici vos constatations:

Sur sa page Facebook, Medallion's Potato Chips ne poste pas beaucoup de nouvelles à propos de sa marque. Par ailleurs, le contenu qui est partagé n'est pas engageant, ni varié, ni intéressant. Il arrive que la marque réponde aux questions de ses consommateurs mais ce n'est pas systématique et généralement, les réponses ne sont pas données immédiatement mais quelques jours plus tard. Quelques consommateurs se sont plaints car leurs commentaires ont été effacés.

La page Facebook de Medallion's Potato Chips n'a pas fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise n'a également pas encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises.

Maintenant que vous avez pris connaissance de l'activité de Medallion's Potato Chips sur Facebook et de la manière dont l'entreprise gère sa marque, veuillez répondre aux questions qui suivent:

**\* 6. Dans quelle mesure êtes vous d'accord avec les affirmations suivantes?**

Veillez indiquer votre degré d'accord avec les propositions suivantes en cochant, sur chaque ligne, une bulle entre 1 (pas du tout d'accord) et 5 (tout à fait d'accord)

	1. Pas du tout d'accord	2. Pas d'accord	3. Ni pas d'accord, ni d'accord	4. Plutôt d'accord	5. Tout à fait d'accord
La marque me donne l'opportunité d'apprendre des choses sur elle.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Cette marque me permet de savoir ce qu'elle fait.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Cette marque veut que je comprenne ce qu'elle fait.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Cette marque est ouverte avec moi.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

**\* 7. Dans quelle mesure êtes vous d'accord avec les affirmations suivantes?**

Veillez indiquer votre degré d'accord avec les propositions suivantes en cochant, sur chaque ligne, une bulle entre 1 (pas du tout d'accord) et 5 (tout à fait d'accord)

	1. Pas du tout d'accord	2. Pas d'accord	3. Ni pas d'accord, ni d'accord	4. Plutôt d'accord	5. Tout à fait d'accord
La marque favorise la communication bidirectionnelle	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque favorise la communication simultanée	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

La marque ne favorise pas la communication simultanée	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque est interactive	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque communique principalement de manière unidirectionnelle	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque communique de manière interpersonnelle	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque favorise les conversations	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque a un contenu varié	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque captive mon attention	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque ne captive pas mon attention	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque est passive	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque répond immédiatement aux questions	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
La marque manque de contenu	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

**\* 8. Dans quelle mesure êtes-vous d'accord avec les affirmations suivantes?**

Veillez indiquer votre degré d'accord avec les propositions suivantes en cochant, sur chaque ligne, une bulle entre 1 (pas du tout d'accord) et 5 (tout à fait d'accord)

	1. Pas du tout d'accord	2. Pas d'accord	3. Ni pas d'accord, ni d'accord	4. Plutôt d'accord	5. Tout à fait d'accord
Les produits de cette marque m'apportent de la sécurité.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
J'ai confiance dans la qualité des produits de cette marque.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Acheter des produits de cette marque, c'est une garantie.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Cette marque est sincère vis-à-vis des consommateurs.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Cette marque est honnête vis-à-vis de ses clients.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Cette marque montre de l'intérêt pour ses clients.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Je pense que cette marque renouvelle ses produits pour tenir compte des progrès de la recherche.	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Je pense que cette marque cherche continuellement à améliorer ses réponses aux besoins des consommateurs	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

→ Question 9\* → cf. Question \*1

→ Questions \*10, \*11, \*12 et \*13 → cf. Questions \*2, \*3, \*4 et \*5

**\* 14. Dans quelle mesure êtes-vous d'accord avec les affirmations suivantes?**

Veillez indiquer votre degré d'accord avec les propositions suivantes en cochant, sur chaque ligne, une bulle entre 1 (pas du tout d'accord) et 5 (tout à fait d'accord)

	1. Pas du tout d'accord	2. Pas d'accord	3. Ni pas d'accord, ni d'accord	4. Plutôt d'accord	5. Tout à fait d'accord
Je suis constamment à l'affût de nouvelles façons d'améliorer ma vie	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Je me sens poussé à être différent des autres quel que soit le groupe auquel j'appartiens	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
J'ai tendance à laisser les autres prendre l'initiative de lancer de nouveaux projets	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Partout où j'ai été, j'ai été un puissant facteur de changement constructif	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
J'aime faire face et surmonter les obstacles en défendant mes idées	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Rien n'est plus émouvant pour moi que de voir mes idées se réaliser	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Si je vois quelque	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

chose que je n'aime pas, je le modifie					
Peu importe la chance, si je crois en quelque chose, je le réalise	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
J'aime à convaincre de mes idées, même face à l'opposition des autres	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
J'excelle à identifier des opportunités de changement	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Je suis toujours à la recherche de la meilleure façon de faire les choses	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Si je crois en une idée, aucun obstacle ne m'empêchera de la concrétiser	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
J'aime faire bouger une situation figée	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Quand j'ai un problème, je le saisis à bras-le-corps	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Je suis très doué pour transformer les problèmes en opportunités de changement	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Je peux repérer une bonne occasion longtemps avant les autres	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Si je vois quelqu'un en difficulté, je l'aide par tous les moyens possibles	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

**\* 15. Possédez-vous un compte d'utilisateur sur Facebook?**

Oui

Non

**\* 16. Vous êtes Un homme**

Une femme

Un homme

**\*17. Quel est votre âge?**

Inférieur à 18 ans

Entre 18 ans et 24 ans

Entre 25 ans et 34 ans

Entre 35 ans et 44 ans

Entre 45 ans et 54 ans

Supérieur à 54 ans

**\* 18. Vous êtes**

Sans emploi

Etudiant

Travailleur

Retraité

Autre

## Appendix 2 - Scenarios

### 1) Scenario 1 – Low interactivity and low transparency

Veillez lire attentivement le passage suivant, il est essentiel pour pouvoir répondre aux questions suivantes.

Depuis quelques mois, Medallion's Potato Chips a rejoint les réseaux sociaux afin de jouir d'une plus grande visibilité. Medallion's Potato Chips a sa propre page Facebook. Imaginez que vous vous soyez rendu sur la page Facebook de Medallion's Potato Chips afin de vous renseigner sur le processus de production des chips. Voici vos constatations:

Sur sa page Facebook, Medallion's Potato Chips ne poste pas beaucoup de nouvelles à propos de sa marque. Par ailleurs, le contenu qui est partagé n'est pas engageant, ni varié, ni intéressant. Il arrive que la marque réponde aux questions de ses consommateurs mais ce n'est pas systématique et généralement, les réponses ne sont pas données immédiatement mais quelques jours plus tard. Quelques consommateurs se sont plaints car leurs commentaires ont été effacés.

La page Facebook de Medallion's Potato Chips n'a pas fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise n'a également pas encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises.

### 2) Scenario 2 – High interactivity and high transparency

Veillez lire attentivement le passage suivant, il est essentiel pour pouvoir répondre aux questions suivantes.

Depuis quelques mois, Medallion's Potato Chips a rejoint les réseaux sociaux afin de jouir d'une plus grande visibilité. Medallion's Potato Chips a sa propre page Facebook. Imaginez que vous vous soyez rendu sur la page Facebook de Medallion's Potato Chips afin de vous renseigner sur le processus de production des chips. Voici vos constatations:

Sur sa page Facebook, Medallion's Potato Chips poste beaucoup de nouvelles à propos de sa marque. Le contenu qui est partagé est engageant, varié et intéressant. La marque répond systématiquement aux questions de ses consommateurs. De plus, généralement, les réponses sont données dans l'heure qui suit.

La page Facebook de Medallion's Potato Chips a fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise a également encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises.

### 3) Scenario 3 – Low interactivity and high transparency

Veillez lire attentivement le passage suivant, il est essentiel pour pouvoir répondre aux questions suivantes.

Depuis quelques mois, Medallion's Potato Chips a rejoint les réseaux sociaux afin de jouir d'une plus grande visibilité. Medallion's Potato Chips a sa propre page Facebook. Imaginez que vous vous soyez rendu sur la page Facebook de Medallion's Potato Chips afin de vous renseigner sur le processus de production des chips. Voici vos constatations:

Sur sa page Facebook, Medallion's Potato Chips ne poste pas beaucoup de nouvelles à propos de sa marque. Par ailleurs, le contenu qui est partagé n'est pas engageant, ni varié, ni intéressant. Il arrive que la marque réponde aux questions de ses consommateurs mais ce n'est pas systématique et généralement, les réponses ne sont pas données immédiatement mais quelques jours plus tard. Quelques consommateurs se sont plaints car leurs commentaires ont été effacés.

La page Facebook de Medallion's Potato Chips a fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise a également encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises. D'une manière générale, vous considérez que la marque est transparente.

#### 4) Scenario 4 – High interactivity and low transparency

Veillez lire attentivement le passage suivant, il est essentiel pour pouvoir répondre aux questions suivantes.

Depuis quelques mois, Medallion's Potato Chips a rejoint les réseaux sociaux afin de jouir d'une plus grande visibilité. Medallion's Potato Chips a sa propre page Facebook. Imaginez que vous vous soyez rendu sur la page Facebook de Medallion's Potato Chips afin de vous renseigner sur le processus de production des chips. Voici vos constatations:

Sur sa page Facebook, Medallion's Potato Chips poste beaucoup de nouvelles à propos de sa marque. Le contenu qui est partagé est engageant, varié et intéressant. La marque répond systématiquement aux questions de ses consommateurs. De plus, généralement, les réponses sont données dans l'heure qui suit.

La page Facebook de Medallion's Potato Chips n'a pas fourni l'information que vous cherchiez sur sa page Facebook. L'entreprise n'a également pas encouragé à lui poser des questions dans le cas où des informations supplémentaires étaient requises. D'une manière générale, vous considérez que la marque n'est pas transparente.

### Appendix 3 – Manipulation Check

#### 1) Scenario 1

#### One-Sample Statistics

	N	Mean	Std. Deviation	Std. Error Mean
Q6.1	50	1.90	.839	.119
Q6.2	50	2.06	.793	.112
Q6.3	50	1.88	.773	.109
Q6.4	50	1.80	.756	.107
Q7.1	50	1.98	.795	.112
Q7.2	50	1.74	.664	.094
Q7.3bis	50	2.0200	.93656	.13245
Q7.4	50	2.08	.900	.127
Q7.5bis	50	2.2000	1.01015	.14286
Q7.6	50	2.62	1.105	.156
Q7.7	50	1.78	.815	.115
Q7.8	50	1.84	.681	.096
Q7.9	50	1.88	.849	.120
Q7.10bis	50	2.0400	.98892	.13985
Q7.11bis	50	2.0600	.89008	.12588
Q7.12	50	1.72	.904	.128
Q7.13bis	50	1.8400	.86567	.12242

#### One-Sample Test

Test Value = 3

	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
Q6.1	-9.270	49	.000	-1.100	-1.34	-.86
Q6.2	-8.381	49	.000	-.940	-1.17	-.71
Q6.3	-10.245	49	.000	-1.120	-1.34	-.90
Q6.4	-11.225	49	.000	-1.200	-1.41	-.99
Q7.1	-9.071	49	.000	-1.020	-1.25	-.79
Q7.2	-13.413	49	.000	-1.260	-1.45	-1.07
Q7.3bis	-7.399	49	.000	-.98000	-1.2462	-.7138
Q7.4	-7.229	49	.000	-.920	-1.18	-.66
Q7.5bis	-5.600	49	.000	-.80000	-1.0871	-.5129
Q7.6	-2.433	49	.019	-.380	-.69	-.07
Q7.7	-10.580	49	.000	-1.220	-1.45	-.99
Q7.8	-12.046	49	.000	-1.160	-1.35	-.97
Q7.9	-9.333	49	.000	-1.120	-1.36	-.88
Q7.10bis	-6.864	49	.000	-.96000	-1.2410	-.6790
Q7.11bis	-7.468	49	.000	-.94000	-1.1930	-.6870
Q7.12	-10.008	49	.000	-1.280	-1.54	-1.02
Q7.13bis	-9.475	49	.000	-1.16000	-1.4060	-.9140

## 2) Scenario 2

**One-Sample Statistics**

	N	Mean	Std. Deviation	Std. Error Mean
Q6.1	50	4.46	.734	.104
Q6.2	50	4.50	.647	.091
Q6.3	50	4.40	.670	.095
Q6.4	50	4.30	.735	.104
Q7.1	50	4.38	.830	.117
Q7.2	50	4.22	.790	.112
Q7.3bis	50	4.1000	.83910	.11867
Q7.4	50	4.30	.735	.104
Q7.5bis	50	3.9600	.94675	.13389
Q7.6	50	3.56	.861	.122
Q7.7	50	4.08	.778	.110
Q7.8	50	3.66	.961	.136
Q7.9	50	3.72	.809	.114
Q7.10bis	50	3.6400	.87505	.12375
Q7.11bis	50	4.1400	.78272	.11069
Q7.12	50	4.24	.894	.126
Q7.13bis	50	3.8400	.71027	.10045

**One-Sample Test**

Test Value = 3

	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
Q6.1	14.059	49	.000	1.460	1.25	1.67
Q6.2	16.398	49	.000	1.500	1.32	1.68
Q6.3	14.774	49	.000	1.400	1.21	1.59
Q6.4	12.500	49	.000	1.300	1.09	1.51
Q7.1	11.753	49	.000	1.380	1.14	1.62
Q7.2	10.920	49	.000	1.220	1.00	1.44
Q7.3bis	9.270	49	.000	1.10000	.8615	1.3385
Q7.4	12.500	49	.000	1.300	1.09	1.51
Q7.5bis	7.170	49	.000	.96000	.6909	1.2291
Q7.6	4.599	49	.000	.560	.32	.80
Q7.7	9.812	49	.000	1.080	.86	1.30
Q7.8	4.858	49	.000	.660	.39	.93
Q7.9	6.292	49	.000	.720	.49	.95
Q7.10bis	5.172	49	.000	.64000	.3913	.8887
Q7.11bis	10.299	49	.000	1.14000	.9176	1.3624
Q7.12	9.813	49	.000	1.240	.99	1.49
Q7.13bis	8.363	49	.000	.84000	.6381	1.0419

## 3) Scenario 3

One-Sample Statistics				
	N	Mean	Std. Deviation	Std. Error Mean
Q6.1	53	3.57	.866	.119
Q6.2	53	3.25	.939	.129
Q6.3	53	2.98	1.065	.146
Q6.4	53	2.64	.922	.127
Q7.1	53	2.42	.949	.130
Q7.2	53	2.15	.988	.136
Q7.3bis	53	2.5472	1.08426	.14893
Q7.4	53	2.30	.952	.131
Q7.5bis	53	2.1321	.83292	.11441
Q7.6	53	2.87	.900	.124
Q7.7	53	2.08	.874	.120
Q7.8	53	2.26	.902	.124
Q7.9	53	2.26	.923	.127
Q7.10bis	53	2.3019	.91115	.12516
Q7.11bis	53	2.5283	.97278	.13362
Q7.12	53	1.91	1.131	.155
Q7.13bis	53	2.2453	.85273	.11713

One-Sample Test						
Test Value = 3						
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
Q6.1	4.757	52	.000	.566	.33	.80
Q6.2	1.902	52	.063	.245	-.01	.50
Q6.3	-.129	52	.898	-.019	-.31	.27
Q6.4	-2.831	52	.007	-.358	-.61	-.10
Q7.1	-4.485	52	.000	-.585	-.85	-.32
Q7.2	-6.254	52	.000	-.849	-1.12	-.58
Q7.3bis	-3.040	52	.004	-.45283	-.7517	-.1540
Q7.4	-5.336	52	.000	-.698	-.96	-.44
Q7.5bis	-7.586	52	.000	-.86792	-1.0975	-.6383
Q7.6	-1.069	52	.290	-.132	-.38	.12
Q7.7	-7.703	52	.000	-.925	-1.17	-.68
Q7.8	-5.939	52	.000	-.736	-.98	-.49
Q7.9	-5.804	52	.000	-.736	-.99	-.48
Q7.10bis	-5.578	52	.000	-.69811	-.9493	-.4470
Q7.11bis	-3.530	52	.001	-.47170	-.7398	-.2036
Q7.12	-7.043	52	.000	-1.094	-1.41	-.78
Q7.13bis	-6.443	52	.000	-.75472	-.9898	-.5197

## 4) Scenario 4

<b>One-Sample Statistics</b>				
	N	Mean	Std. Deviation	Std. Error Mean
Q6.1	52	3.44	.938	.130
Q6.2	52	3.19	1.103	.153
Q6.3	52	2.96	1.084	.150
Q6.4	52	3.19	.886	.123
Q7.1	52	3.27	.972	.135
Q7.2	52	3.71	.750	.104
Q7.3bis	52	3.4423	.91638	.12708
Q7.4	52	3.94	.826	.115
Q7.5bis	52	3.0577	1.21128	.16797
Q7.6	52	3.35	.837	.116
Q7.7	52	3.44	1.145	.159
Q7.8	52	3.50	.852	.118
Q7.9	52	3.54	.828	.115
Q7.10bis	52	3.3846	.88901	.12328
Q7.11bis	52	3.8846	.75806	.10512
Q7.12	52	3.88	.855	.119
Q7.13bis	52	3.1154	1.04138	.14441

<b>One-Sample Test</b>						
Test Value = 3						
	t	df	Sig. (2-tailed)	Mean Difference	95% Confidence Interval of the Difference	
					Lower	Upper
Q6.1	3.402	51	.001	.442	.18	.70
Q6.2	1.257	51	.214	.192	-.11	.50
Q6.3	-.256	51	.799	-.038	-.34	.26
Q6.4	1.564	51	.124	.192	-.05	.44
Q7.1	1.996	51	.051	.269	.00	.54
Q7.2	6.843	51	.000	.712	.50	.92
Q7.3bis	3.481	51	.001	.44231	.1872	.6974
Q7.4	8.223	51	.000	.942	.71	1.17
Q7.5bis	.343	51	.733	.05769	-.2795	.3949
Q7.6	2.981	51	.004	.346	.11	.58
Q7.7	2.786	51	.007	.442	.12	.76
Q7.8	4.233	51	.000	.500	.26	.74
Q7.9	4.692	51	.000	.538	.31	.77
Q7.10bis	3.120	51	.003	.38462	.1371	.6321
Q7.11bis	8.415	51	.000	.88462	.6736	1.0957
Q7.12	7.458	51	.000	.885	.65	1.12
Q7.13bis	.799	51	.428	.11538	-.1745	.4053

## Appendix 4 – Hypothesis 1

### Descriptives

BrandAttitude\_After

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
					Lower Bound	Upper Bound		
Low Transparency	102	2.7083	.99633	.09865	2.5126	2.9040	1.00	5.00
High Transparency	103	2.3762	.95221	.09382	2.1901	2.5623	1.00	4.25
Total	205	2.5415	.98617	.06888	2.4057	2.6773	1.00	5.00

### Test of Homogeneity of Variances

BrandAttitude\_After

Levene Statistic	df1	df2	Sig.
.166	1	203	.684

### ANOVA

BrandAttitude\_After

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	5.653	1	5.653	5.954	.016
Within Groups	192.745	203	.949		
Total	198.398	204			

## Appendix 5 – Hypothesis 2

### Descriptives

Trust

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean			
					Lower Bound	Upper Bound	Minimum	Maximum
Low Transparency	102	2.9292	.74228	.07350	2.7834	3.0750	1.00	5.00
High Transparency	103	3.2584	.69805	.06878	3.1219	3.3948	1.72	5.00
Total	205	3.0946	.73732	.05150	2.9930	3.1961	1.00	5.00

### Test of Homogeneity of Variances

Trust

Levene Statistic	df1	df2	Sig.
.122	1	203	.727

### ANOVA

Trust

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	5.553	1	5.553	10.700	.001
Within Groups	105.351	203	.519		
Total	110.904	204			

**Descriptives**

		N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
						Lower Bound	Upper Bound		
Credibility	Low Transparency	102	3.0948	.83301	.08248	2.9312	3.2584	1.00	5.00
	High Transparency	103	3.4110	.78826	.07767	3.2569	3.5651	1.00	5.00
	Total	205	3.2537	.82423	.05757	3.1402	3.3672	1.00	5.00
Integrity	Low Transparency	102	2.9477	.89951	.08906	2.7710	3.1244	1.00	5.00
	High Transparency	103	3.3786	.86199	.08493	3.2102	3.5471	1.33	5.00
	Total	205	3.1642	.90485	.06320	3.0396	3.2888	1.00	5.00
Benevolence	Low Transparency	102	2.7451	.94593	.09366	2.5593	2.9309	1.00	5.00
	High Transparency	103	2.9854	.87855	.08657	2.8137	3.1571	1.00	5.00
	Total	205	2.8659	.91839	.06414	2.7394	2.9923	1.00	5.00

**Test of Homogeneity of Variances**

	Levene Statistic	df1	df2	Sig.
Credibility	.010	1	203	.922
Integrity	.023	1	203	.881
Benevolence	1.699	1	203	.194

**ANOVA**

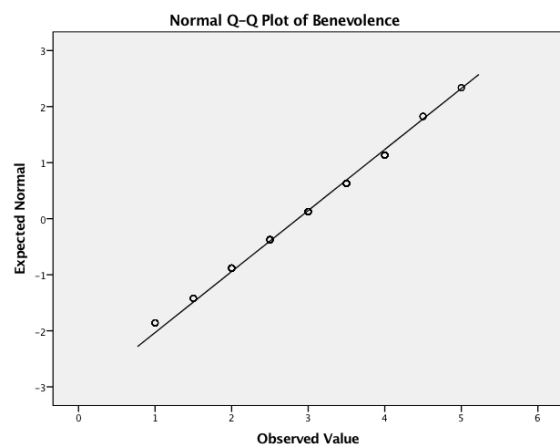
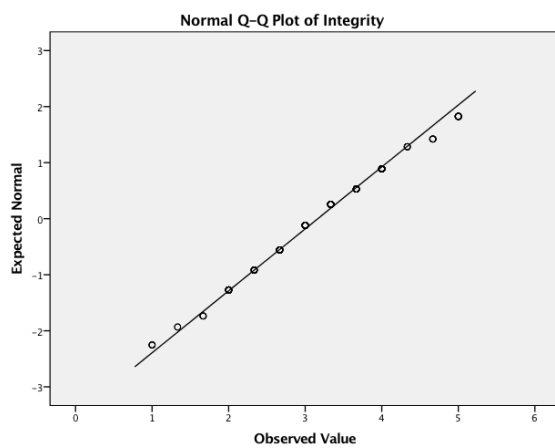
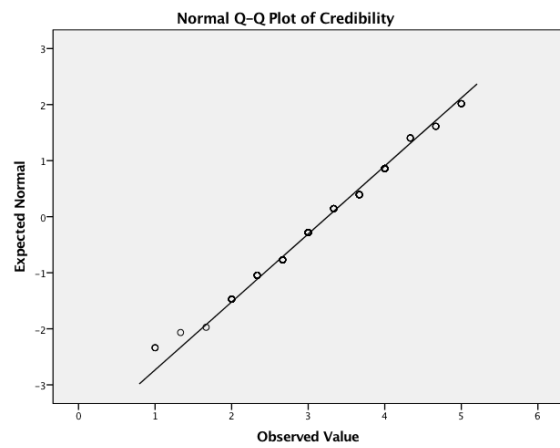
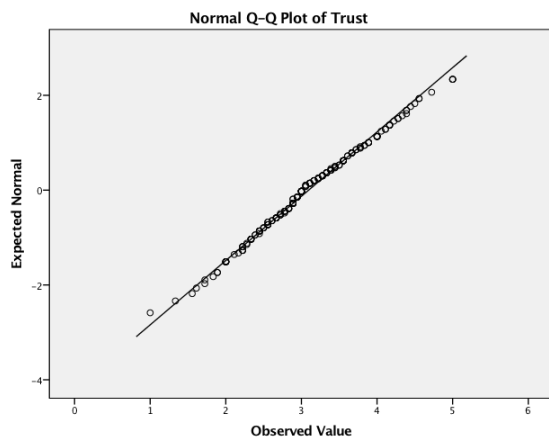
		Sum of Squares	df	Mean Square	F	Sig.
Credibility	Between Groups	5.125	1	5.125	7.795	.006
	Within Groups	133.463	203	.657		
	Total	138.588	204			
Integrity	Between Groups	9.517	1	9.517	12.265	.001
	Within Groups	157.510	203	.776		
	Total	167.027	204			
Benevolence	Between Groups	2.960	1	2.960	3.554	.061
	Within Groups	169.101	203	.833		
	Total	172.061	204			

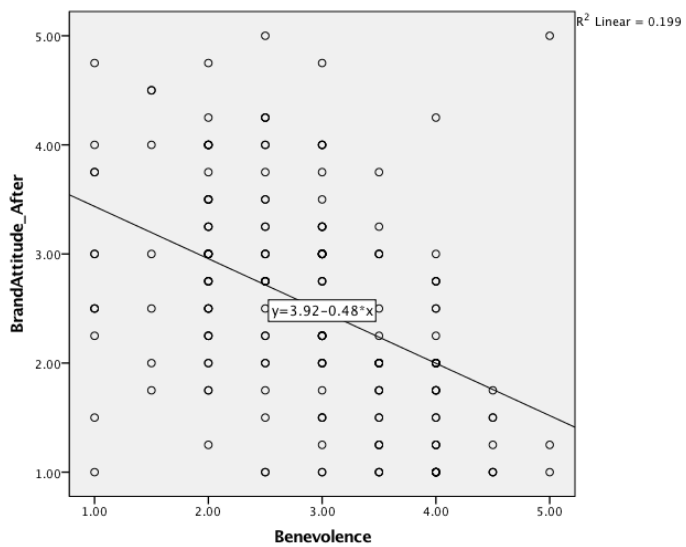
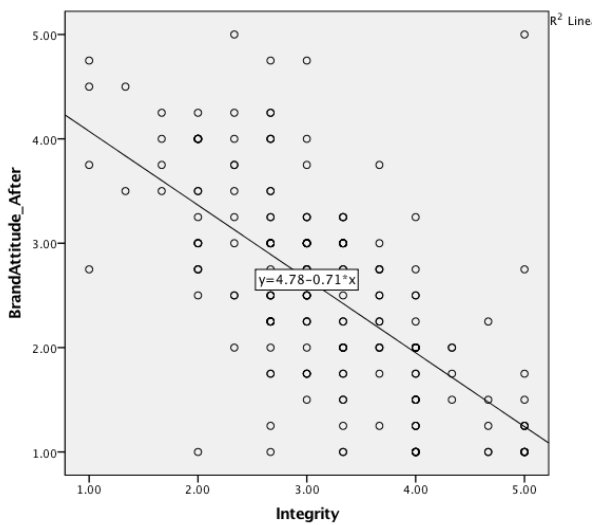
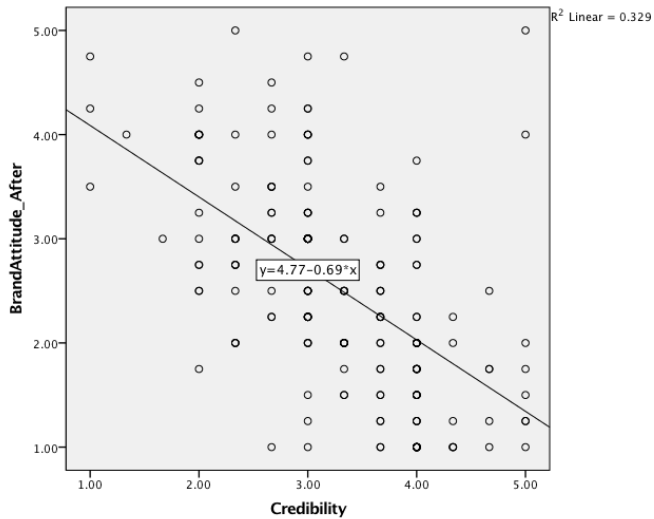
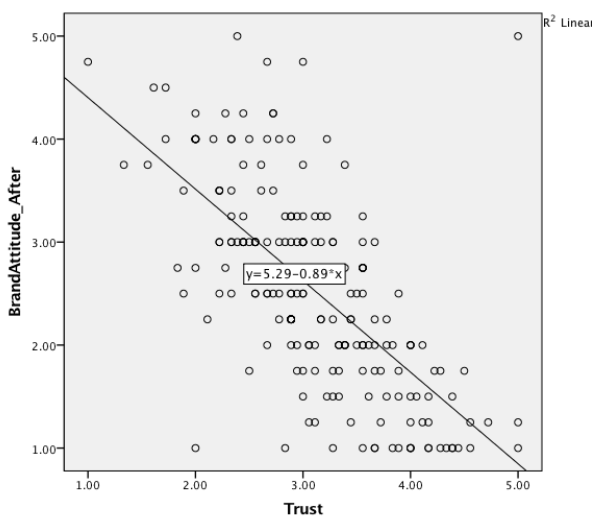
### Appendix 6 – Hypothesis 3

#### Tests of Normality

	Kolmogorov-Smirnov <sup>a</sup>			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
Trust	.078	205	.004	.993	205	.488
Credibility	.138	205	.000	.965	205	.000
Integrity	.109	205	.000	.970	205	.000
Benevolence	.134	205	.000	.958	205	.000

a. Lilliefors Significance Correction





## 1) Trust

### Model Summary

Model	R	R Square	Adjusted Square	RStd. Error of the Estimate
1	.664 <sup>a</sup>	.442	.439	.73877

a. Predictors: (Constant), Trust

### ANOVA<sup>a</sup>

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	87.604	1	87.604	160.511	.000 <sup>b</sup>
	Residual	110.794	203	.546		
	Total	198.398	204			

a. Dependent Variable: BrandAttitude\_After

b. Predictors: (Constant), Trust

### Coefficients<sup>a</sup>

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	5.292	.223		23.716	.000
	Trust	-.889	.070	-.664	-12.669	.000

a. Dependent Variable: BrandAttitude\_After

## 2) Credibility

### Model Summary

Model	R	R Square	Adjusted Square	RStd. Error of the Estimate
1	.573 <sup>a</sup>	.329	.325	.80996

a. Predictors: (Constant), Credibility

### ANOVA<sup>a</sup>

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	65.221	1	65.221	99.416	.000 <sup>b</sup>
	Residual	133.176	203	.656		
	Total	198.398	204			

a. Dependent Variable: BrandAttitude\_After

b. Predictors: (Constant), Credibility

### Coefficients<sup>a</sup>

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	4.774	.231		20.674	.000
	Credibility	-.686	.069	-.573	-9.971	.000

a. Dependent Variable: BrandAttitude\_After

### 3) Integrity

#### Model Summary

Model	R	R Square	Adjusted Square	RStd. Error of the Estimate
1	.649 <sup>a</sup>	.421	.418	.75210

a. Predictors: (Constant), Integrity

#### ANOVA<sup>a</sup>

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	83.570	1	83.570	147.742	.000 <sup>b</sup>
	Residual	114.827	203	.566		
	Total	198.398	204			

a. Dependent Variable: BrandAttitude\_After

b. Predictors: (Constant), Integrity

#### Coefficients<sup>a</sup>

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	4.780	.191		24.961	.000
	Integrity	-.707	.058	-.649	-12.155	.000

a. Dependent Variable: BrandAttitude\_After

Benevolence:

#### Model Summary

Model	R	R Square	Adjusted Square	RStd. Error of the Estimate
1	.446 <sup>a</sup>	.199	.195	.88461

a. Predictors: (Constant), Benevolence

#### ANOVA<sup>a</sup>

Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	39.543	1	39.543	50.531	.000 <sup>b</sup>
	Residual	158.855	203	.783		
	Total	198.398	204			

a. Dependent Variable: BrandAttitude\_After

b. Predictors: (Constant), Benevolence

#### Coefficients<sup>a</sup>

Model		Unstandardized Coefficients		Standardized Coefficients	t	Sig.
		B	Std. Error	Beta		
1	(Constant)	3.915	.203		19.296	.000
	Benevolence	-.479	.067	-.446	-7.109	.000

a. Dependent Variable: BrandAttitude\_After

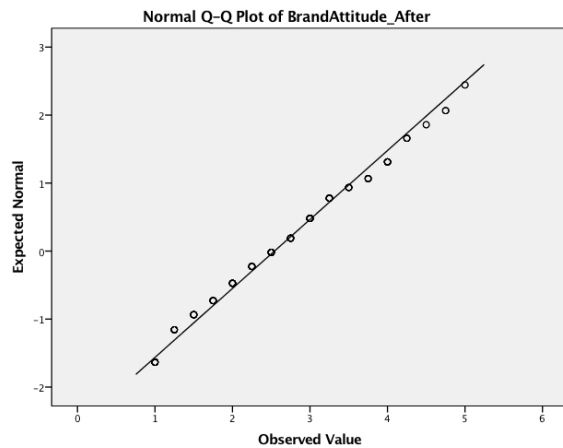
## Appendix 7 – Hypothesis 4

### Condition 1

#### Tests of Normality

	Kolmogorov-Smirnov <sup>a</sup>		Shapiro-Wilk	
	Statistic	df	Statistic	df
BrandAttitude_After	.079	205	.967	205

a. Lilliefors Significance Correction



### Condition 2

#### Levene's Test of Equality of Error Variances<sup>a</sup>

Dependent Variable: BrandAttitude\_After

F	df1	df2	Sig.
2.556	1	203	.111

Tests the null hypothesis that the error variance of the dependent variable is equal across groups.

a. Design: Intercept + Trust + Transparence

### Condition 4

#### Trust

#### Tests of Between-Subjects Effects

Dependent Variable: BrandAttitude\_After

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	90.017a	3	30.006	55.648	.000
Intercept	292.611	1	292.611	542.672	.000
Transparence * Trust	2.329	1	2.329	4.319	.039
Transparence	2.011	1	2.011	3.730	.055
Trust	83.340	1	83.340	154.560	.000
Error	108.380	201	.539		
Total	1522.500	205			
Corrected Total	198.398	204			

a. R Squared = .454 (Adjusted R Squared = .446)

## Credibility

### Tests of Between-Subjects Effects

Dependent Variable: BrandAttitude\_After

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	66.369a	3	22.123	33.680	.000
Intercept	265.281	1	265.281	403.862	.000
Transparence	.193	1	.193	.294	.588
Credibility	60.641	1	60.641	92.320	.000
Transparence * Credibility	.442	1	.442	.673	.413
Error	132.029	201	.657		
Total	1522.500	205			
Corrected Total	198.398	204			

a. R Squared = .335 (Adjusted R Squared = .325)

## Integrity

### Tests of Between-Subjects Effects

Dependent Variable: BrandAttitude\_After

Source	Type III Sum of Squares	df	Mean Square	F	Sig.
Corrected Model	85.281a	3	28.427	50.513	.000
Intercept	333.654	1	333.654	592.879	.000
Transparence	1.411	1	1.411	2.508	.115
Integrity	78.709	1	78.709	139.859	.000
Transparence * Integrity	1.670	1	1.670	2.967	.086
Error	113.117	201	.563		
Total	1522.500	205			
Corrected Total	198.398	204			

a. R Squared = .430 (Adjusted R Squared = .421)

**Tests - without interaction term → transparency is still not significant → full mediation**

**Credibility**

**Tests of Between-Subjects Effects**

Dependent Variable: BrandAttitude\_After

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Corrected Model	65.927 <sup>a</sup>	2	32.964	50.265	.000	.332
Intercept	265.644	1	265.644	405.071	.000	.667
Transparence	.706	1	.706	1.077	.301	.005
Credibility	60.274	1	60.274	91.910	.000	.313
Error	132.470	202	.656			
Total	1522.500	205				
Corrected Total	198.398	204				

a. R Squared = .332 (Adjusted R Squared = .326)

**Integrity**

**Tests of Between-Subjects Effects**

Dependent Variable: BrandAttitude\_After

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Corrected Model	83.611 <sup>a</sup>	2	41.805	73.569	.000	.421
Intercept	332.303	1	332.303	584.781	.000	.743
Transparence	.041	1	.041	.071	.790	.000
Integrity	77.958	1	77.958	137.189	.000	.404
Error	114.787	202	.568			
Total	1522.500	205				
Corrected Total	198.398	204				

a. R Squared = .421 (Adjusted R Squared = .416)

## Appendix 8 – Hypothesis 5

### Descriptives

BrandAttitude\_After

	N	Mean	Std. Deviation	Std. Error	95% Confidence Interval for Mean		Minimum	Maximum
					Lower Bound	Upper Bound		
Low Interactivity	103	3.0631	.92865	.09150	2.8816	3.2446	1.00	5.00
High Interactivity	102	2.0147	.73190	.07247	1.8709	2.1585	1.00	4.25
Total	205	2.5415	.98617	.06888	2.4057	2.6773	1.00	5.00

### Test of Homogeneity of Variances

BrandAttitude\_After

Levene Statistic	df1	df2	Sig.
3.750	1	203	.054

### ANOVA

BrandAttitude\_After

	Sum of Squares	df	Mean Square	F	Sig.
Between Groups	56.330	1	56.330	80.489	.000
Within Groups	142.068	203	.700		
Total	198.398	204			

## Appendix 9 – Hypothesis 6

### Model Summary<sup>c</sup>

Model	R	Adjusted R Square	Std. Error of the Estimate	Change Statistics					
				R Square Change	F Change	df1	df2	Sig. F Change	Durbin-Watson
1	.533a	.284	.277	.83863	.284	40.047	2	202.000	
2	.557b	.311	.300	.82495	.027	7.757	1	201.006	1.655

a. Predictors: (Constant), Proactivity, Interactivity

b. Predictors: (Constant), Proactivity, Interactivity, Interaction

c. Dependent Variable: BrandAttitude\_After

### ANOVA<sup>a</sup>

Model	Sum of Squares	df	Mean Square	F	Sig.
1 Regression	56.330	2	28.165	40.047	.000b
Residual	142.068	202	.703		
Total	198.398	204			
2 Regression	61.609	3	20.536	30.177	.000c
Residual	136.788	201	.681		
Total	198.398	204			

a. Dependent Variable: BrandAttitude\_After

b. Predictors: (Constant), Proactivity, Interactivity

c. Predictors: (Constant), Proactivity, Interactivity, Interaction

### Coefficients<sup>a</sup>

Model	Unstandardized Coefficients		Standardized Coefficients		t	Sig.	Correlations			Collinearity Statistics	
	B	Std. Error	Beta				Zero-order	Partial	Part	Tolerance	VIF
1 (Constant)	4.108	.463			8.872	.000					
Interactivity	-1.048	.117	-.533		-8.946	.000	-.533	-.533	-.533	.999	1.001
Proactivity	.001	.117	.001		.009	.993	-.014	.001	.001	.999	1.001
2 (Constant)	3.920	.460			8.514	.000					
Interactivity	-1.050	.115	-.534		-9.107	.000	-.533	-.540	-.533	.999	1.001
Proactivity	.054	.117	.028		.464	.644	-.014	.033	.027	.973	1.028
Interaction	-.163	.059	-.165		-2.785	.006	-.161	-.193	-.163	.973	1.027

a. Dependent Variable: BrandAttitude\_After

## Appendix 10 – Additional Analysis

### Descriptive Statistics

Dependent Variable: BrandAttitude\_After

Transparency	Interactivity	Mean	Std. Deviation	N
Low Transparency	Low Interactivity	3.2250	1.03170	50
	High Interactivity	2.2115	.65564	52
	Total	2.7083	.99633	102
High Transparency	Low Interactivity	2.9104	.79978	53
	High Interactivity	1.8100	.75687	50
	Total	2.3762	.95221	103
Total	Low Interactivity	3.0631	.92865	103
	High Interactivity	2.0147	.73190	102
	Total	2.5415	.98617	205

### Tests of Between-Subjects Effects

Dependent Variable: BrandAttitude\_After

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared
Corrected Model	62.986a	3	20.995	31.165	.000	.317
Intercept	1320.930	1	1320.930	1960.747	.000	.907
Transparence	6.567	1	6.567	9.748	.002	.046
Interactivité	57.214	1	57.214	84.926	.000	.297
Transparence * Interactivité	.097	1	.097	.144	.705	.001
Error	135.411	201	.674			
Total	1522.500	205				
Corrected Total	198.398	204				

a. R Squared = .317 (Adjusted R Squared = .307)

## Appendix 11 – Mixed ANOVA

### Condition 1:

#### Correlations

		BrandAttitude	BrandAttitude_After
BrandAttitude	Pearson Correlation	1	.492**
	Sig. (2-tailed)		.000
	N	205	205
BrandAttitude_After	Pearson Correlation	.492**	1
	Sig. (2-tailed)	.000	
	N	205	205

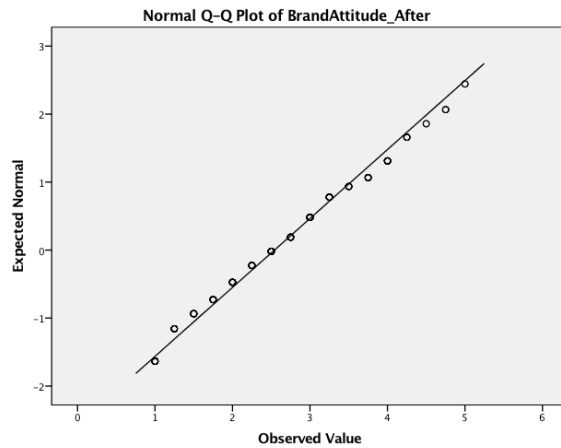
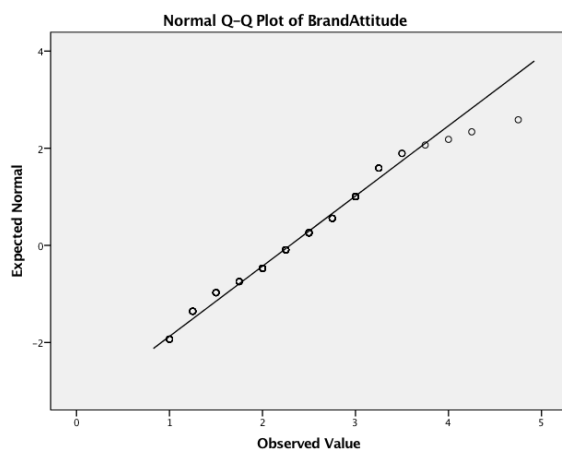
\*\* . Correlation is significant at the 0.01 level (2-tailed).

### Condition 2:

#### Tests of Normality

	Kolmogorov-Smirnova			Shapiro-Wilk		
	Statistic	df	Sig.	Statistic	df	Sig.
BrandAttitude	.088	205	.001	.966	205	.000
BrandAttitude_After	.079	205	.003	.967	205	.000

a. Lilliefors Significance Correction



**Condition 3:**

## Test of Homogeneity of Variances

Condition	Levene Statistic	df1	df2	Sig.
	2.389	16	188	.003

**Condition 4:****Mauchly's Test of Sphericity<sup>a</sup>**

Measure: MEASURE\_1

Within Subjects Effect	Mauchly's W	Approx. Chi-Square	df	Sig.	Epsilon <sup>b</sup>		
					Greenhouse-Geisser	Huynh-Feldt	Lower-bound
BeforeAfter	1.000	.000	0	.	1.000	1.000	1.000

Tests the null hypothesis that the error covariance matrix of the orthonormalized transformed dependent variables is proportional to an identity matrix.

a. Design: Intercept + Condition

Within Subjects Design: BeforeAfter

b. May be used to adjust the degrees of freedom for the averaged tests of significance. Corrected tests are displayed in the Tests of Within-Subjects Effects table.

**Tests of Within-Subjects Effects**

Measure: BrandAttitudeBI

Source		Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Eta Squared	Noncent. Parameter	Observed Power <sup>a</sup>
BeforeAfter	Sphericity Assumed	6.095	1	6.095	24.714	.000	.109	24.714	.999
	Greenhouse-Geisser	6.095	1.000	6.095	24.714	.000	.109	24.714	.999
	Huynh-Feldt	6.095	1.000	6.095	24.714	.000	.109	24.714	.999
	Lower-bound	6.095	1.000	6.095	24.714	.000	.109	24.714	.999
BeforeAfter * Condition	Sphericity Assumed	29.988	3	9.996	40.531	.000	.377	121.593	1.000
	Greenhouse-Geisser	29.988	3.000	9.996	40.531	.000	.377	121.593	1.000
	Huynh-Feldt	29.988	3.000	9.996	40.531	.000	.377	121.593	1.000
	Lower-bound	29.988	3.000	9.996	40.531	.000	.377	121.593	1.000
Error(BeforeAfter)	Sphericity Assumed	49.572	201	.247					
	Greenhouse-Geisser	49.572	201.000	.247					
	Huynh-Feldt	49.572	201.000	.247					
	Lower-bound	49.572	201.000	.247					

a. Computed using alpha = .05

### Tests of Between-Subjects Effects

Measure: BrandAttitudeBI

Transformed Variable: Average

Source	Type III Sum of Squares	df	Mean Square	F	Sig.	Partial Squared	Eta Noncent. Parameter	Observed Power <sup>a</sup>
Intercept	2394.167	1	2394.167	2642.231	.000	.929	2642.231	1.000
Condition	34.393	3	11.464	12.652	.000	.159	37.956	1.000
Error	182.129	201	.906					

a. Computed using alpha = .05

### Pairwise Comparisons

Measure: BrandAttitudeBI

(I) Condition	(J) Condition	Mean Difference (I-J)	Std. Error	Sig. <sup>b</sup>	95% Confidence Interval for Difference <sup>b</sup>	
					Lower Bound	Upper Bound
1	2	.768*	.135	.000	.409	1.126
	3	.163	.133	1.000	-.190	.517
	4	.450*	.133	.005	.095	.805
2	1	-.768*	.135	.000	-1.126	-.409
	3	-.604*	.133	.000	-.958	-.250
	4	-.318	.133	.109	-.673	.038
3	1	-.163	.133	1.000	-.517	.190
	2	.604*	.133	.000	.250	.958
	4	.287	.131	.182	-.064	.637
4	1	-.450*	.133	.005	-.805	-.095
	2	.318	.133	.109	-.038	.673
	3	-.287	.131	.182	-.637	.064

Based on estimated marginal means

\*. The mean difference is significant at the .05 level.

b. Adjustment for multiple comparisons: Bonferroni.