



**MASTER THESIS**

**The relationship of online product reviews and  
consumers' product evaluation: A causal  
attribution approach**

**Maria Cyntia Chandra Dewi**  
S2041529

Communication Studies  
Digital Marketing Communication  
Faculty of Behavioural, Management and Social Sciences

Supervisors:  
R.S. Jacobs PhD  
dr. M. Galetzka

16 September 2019

**UNIVERSITY OF TWENTE.**

## **ABSTRACT**

Drawing on insights from attribution theory, this study aims to explain the relationship of online product reviews and consumers' product evaluation by using causal attribution, including the interaction of review platforms, company response, and review valence. This study addresses the objectives by testing the effects of different platform types with (and without) a company response on the consumers' product evaluation. All tests have been done within positive and negative valence. In this study the hypotheses have been tested using a 3 (brand's website with company response vs brand's website without company response vs personal blog) x 2 (positive review vs negative review) experimental design on 316 participants. The result confirms previous studies suggesting that selling intention on corporate platforms affects consumers causal attribution about reviewers' motive. Consequently, the reviews posted on corporate platforms were less persuasive compared to the reviews posted on independent platforms. This study also confirms that company response plays a significant role on consumers' causal attribution. Furthermore, the findings suggest that the consumers' product attribution generates a significantly higher influence on the consumers' product evaluation compared to the consumers' communicator attribution.

*Keywords: online product review, company response, causal attribution, product evaluation, review platform, review valence*

## TABLE OF CONTENTS

Title page .....	1
Abstract .....	2
1. Introduction .....	4
2. Theoretical framework .....	9
2.1 Review platforms and product evaluation.....	9
2.2 Review platforms and consumer's causal attribution .....	11
2.3 Company response and consumers' causal attribution.....	14
2.4 How consumer's causal attribution influences consumer's product evaluation .....	16
3. Methodology .....	20
3.1. Research design.....	20
3.2 Participants .....	20
3.3 Experiment design and procedure .....	22
3.3.1 Pre-test.....	22
3.3.2 Manipulation .....	26
3.3.3 Procedure.....	31
3.4 Measurement .....	32
3.4.1 Constructs.....	33
3.4.2 Manipulation check .....	35
4. Result.....	37
5. Discussion, limitations and implications.....	49
5.1 General discussion.....	49
5.2 Limitation and future research direction .....	52
5.3 Implications .....	54
6. Conclusion.....	56
References .....	57
Appendix A .....	66
Appendix B .....	75

# **The relationship of online product reviews and consumers' product evaluation: A causal attribution approach**

## **1. INTRODUCTION**

Over the last few years, the popularity of online product reviews has grown significantly. Online product reviews could be described as a type of word-of-mouth related to a certain product, brand, or service generated electronically by consumers. Nowadays, it is a common practice for consumers to consult product reviews on almost any product. Over time, online product reviews have slowly begun to play an increasing role in customers' decision journey (Browning, So, & Sparks, 2013). Sen and Lerman (2007) state that most online shoppers primarily depend on online product reviews to decide on their purchase. Consistently, according to the Social Shopper Study conducted in 2007, 65% of the customers "always" or "most of the time" read reviews before making a purchase decision (Freedman, 2008).

Looking at the context of *search* and *experience products* (Stigler, 1961; Nelson, 1970), online product reviews are especially crucial for experience goods such as beauty products. While it is relatively easy for consumers to evaluate search products' attributes prior to purchase, it is difficult to evaluate experience products' attributes before consumption (Franke, Huhmann, & Mothersbaugh, 2004). For example, when buying a face cream product, it is difficult for consumers to judge if the product will be satisfactory or deliver according to their expectation. Consumers need to first experience the product to be able to evaluate it. In contrast, when for example buying a piece of clothing, consumers can already judge if they like the product or not before they actually purchase it. Consequently, online reviews on experience products will provide more information

for consumers compared to search products (Park & Lee, 2009; Mudambi & Schuff, 2010). Recent research by KPMG International (2017) states that with regard to beauty products, brand reputation and online product reviews are the top considerations (27% and 21%) for customers. In sum, online product reviews help potential consumers to evaluate a product easily and thus, reducing risk related to the purchase.

Online product reviews have resulted in a massive shifting in the marketing industry. The conventional, one-way public relation strategy most companies applied to manage brand engagement is not relevant anymore. Nowadays, consumers expect a deeper, two-way, relationship with companies and brands (Prahalad & Ramaswamy, 2004). Many major companies in the beauty industry, like L'Oreal Paris and Sephora, provide review pages in their brand's website, where their previous customers can post reviews (Hennig-Thurau, Gwinner, Walsh, & Gremler, 2004). This tactic ensures that the potential customers will stay on the brand's website to examine online reviews instead of clicking to a third-party review site. When potential customers stay on the brand's website, there is a greater possibility that they will make a purchase. Accordingly, a website with online product reviews is perceived as more helpful by customers (Li, Huang, Tan, & Wei, 2013).

Aside from impacting purchase, online product reviews also potentially have a long-term impact on the business reputation (Hennig-Thurau *et al.*, 2004). For these reasons, companies begin to develop a line of communication with their consumers by giving company responses to online reviews related to their products. Previous studies have suggested that company response is even more critical in case of negative online product reviews (Mauri & Minazzi, 2013; Sparks & Bradley, 2014). Company response can help to repair a damaged reputation (Homburg & Fürst, 2007; Xia, 2013). Furthermore, Van Noort & Willemsen (2012) have suggested that a company

accommodative response to online product reviews creates a positive evaluation both on the brand and on the company platform.

While it is a common practice, for several reasons, assessing the accuracy of online product reviews on corporate platforms and generating a product evaluation from it is not a simple matter to consumers. Firstly, there are numerous online product reviews available online. Consumers have to sort and scrutinize through the huge amount of online product reviews across various web sites to generate a product evaluation. Freedman (2008) has reported that consumers spent on the average half an hour on checking online product reviews before making a purchase decision. Secondly, consumers are often doubtful of the validity of online product reviews on corporate platforms. Freedman (2008) has stated that about 35% of online consumers question the legitimacy of online product reviews displayed in corporate platforms. Companies can easily pay someone to write a favourable online product review as they have a full control over their platform. This practice could mislead consumers, as the paid reviews might be mistaken for independent reviews. Lastly, consumers hardly able to verify the legitimacy of a review when the company is known to have control over the content. Consumers could suspect that the company modified the reviews by amending and deleting unpleasant consumers' feedback, in order to show positive brand reputation.

Attribution theory describes the way people make causal inferences, the kind of inferences, and the consequences of these inferences (Folkes, 1988). Previous studies in consumer behaviour have used attribution theory to explain the causal attribution generated by consumers in order to understand an endorser's motivation (Lee & Youn, 2009). Once consumers understand the motive behind a review, it is expected that they will be able to judge if the review is accurately representing the product. Hence, the causal attribution process is significant for consumers when assessing the accuracy of online product reviews on corporate platforms to generate a product evaluation.

Furthermore, Lacznia, DeCarlo, and Ramaswami (2001) have suggested that causal attributions not only mediate the relationship of negative word of mouth and brand evaluation, but further influence subsequent brand evaluations. Thus, a relevant research question is: how does causal attribution explain the relationship of online product reviews and consumers' product evaluation, including the interaction of review platforms, company response, and review valence?

Previous studies have investigated different attributes of online product reviews which influence consumers' product evaluation. Firstly, prior studies have focused on the content or the message of the online product reviews (Doh & Hwang, 2009; Jiménez & Mendoza, 2013; Ullah, Amblee, Kim, & Lee, 2016). Those studies have explored the review content, such as its valence, information detail, and information type. Secondly, prior studies have shown trends in examining the source of the online product reviews, for example, investigating the reviewer's credibility and popularity (Ananda & Wandebori, 2016; Konstantopoulou, Rizomyliotis, Konstantoulaki, & Badahdah, 2018). Lastly, studies in online product reviews have also explored the receiver. These studies have found that customer involvement (Doh & Hwang, 2009) and prior knowledge (Harris & Gupta, 2008) influence the persuasiveness of online product reviews.

Few studies have examined the interaction of review platforms, company response, and review valence related to the relationship between online product reviews and consumers' product evaluation. Some studies have discussed the influence of reviews which are posted on social media (Ananda & Wandebori, 2016; Kudeshia & Kumar, 2017). Blog as review platform also have investigated in some other studies (Schmallegger & Carson, 2008; Wu & Lee, 2012). Yet, both platforms are considered as independent platforms which are established by an individual or group with no affiliation to the specific brands and/or products. There has not yet been a study discussing how the causal attribution process and the interaction between review platforms, company

response, and review valence influence consumers' product evaluation. From the practitioner's perspective, insight in how review platforms and company response affect consumers' product evaluation can assist companies in developing an ideal business plan related to online product reviews (Constantinides & Fountain, 2008). From the academic perspective this study is significant to add knowledge on how the causal attribution process influences consumers' product evaluation.

The next chapter introduces the research model and discusses the relationship between each variable. The hypotheses about the interaction effects are also discussed here. Chapter 3 describes the pre-test and the stimulus materials. Furthermore, this chapter provides information about the method of the study, including the measures, the participants and the procedure. Next, chapter 4 discusses the results of the experiment, which then leads to a discussion in chapter 5. This chapter provides an overview of the most important conclusions of the performed study and tests these conclusions against existing theories in the literature. These comparisons evoke some discussion points and suggestions for future research. Chapter 5 ends with practical implications for marketers.



## **2. THEORETICAL FRAMEWORK**

In this chapter each variable will be defined and an explanation of its significance in the research model will be provided. Thereafter the relationship between the variables will be discussed. Finally, hypotheses for the study will be presented after each subsection.

### **2.1 Review platforms and product evaluation**

In the online setting, consumers often cannot recognize the identity of the reviewers or the true motivation for writing the information (Chatterjee, 2001). Unlike the traditional word-of-mouth, in the online setting, the relationship between the reviewers and the receivers is considered as a weak-tie relationship because the reviewers' identity is not constrained by the receivers' social circle (Chatterjee, 2001). Aware that their review will be read by strangers, online reviewers typically have no concern for the consequences of their review (Granitz & Ward, 1996). That means there is a possibility of misleading information in online product reviews (Bailey, 2005). For these reasons, it is fairly complex for consumers to determine the credibility of product reviews of weak-tie reviewers online (Chatterjee, 2001). Hence, it is essential for consumers to seek for other cues in order to assess the accuracy of the online product reviews.

One of these cues is the platform, which refers to the location where the online product review is posted (Senecal & Nantel, 2004; Xue & Phelps, 2004). Kiecker and Cowles (2002) have classified online platforms into corporate and independent platforms. Corporate platforms refer to an online environment created by corporations affiliated to specific brands and/or products, where their previous consumers can post online product reviews (e.g. review page in L'Oréal Paris website). In contrast, independent platforms refer to an online environment established by an individual or

group with no affiliation to the specific brands and/or products, where people can post online product reviews (e.g. third-party online review sites like TripAdvisor, online forum, or personal review blog).

A corporate platform is often associated with its selling goals (Senecal & Nantel, 2004; Xue & Phelps, 2004). Product reviews displayed on a brand's website might be controlled and curated as the company has control over the information (Xue & Phelps, 2004). Once a harmful review is posted, the company can monitor it, respond to it, and even delete it in order to protect the company's or brand's reputation and image (Xue & Phelps, 2004). Another practice that is commonly known is paid reviewing. Paid reviewers are persons who are paid to post fake reviews with requested content of a company which hired them (Tsao, Hsieh, Shih, & Lin, 2015). Even though this practice could be done on both corporate and independent platforms, the selling intention of corporate platforms throws more suspicion on them. For companies, paid reviewers could be a marketing strategy to control content related to their product and generate a positive image for prospective consumers. For these reasons, consumers may perceive the reviews posted on corporate platforms as a biased representation of the product.

A personal blog is perceived as an independent platform which is free from commercial purposes. Therefore, consumers value reviews in blogs more and perceive them as accurate representations of the product experience (Wu & Lee, 2012). Previous research has stated that consumers perceive online product reviews posted on independent platforms as a more accurate representation of the product compared to online product reviews posted on corporate platforms (Xue & Phelps, 2004). The result is consistent with the Wiener and Mowen (1986) study about source trustworthiness. The study has found that participants who received endorsement from a low trustworthy source (an endorser who is related to the product) were less likely to be persuaded compared to participants

who received the endorsement from a high trustworthy source (an endorser not related to the product). In the Wiener and Mowen (1986) study, for example, the participants were more likely to be persuaded to buy the car when a good review about the car was delivered by a mechanic who had no relation with the auto dealer, compared with a mechanic who is related with the auto dealer. For this reason, independent platforms are believed to have greater influence than corporate platforms. In this study, a brand's website was used to manipulate the corporate platform, while a personal review blog (as an independent platform) measured as a control variable.

**H<sub>1</sub>:** The impact of online product reviews on consumer's product evaluation is more pronounced when the reviews are posted on a personal blog compared to the brand's website.

## **2.2 Review platforms and consumer's causal attribution**

Attribution theory describes the way people make causal inferences, the kind of inferences, and the consequences of these inferences (Folkes, 1988). Previous studies in consumer behaviour have used attribution theory to explain the causal attribution generated by consumers in order to understand an endorser's motivation (Lee & Youn, 2009). Kelley (1967, 1973) has suggested that there are several causal attributions categories. While it is possible that consumers generate several attributional responses, this study emphasizes on attributions which are related to consumers' product evaluations: product and communicator attributions.

Product attribution refers to the factors related to the internal factor or stimulus itself (the product). For example, a consumer thinks that a positive product review was made because the product has favourable characteristics (internal motivations). On the other hand, communicator attribution refers to the factor related to the person or the reviewer (external motivations) (Mizerski, Golden,

& Kernan, 1979; Sen & Lerman, 2007). For example, a consumer thinks that the positive product review was written because of the reviewer's lack of capability in evaluating the product, instead of the favourable characteristic of the product. The lack of capability could be explained as the reviewer's personal incompetence in giving a review or other conditions (such as receiving a particular benefit when write the review in such manner) which may hinder the reviewer's capability in writing an accurate online product review.

As mentioned before, a brand's website is often associated with its selling goals (Senecal & Nantel, 2004; Xue & Phelps, 2004). Consumers tend to attribute the reviews to non-stimulus factors, such as communicator attribution, when they suspect that marketers influence the reviews (Lee & Youn, 2009). Having the capacity to influence the information, companies might control the reviews displayed on their site to show the most positive representation of the products (Xue & Phelps, 2004). Consumers may perceive positive reviews on the brand's website as a biased representation of the product, which ultimately moves consumers to attribute the review to the communicator. On the other hand, a personal blog is perceived as an independent platform which is free from commercial purposes. Therefore, the positive reviews in the personal blog are more likely to be perceived as an accurate representation of the product and consumers will attribute the positive characteristics to the product itself (Wu & Lee, 2012).

Regarding negative reviews it is a different situation. Previous studies have proposed that negative reviews are weighed more in consumers' evaluation process than positive reviews (Lee, Rodgers, & Kim, 2009; Park & Lee, 2009). Negative product information found more "diagnostic" to assist consumers to identify products' quality (Herr, Kardes, & Kim, 1991). This is because negative attributes mostly characterize a low-quality product (Herr *et al.*, 1991), while positive attributes do not necessarily mean a high-quality product. Negative information assists consumers to identify a

low quality product. Furthermore, while causal attribution is a cognitive process, the negativity effect is a form of cognitive bias which affects the cognitive process subconsciously (Rozin & Royzman, 2001). Hence, in case of a negative product review, it is possible that consumers do not need to consider other alternative cues to make causal attribution of the reviewers' intention.

In sum, this study argues that the platform (on which an online product review is displayed) serves as a situational cue which assists consumers in inferring the reviewer's motivation to write the online product review. When positive product reviews are displayed on the corporate platform, or a platform related to the product itself, consumers more likely to attribute the reviewers' motivations to the communicator (e.g. reviewer's lacking capability to evaluate the product). In contrast, consumers will attribute the reviewers' motivation to the product if the positive reviews are displayed in a non-product related platform (such as a personal blog). Furthermore, due to the negativity effect, consumers will attribute negative product reviews to the product, regardless of the platform type. In consequence, how consumers attribute the reviewers' motive will then impact consumers' product evaluation. Thus, the following hypotheses are proposed:

**H<sub>2a</sub>:** Consumers will be more likely to attribute positive online product reviews posted on a brand's website to the communicator, compared to positive online product reviews posted on a personal blog.

**H<sub>2b</sub>:** Consumers will attribute negative online product reviews to the product regardless of the platform on which the reviews are posted.

### **2.3 Company response and consumers' causal attribution**

Online platforms have facilitated consumers to share their experiences with companies and a multitude of other prospective consumers. Consumers' empowerment to voice their opinion online poses new threats for companies, especially when it is negative (Henning-Thurau *et al.*, 2010). It is important for companies to deal with online product reviews as negative information is destructive for the company's reputation (Lee & Song, 2010). Not giving any response to negative reviews could be perceived by consumers as that the company is to blame, and therefore consumers attribute the negative reviews to the product. Thus, some companies have initiated measures to monitor and intervene by providing company responses (Van Noort & Willemsen, 2012).

Lee and Song (2010) have classified response strategies into three types: accommodative, “no-action”/ “inaction”, and defensive strategies. Firstly, accommodative strategy is explained as a response strategy in which the companies acknowledge the problems and express willingness to fix them. In this approach, companies typically agree to take the responsibility for the problems and to take necessary precautionary actions. Secondly, no-action or inaction strategy is described as a means of companies to stay away from the problems by remaining silent or making meaningless comments (Lee, 2004). Lastly, defensive strategy refers to a response strategy in which the companies claim that the problems do not exist and insist that the company has no responsibility for a problem.

While providing company responses to online product reviews seems to be effectual, it can also backfire on a company. Previous studies have discovered that company responses also impact negatively on the purchase intentions when the response is perceived as defensive by consumers (Davidow, 2003; Mauri & Minazzi, 2013). However, Bradley and Sparks (2009) have suggested that no response to a negative review consequently results in low ratings and low purchase

intention. Correspondingly, Van Noort and Willemsen (2012) have suggested that accommodative company responses to negative product reviews create positive evaluation both on the product and on the platform. This means that the presence of company responses can increase consumers' trust in the brand's website and ultimately trust in the review itself (Lee, 2005). Consequently, consumers may perceive the reviews on the brand's website as an accurate representation of the product and consumers will attribute the reviews to the product itself.

Kelley's (1967) covariation model provides three information dimensions used in the causal attribution process: "consensus", "distinctiveness", and "consistency". In this study, consensus is regarded as a major type of information dimension as it is difficult to observe reviewer behaviours in order to obtain distinctiveness and consistency. Consensus is described as the extent to which other individuals behave similarly in an identical condition. Additionally, Folkes (1988) has stated that consumers tend to believe that they have similar preferences and consumption behaviours among them. Hence, other consumers' reviews toward a product or service are an important cue to understand a particular reviewer's motive. However, when other consumers' reviews are not available, company responses might help and act as an alternative cue to provide an information dimension.

A company response to a negative review might help to frame the review as a low consensus piece of information (Lee & Song, 2010). To illustrate using a fictitious example: a reviewer writes that a skin care product was irritating. The company then gives an accommodative response to the negative review. The company apologizes, offers a refund and gives an explanation about the product. In the explanation, the company informs how to apply the product properly and about another product which may fit the reviewer's skin type better. A week after, a prospective consumer who is looking for a skin care product reads the review and the company response. After reading

the review, this prospective consumer thinks that the complaint was not the company's fault, because the explanation given in the company response provided extra information, which implied that the reviewer might not have used the product properly.

The illustration above suggests that the company response could provide a low consensus information dimension to the review. This means that the company response provides information which imply that the review does not reflect general consumers' experience with the product. Thus, when a company is able to respond to negative online product reviews in the accommodative manner, consumers may compensate the negative evaluation of the product and attribute the negative evaluation to the communicator (Lee & Song, 2010). Additionally, Hilton (1995) has suggested that when the responsibility is transferred to the communicator, consumers will be more supportive towards the product. To test this effect, this study will use accommodative strategy as the company response strategy and proposes the following hypotheses:

**H<sub>3a</sub>:** Consumers will be more likely to attribute positive online product reviews (posted on a brand's website) with company response to the product, compared to the positive online product reviews (posted on a brand's website) without company response.

**H<sub>3b</sub>:** Consumers will be more likely to attribute negative online product reviews (posted on a brand's website) with company response to the communicator, compared to the negative online product reviews (posted on a brand's website) without company response.



## **2.4 How consumer's causal attribution influences consumer's product evaluation**

Causal attribution is explained as the reasoning generated by a receiver as an attempt to understand why would a communicator generate a particular information (Calder & Burnkrant, 1977). In this study, consumers' causal attribution about the reviewers' motivation will be categorized as product attribution or communicator attribution. The discounting principle of Kelley's (1973, p.113) specified that "the role of a given cause in producing a given effect is discounted if other plausible causes are also present". People are required to choose among different possible causes as explanations for any event or behaviour. When there is more than one reason available, they discount, or minimize, the importance of each reason because of the uncertainty of the real cause. In the current study this means that when consumers infer communicator reason as the motivating factor behind a product review, they will subsequently discount the stimulus attribution motives, such as actual product quality (Sparkman, 1982).

The significant role of causal attributions in product evaluation is in line with DeCarlo's and Leigh's (1996) which reported a direct relationship between employee performance attributions and employee performance evaluation on their cognitive processing model of performance evaluation. Correspondingly, studies in advertising have proposed that audiences make causal attributions which influenced their assessments on the advertised brand (Atkin, McCardle, & Newell, 2008; Han, 2004). This proposition is consistent with a Laczniak *et al.* (2001) study, which stated that causal attributions not only mediate the relationship of negative word of mouth and brand evaluation, but further influence subsequent brand evaluations.

Attribution theory has suggested that the more product reviews are attributed to the product's performance (or product attribution), the more consumers will have confidence in the accuracy of the reviews, and the more influential the reviews are (Mizerski, 1982; Sen & Lerman, 2007). In

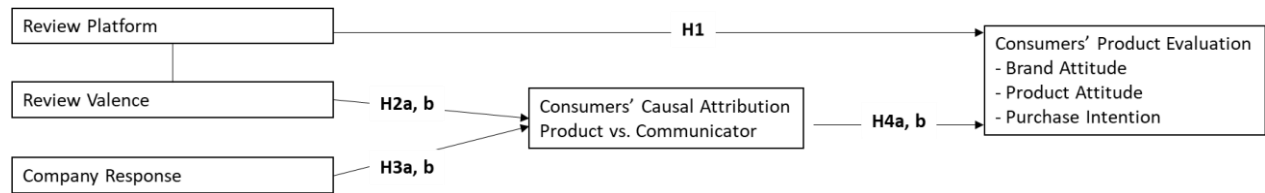
contrast, the discounting principle in attribution theory (Kelley 1973) has proposed that the more consumers attribute the product reviews to non-stimulus factors (such as communicator attribution), the more consumers will discount the product's actual performance. Hence, consumers will perceive that the reviewer is not credible, and thus, the review will be less persuasive (Mizerski, 1982; Sen & Lerman, 2007). Therefore, the following hypotheses are proposed:

**H<sub>4a</sub>:** Product attribution (of positive reviews) will generate a greater positive influence on product evaluation compared to the communicator attribution.

**H<sub>4b</sub>:** Product attribution (of negative reviews) will generate a greater negative influence on product evaluation compared to the communicator attribution.

The vital notion of attribution theory is that individuals need causal analysis to comprehend social phenomenon around them (Kelley, 1967). Hence, the attribution theory is helpful to understand how consumers infer why a reviewer would communicate about a product in such a way. Previous studies have found that online product reviews are significantly influential on the consumers' product evaluation, especially in experience goods (Mudambi & Schuff, 2010; Park & Lee, 2009). While experience goods' quality and utility are difficult to be determined prior to consumption (Franke *et al.*, 2004), this suggest that consumers must rely on previous experiences to make a product evaluation.

Figure 1 illustrates the proposed model of how consumers process online product reviews. Firstly, it will be argued that a review platform has a direct effect on consumers' product evaluation. Secondly, review platform and review valence are posited to influence consumers' causal attributions. Thirdly, company response is also thought to affect consumers' causal attributions. Finally, these attributional responses are posited to influence consumers' product evaluations.



**Figure 1:** Consumers' product evaluation process model

### 3. METHODOLOGY

#### 3.1. Research design

This study tested the hypotheses using a 3 (brand's website with company response vs brand's website without company response vs personal blog) x 2 (positive review vs negative review) experimental design, in which the participants were randomly assigned to one of the six between-participants experimental conditions (as shown in Table 1). The stimulus materials were designed to allow the manipulation of the different constructs. In total, six different review pages were created to measure the effects of review platforms, review's valence, and company response on consumers' product evaluation. This section presents the participants involved, procedures taken, and measurements used in this study.

**Table 1**

Experimental design

		<i>Review valence</i>	
		<i>Positive</i>	<i>Negative</i>
Review platform x company response	Personal blog	Group 1 (n = 53)	Group 2 (n = 41)
	Brand's website without company response	Group 3 (n = 50)	Group 4 (n = 55)
	Brand's website with company response	Group 5 (n = 55)	Group 6 (n = 62)

#### 3.2 Participants

The total number of participants in this study was 384. However, only 316 participants' data were used. Participants who did not finish the survey and observed the manipulation page less than three seconds were excluded from the study, which made the number of participants 322. Thereafter, participants who stated that they did not see any review were also excluded from the study, which means the final number of participants was 316. Each condition group (1 = personal blog, positive

review; 2 = personal blog, negative review; 3 = brand's website, positive review; 4 = brand's website, negative review; 5 = brand's website, positive review, company response present; 6 = brand's website, negative review, company response present) contained 53, 41, 50, 55, 55, and 62 participants, respectively. Following the rule of thumb, adequate sample size for experimental research is at least 30 participants per condition (Hogg, Tanis, & Zimmerman, 2014), meaning that the number of participants was sufficient.

**Table 2**

Age and gender distribution across the conditions

Group	Age		Gender	
	<i>M</i>	<i>SD</i>	Male	Female
Group 1	26	6.58	20.8% (n = 11)	79.2% (n = 42)
Group 2	31	13.50	17.1% (n = 7)	82.9% (n = 34)
Group 3	28	7.20	22.0% (n = 11)	78.0% (n = 39)
Group 4	25	5.63	21.8% (n = 12)	78.2% (n = 43)
Group 5	27	9.26	10.9% (n = 6)	89.1% (n = 49)
Group 6	26	7.42	22.6% (n = 14)	77.4% (n = 48)

Participants consisted of both male (19.3%, n = 61) and female (80.7%, n = 255) within age ranged from 18 - 55 years old. Table 2 shows the age and gender distribution across the conditions. The distribution of education level were: less than high school degree (0.3%), high school graduate (8.5%), some college but no degree (9.8%), Bachelor's degree (56.3%), Master's degree (23.7%), and doctoral degree (0.6%). Lastly, the distribution of employment status were: employed full-time (35.1%), employed part-time (11.4%), unemployed looking for work (3.5%), retired (0.3%), student (45.9%), and homemaker (1.6%).

Related to the study, 94.6% participants stated that they have used or purchased skincare products. Among them, 46.4% participants stated that they "often" to "very often" purchase skincare

products, and the monthly spending on skincare products was less than EUR 20 (52.2%), EUR 20 – 40 (31.6%), EUR 41 – 60 (8.5%), EUR 61 – 80 (2.8%), EUR 81 – 100 (2.3%), and more than EUR 100 (0.3%). Participants were also asked about their source of information about skincare products and where they bought the products.

Participation in this study was on a voluntary basis. Due to the absence of a sampling frame, a non-probability method, consisting of convenience sampling and snowball sampling was used. Pre-determined targets were approach via messenger application (WhatsApp, Facebook messenger), social media site (Facebook, Instagram), and online group forum (Facebook group, online beauty forum). The participants were then asked to spread the invitation link to another person who might like to participate in the study.

### **3.3 Experiment design and procedure**

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

##### *Content analysis*

A content analysis of 30 face cream online reviews was conducted (see Appendix B) to observe and obtain key attributes about cosmetic products and to understand: 1) how reviewers write both positive and negative face cream reviews, and 2) how companies respond to the online product reviews. Additionally, an observation was also conducted on the platforms' interface design as a reference when designing the interface of platform manipulation. After that, the result of the content analysis and design observation was used as guideline to build manipulation.

The keywords “face cream reviews” were used in the Google browser to search for face cream online reviews. Then, every search result which directly linked to the face cream review page in

the brand's website was included as a sample of platforms' interface design. A screenshot of the page taken, stored in the database, and the interface design features were noted. Afterwards, the first review displayed on the page was taken as a sample of online product reviews and company response (if applicable). After the sample was sufficient, each review was extracted into several phrases or sentences based on the different key attributes mentioned in the review. Similar extracted sentences then were assigned to a corresponding key attributes category. Data coding was conducted manually.

Key attributes of the online product review were classified into different categories. Key attributes found in the reviews which related to the product were: 1) effect on the skin, 2) economic value, 3) fragrance, 4) texture, 5) ingredients, and 6) packaging. Key attributes found in the reviews which related to the communicator were: 1) personal skin condition, 2) usage habit, 3) usage period and 4) repurchase decision. All ten attributes in the review were used as attributes to create the online product review manipulation (Table 3).

For the company response, attributes categories that were found include: 1) apologizing, 2) thanking, 3) giving tips, 4) corrective action, and 5) company sign. All attributes were used as attributes to create company response manipulation (Table 4).

**Table 3**

Review's key attributes definition and example

<i>Category</i>	<i>Key attribute</i>	<i>Definition</i>	<i>Example</i>
Product	Effect on the skin	The reviewer explains the skin reaction after the face cream has been applied. Effect includes color (e.g. redness, brighter skin), skin texture (e.g. smooth, breakout, flaky), and sensation (e.g. sting, burn, fresh).	"my face felt so dry - not tight, extremely dry", "my chin and nose areas are red", "I'm seeing a difference on my frown lines "
	Economic value	1) Assessment of product economical value compared to product quality and performance. 2) Explanation of price, product size, or promotional.	"worth the \$\$", " I don't use much - goes a long way.", "recently ordered a 2-pack and received today along with 2 small size ones."
	Fragrance	Description of product's fragrance (e.g. fragrance note, strength of fragrance) and how the reviewer perceived it (e.g. like it, disturbing)	"the light scent of grapefruit is relaxing and quickly fades"
	Texture	Description of the cream texture (e.g. thickness, watery vs. creamy) and the skin reaction related to it.	"The product was way too thick, and left a white creamy look on my face", "thick texture spreads nicely and absorbs quickly"
	Ingredients	The reviewer's feedback which specifically related to one or more ingredients in the product.	"ingredients must be super healing ", "rose, apricot kernel and almond oil in it caused me issues"
	Packaging	Feedback related to the package, including packaging material (e.g. plastic, glass, natural, recyclable), shape (e.g. tube, bottle), size, design (e.g. color), functionality (e.g. hygiene, spilling)	"The tube is perfect, I can get every last drop and not worry about spilling, dropping, or contaminating."
Communicator	Personal skin condition	Description of the reviewer's personal skin condition. Including age, skin problem (e.g. Eczema, acne), skin type (e.g. oily skin, dry skin), skin color (e.g. fair skin, dark skin).	"I have very dry, itchy skin all year long", "I have extremely dry skin and eczema, the winter is the worst time for my skin, I am 58 yrs old"
	Usage habit	Description of how the reviewer applies the product regularly	" use this after shower and then normally after workout shower.", "Use it alongside the cleanser and oil"
	Usage period	Description of how long the reviewer has been using the product	"I used to use this moisturizer years ago and consistently since then", "using your face lotion for only 4 days"
	Repurchase decision	The reviewer's decision or willingness to repurchase, recommendation, or overall score for the product	"Lovely products and will continue repurchasing", "Highly recommend"



**Table 4**

Company response's key attributes definition and example

<i>Key attribute</i>	<i>Definition</i>	<i>Example</i>
Apologizing	Apologize for the reviewer's negative experience related to the product. Acknowledging negative feedback from the reviewer about the product.	"We're sorry to hear that you are not fully satisfied with our product"
Thanking	Thanking the reviewer for giving feedback or purchasing product or for supporting the brand.	"We're glad to hear that you are happy", "Thank you for your feedback"
Giving tips	Give some information about the product which is relevant to the negative issues mentioned by the reviewer. In this key attribute usually, company can give explanation or reason for the negative issues mentioned by the reviewer (e.g. wrong product choice, reviewer's personal condition). In case of positive review, company can add information about related product or different version of mentioned product.	"It is now available in 150ml to purchase via our web shop", "It is also important to note that when introducing new products and sciences into your regimen, your skin may require up to a month to adjust. "
Corrective action	Offers a corrective action to fix the problem or give compensation for the negative experience.	"If you'd like to discontinue use, please visit our support page to explore our 365-day return policy."
Company sign	Signature or sign specifying that the response was posted by the company (e.g. company name, manager name, customer service name)	"L'Oreal Team", "General Manager"

*Instruction, structure, language, and realism check*

Manipulation contents and survey were tested to check if the manipulations were realistic, and survey's instruction, structure, and language were clear. In a face-to-face meeting, participants (N = 10) were asked to choose the most realistic design between three interface designs developed for each platform. Next to that, they were asked to check the scenario realism, instructions clarity, structure efficiency, and language clarity. Based on these tests, small modifications were made to improve the structure and flow of the survey, as well as minor refinements relating to wording.

### 3.3.2 Manipulation

#### *Product*

Based on the results of the pre-test, the final stimulus was designed. Six different review pages were developed for this study. All six contained content about the same skincare product and the same brand. A face cream product was chosen as the product category for the experiment. The reason for choosing a face cream product was because face cream is categorized as experience product which is difficult to be evaluated before consumption (Franke *et al.*, 2004). Hence, buying a face cream product requires an extensive information search (e.g. reading consumer reviews online) as there are significant potential risks related to skin health. A fictitious brand name, BLUSH, was selected for the face cream, to rule out possible confounding effects of prior attitudes towards the product on participants' responses.

#### *Platforms*

Two versions of the review pages were developed to manipulate different platforms, the *brand's website* and *personal blog*. Three characteristics were manipulated to differentiate the platform types. First, the interface design (e.g. colour, font style) was noticeably different. The design was developed by consulting the result of design observation during the pre-test. For example, the brand's website colour design was primarily in pink coral colour, which matched the logo colour. The colours of the personal blog were primarily black and white. Secondly, each version had different webpage owner identifiers on the top of the website (brand's name vs personal blog name). The brand's website owner identifier was "BLUSH", while for the personal blog it was "Lynn Beauty Diary". Lastly, the navigational menus also differed in each version. The brand's website had a web shop navigational menu consisting of "shop", "about", "account", and "search".

The page also featured a button to purchase a product and a button to write a review. The personal blog had a typical blog style navigational menu, which consisted of “home”, “categories”, “about”, and “contact”. A “related post” box was also shown next to the review article. Figure 2 shows the brand’s website overall design and Figure 3 shows the personal blog’s overall design.

### *Valence*

This study manipulated the review’s valence to reduce possible bias as suggested by prior researchers (Lee, Rodgers, & Kim, 2009; Qiu, Pang, & Lim, 2012; Tsao *et al.*, 2015). The review valence was manipulated by varying the textual content and the star rating (only on the brand’s website) of the review. To ensure the relevance of the review texts, a content analysis was conducted as a pre-test to identify the key attributes based on 30 real-world online product reviews. Based on the pre-test, 10 key attributes were identified. Both positive and negative product reviews included the same key attributes. The review texts were then further fine-tuned using the key attributes with opposing adjectives to indicate positive and negative reviews. For example, for a positive review “this cream is fantastic” was used to describe the product’s performance, while for a negative review “this cream is terrible” was used. Furthermore, for the brand’s website, the star rating was also used to manipulate the review valence. A visual of one-star rating (out of five stars) was used to signify a negative review, while a five-star rating was used for a positive review. Complete review texts in all conditions are shown in Appendix A.

BLUSH

Shop  
About  
Account  
Search

FREE SHIPPING  
OVER \$50



## BLUSH DEEP MOISTURE CREAM

EUR 21.50 / 2.0oz

Add to cart

African herbs and mushrooms calm the skin when faced with daily stressors like UV rays and environmental pollutants. Pentapeptide calms the stress reaction in sensitive and irritated skin. This deeply moisturizing cream is especially good for dry skin types.

100% vegan ingredients

Recyclable packaging

Non-comedogenic

No animal testing

No dimethicone

No parabens

Share on:



## Review

Write a review

Lynn · 1 week ago



I've been using it for two weeks now, and this cream is fantastic!

I put it on daily before bed and before I put on makeup in the morning. I have a very sensitive skin with dry patches. This cream works wonders by soothing and moisturizing my skin! I love that all of the ingredients are vegan. It works really well for my sensitive skin.

The cream has a thick texture, but it spreads nicely and absorbs quickly. It also has a subtle fragrance, which is very relaxing.

The price is very reasonable. I don't need to use much of the product in one application, so it goes a long way! Next to that, the idea of recyclable packaging also makes me feel good about buying it!

I will repurchase!

### BLUSH response:

Thank you for your review! We're so happy to hear that you are loving BLUSH Deep Moisture Cream! If desired, you can add serum or face oil to your regimen to add extra hydration. You may wish to explore the following options to boost your skin hydration: BLUSH Hydrate + Glow Oil and BLUSH Hydrate + Glow Serum. Please don't hesitate to reach out to our team at [BLUSH.com/contact](https://www.blush.com/contact) with any questions or concerns you may have.

Figure 2. Example of brand's website page (condition 5)

# Lynn Beauty Diary

{ DIY + STYLE + LIFE }

## BLUSH DEEP MOISTURE CREAM | REVIEW

June 10, 2019



Hi everyone, today's post is a review of the BLUSH Deep Moisture Cream. I've been using this moisturizer every single day for two weeks, so I'm finally ready to give a review! To begin below is some information from the brand's website:

### BLUSH DEEP MOISTURE CREAM DETAILS

**PRICE** : EUR 21.50 for 2.0 oz

#### DESCRIPTION :

African herbs and mushrooms calm the skin when faced with daily stressors like UV rays and environmental pollutants. Pentapeptide calms the stress reaction in sensitive and irritated skin. This deeply moisturizing cream is especially good for dry skin types.

#### CLAIM :

100% vegan ingredients  
Recyclable packaging  
Non-comedogenic  
No animal testing  
No dimethicone  
No parabens  
No phthalates

### MY EXPERIENCE

To give some background on my skin type, I have a very sensitive skin with dry patches. This cream works wonders by soothing and moisturizing my skin! I love that all of the ingredients are vegan. It works really well for my sensitive skin.

The cream has a thick texture, but, it spreads nicely and absorbs quickly. It also has a subtle fragrance, which is very relaxing.

I also think that the price is very reasonable. I don't need to use much of the product in one application, so it goes a long way! Next to that, the idea of recyclable packaging also makes me feel good about buying it!

To conclude, I think this cream is fantastic, and I will recommend it!

Search in this site...

Search by algolia



Hi it's me, Lynn!

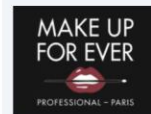
I was born and brought up in Paris, France.  
After highschool,  
I went to college in the US and the road began.  
I love beauty products of every kind!  
Here I shall share it all with you!



### RELATED POSTS



bareMinerals  
Cosmetics Review  
2019: bare And  
Beautiful



Make Up For Ever  
Flash Palette  
Review: You'll  
Want To Use It...



7 Secrets To  
Achieving  
Celebrity  
Eyebrows



Figure 3. Example of personal blog page (condition 1)

### *Corporate response*

A version of accommodative corporate response to the negative review and a version of accommodative corporate response to the positive review were created with similar tone and key attributes. To ensure the relevance of the review texts, a content analysis was conducted as a pre-test to identify the key attributes based on 30 real-world online product reviews. Based on the pre-test, 5 key attributes were identified. The review texts were then further fine-tuned using the key attributes. Figure 4 shows the manipulation of corporate response for positive and negative review.

#### *Company response for positive review*

**BLUSH response:**

Thank you for your review! We're so happy to hear that you are loving BLUSH Deep Moisture Cream! If desired, you can add serum or face oil to your regimen to add extra hydration. You may wish to explore the following options to boost your skin hydration: BLUSH Hydrate + Glow Oil and BLUSH Hydrate + Glow Serum. Please don't hesitate to reach out to our team at [BLUSH.com/contact](https://blush.com/contact) with any questions or concerns you may have.

#### *Company response for negative review*

**BLUSH response:**

We're so sorry to hear that your skin was not compatible with BLUSH Deep Moisture Cream. All of our BLUSH products are made using 100% vegan ingredients and we do not add any extra fragrances. For the product build up issue, you may be using too much of the product as you only need a small (pea-sized) amount of the product for the entire face.

Please note that this product offers surface hydration that acts as a direct topical supplement that keeps the outer layer of the skin protected and well-hydrated. Skin that is dehydrated will definitely benefit from a moisturizer, but a moisturizer will not fix the cause of the dehydration. If you have a very dry and dehydrated skin concerns we recommend to pair this product with BLUSH Hydrate + Glow Oil and BLUSH Hydrate + Glow Serum.

Please don't hesitate to reach out to our team via [BLUSH.com/contact](https://blush.com/contact) with any further questions or concerns you may have. If you'd like to discontinue use, please visit [BLUSH.com/terms](https://blush.com/terms) to explore our 365-day return policy.

**Figure 4.** The manipulation of corporate response for positive and negative review

### **3.3.3 Procedure**

This research was conducted by means of an online experiment, Qualtrics was used to display the manipulated page and set up the questionnaire. The participants were recruited through different communication channels. An anonymous online link was given to each participant via messaging application or email. After clicking the online link, participants entered a welcome page, where a short explanation about the study was given, and participants were asked for their consent to participate in the study. After the introduction, participants were asked to answer some demographic questions, such as age, sex, education, employment status, and some questions about skincare product usage. Next, each participant was randomly assigned to one of the six conditions.

The participants were equally and randomly divided over the six different questionnaires. Six conditions were developed with three different factors: the platform, the valence, and the presence of corporate response. In every condition, participants were asked to imagine that they were looking for information about a face cream product. On the next page, the participants were shown a manipulated web page. The participants then read the reviews about BLUSH face cream at their own pace. A timer was included while reading the review as an attention check.

After the page with online reviews, a page with several manipulation check questions followed. Participants were then asked to answer the questions related to the page displayed. Next, participants were requested to answer a series of questions to measure participants product attribution, communicator attribution, attitude towards brand, attitude towards product, and purchase intention. When the respondents completed the survey, they were thanked for their participation— all data were directly stored in the database.

### 3.4 Measurement

This section discusses measurements regarding validity, reliability, and manipulation check. Factor analysis was conducted in order to identify components for covariates and dependent variables using principle component analysis (PCA). Within the process, an orthogonal rotation (Varimax) for 19 items was chosen. As a result, KMO (Kaiser-Meyer Olkin) indicated that the sample was factorable (.93). The analysis categorized 19 items into 3 components (Table 5) which explaining each group was not related to others. The following subsection provides a detailed discussion about constructs of measurements with Cronbach's Alpha.

**Table 5**

Results of the factor analysis with varimax rotation of the items included in the online survey instrument.

		<i>Factor</i>		
<i>Constructs</i>	<i>Items</i>	<i>1</i>	<i>2</i>	<i>3</i>
Purchase Intention	I will likely buy BLUSH face cream	.91		
	I will probably purchase BLUSH face cream	.90		
	There is a good chance that I will buy BLUSH face cream	.90		
	I will certainly purchase BLUSH face cream	.89		
Attitude Toward the Product	I like BLUSH face cream	.89		
	BLUSH face cream is a satisfactory product	.89		
	BLUSH face cream is a good product	.89		
	BLUSH face cream is attractive	.88		
Attitude Toward the Brand	BLUSH is a positive brand	.87		
	BLUSH is a good brand	.87		
	BLUSH is a favorable brand	.84		
	I like BLUSH brand	.84		
Communicator Attribution	The reviewer is the type of person who always says things like this about a product		.83	
	The reviewer does not have the expertise to evaluate the product properly		.82	
	The reviewer does not know enough about face cream		.79	
	The reviewer has a personal reason to review the product in this manner		.77	
Product Attribution	The review reflects the face cream's quality			.84
	The review reflects the face cream's performance			.83
	The review informs me about the face cream			.78

*Extraction Method: Principal Component Analysis.*

*Rotation Method: Varimax with Kaiser Normalization.*



### 3.4.1 Constructs

#### Product attribution

*Consumers' causal attribution* construct was measured using the items developed by Laczniaak *et al.* (2001) with a few adjustments to fit face cream as the product category in this study. Both *product attribution* and *communicator attribution* were measured on a seven-point Likert scale, with 1 being 'strongly disagree', and 7 being 'strongly agree'. The following header was used in measuring all causal attributions: "Please indicate how strongly you agree or disagree with all the following statements". Product attributions were measured with three items, specifically: "The review reflects the face cream's quality", "The review reflects the face cream's performance", and "The review informs me about the face cream". Cronbach's alpha of the three items was high ( $\alpha$  .84).

#### Communicator attribution

Communicator attribution was measured with four items. The following specific items were used to measure communicator attribution: "The review informs me about the person who wrote it (the reviewer)", "The reviewer does not know enough about face cream", "The reviewer does not have the expertise to evaluate the product properly", "The reviewer is the type of person who always says things like this about a product", and "The reviewer has a personal reason to review the product in this manner". After the reliability analysis, the data from the first item "The review informs me about the person who wrote it (the reviewer)" was excluded. The reason for removal was that it led to an improvement in Cronbach's alpha (.82 to .87), and the "Corrected Item-Total Correlation" value was low (.36) for this item.

### **Attitude towards the product**

Relating to *product evaluations*, this study assessed three variables: attitude towards the product, attitude towards the brand and purchase intention. All of the constructs were estimated on a seven-point Likert scale with 1 being 'strongly disagree', and 7 being 'strongly agree'. Attitude towards the product (Lepkowska-White, Brashear, & Weinberger, 2003) was measured with 4 items ( $\alpha = .95$ ). The following header was used to measure the attitude towards the product: "Please indicate how strongly you agree or disagree with all the following statements." The following specific items were used to measure the attitude towards the product: "BLUSH face cream is attractive", "BLUSH face cream is a good product", "I like BLUSH face cream", and "BLUSH face cream is a satisfactory product".

### **Attitude towards the brand**

Attitude towards the brand was measured with four items, which were taken from prior research (Holbrook & Batra, 1987). The following header was used to measure attitude towards the brand: "Please indicate how strongly you agree or disagree with all the following statements." The following specific items were used to measure the attitude towards the brand: "I like BLUSH brand", "BLUSH is a positive brand", "BLUSH is a good brand", and "BLUSH is a favourable brand". Cronbach's alpha was high ( $\alpha = .94$ ).

## Purchase intention

Lastly, purchase intention (Chandran & Morwitz, 2005) was measured with four items on a seven-point Likert scale with 1 being 'strongly disagree', and 7 being 'strongly agree'. The following header was used to measure attitude towards the brand: "Please indicate how strongly you agree or disagree with all the following statements." The specific items used were "I will likely buy BLUSH face cream", "I will probably purchase BLUSH face cream", "I will certainly purchase BLUSH face cream", and "There is a good chance that I will buy BLUSH face cream". Reliability analysis showed that the items have relatively high internal consistency ( $\alpha = .97$ ).

**Table 6**

Reliability scores and mean and standard deviation values for the different constructs of the study.

<i>Constructs</i>	$\alpha$	<i>n</i>
Product Attribution	.84	3
Communicator Attribution	.87	4
Attitude Towards Product	.95	4
Attitude Towards Brand	.94	4
Purchase Intention	.97	4

### 3.4.2 Manipulation check

The manipulation-check questions were used to check whether the participants understood the manipulations. All of the questions were asked after the participants had seen the manipulated website page and had read the manipulated online product review.

Firstly, the participants were asked to identify any online product review. The question asked in the questionnaire was: "Did you see any review written for BLUSH face cream?" The answer

choices were a) Yes and b) No. Of 322 participants, 6 participants stated that they did not see any review. These participants were excluded from the study; hence, the total number of participants was 316.

Secondly, the participants were asked to identify the website platform where the review was posted (a brand's website page or a personal blog page). The question asked in the questionnaire was: "The page I saw was...". The answer choices were a) a brand's website page, b) a personal blog page, c) none of the above, and d) not sure. Of the participants who were presented the personal blog, 96.8% ( $n = 91$ ) answered correctly. Of the participants who were presented the brand's website, 92.3% ( $n = 205$ ) answered correctly.

Next, the participants were asked to identify the valence of the review. The question asked in the questionnaire was: "The review written for BLUSH face cream was...". The answer choices were a) positive review, b) negative review c) neutral or mixed review d) not sure. Of the participants who were presented with positive review, 93.0% ( $n = 147$ ) answered correctly. Of the participants who were presented with negative review, 92.4% ( $n = 146$ ) answered correctly.

Finally, the participants were asked to identify any corporate response. The question asked in the questionnaire was: "Did you see any corporate response in the review? a) Yes and b) No.

When participants answered "Yes", the follow-up question was asked: "Please indicate which part is the corporate review?". Underneath the question, the manipulation page was shown with remarks in three different parts of the page. The participants were asked to indicate which part was the corporate response. Of the participants who were presented the review with corporate response, 91.5% ( $n = 107$ ) answered correctly. All of them (100.0%,  $n = 107$ ) indicated correctly which part of the website page is the corporate response.

## 4. RESULT

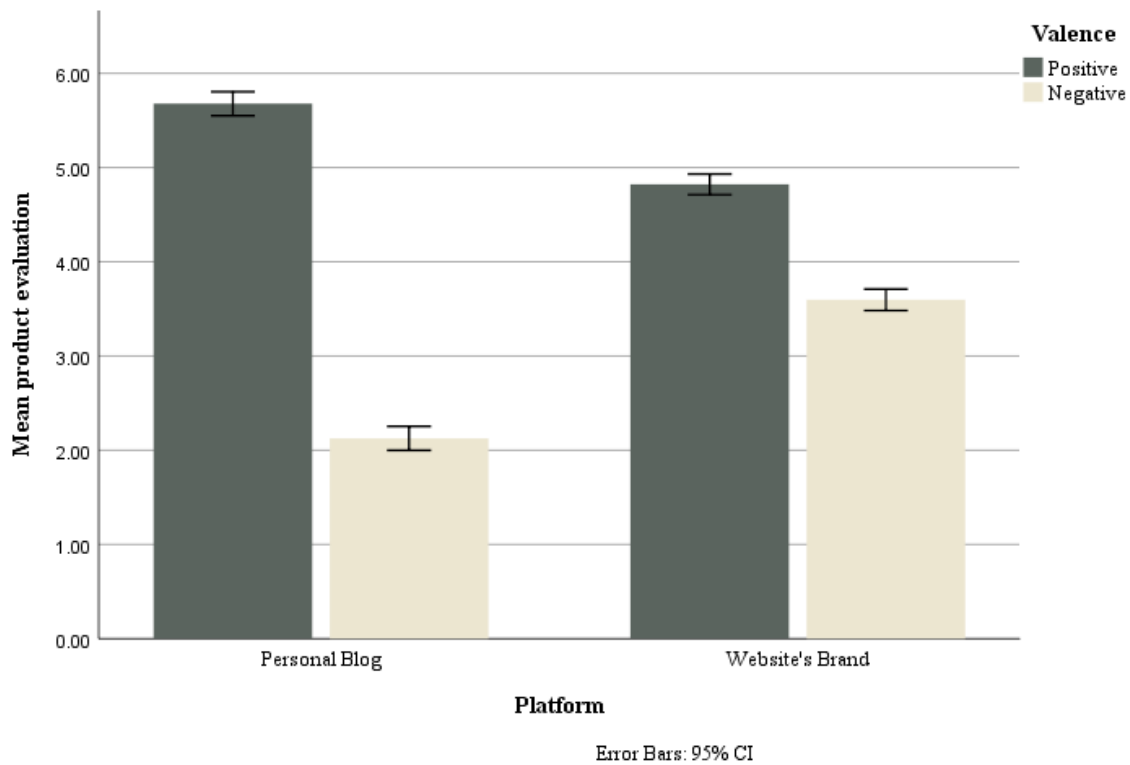
In this chapter, the results of the hypotheses formulated in Chapter 2 will be given. Before further analysis, the assumption of normality of the distribution was tested for all variables. All of the dependent variables proved to have a normal distribution.

### **Main effect and interaction effect between review platform and review valence on product evaluation**

H<sub>1</sub> posits that the impact of online product reviews on consumer's product evaluation is more pronounced when the reviews are posted on a personal blog compared with a brand's website. An independent-samples *t*-test was run to determine if there were differences in impact on consumer's product evaluation between reviews posted on a personal blog and a brand's website. Since the study tested positive and negative reviews, two tests were done separately using select cases for each valence. For positive reviews, this study has found that reviews posted in a personal blog ( $M = 5.68$ ,  $SD = .46$ ) have a higher influence on consumer's product evaluation compared to brand's website ( $M = 4.82$ ,  $SD = .56$ ), a statistically significant difference,  $M = .86$ , 95% *CI* [.68, 1.03],  $t(156) = 9.54$ ,  $p < .001$ . For negative reviews, this study has found that reviews posted in a personal blog ( $M = 2.12$ ,  $SD = .40$ ) have a significant higher influence on consumer's product evaluation, compared to brand's website ( $M = 3.59$ ,  $SD = .62$ ), a statistically significant difference,  $M = -1.47$ , 95% *CI* [-1.68, -1.26],  $t(156) = -14.14$ ,  $p < .001$ .

A two-way ANOVA was also conducted to examine interaction between review platform and review valence and effect on the product evaluation. The result shown there was a statistically significant interaction between review platform and review valence,  $F(1, 312) = 288.29$ ,  $p < .001$ ,

partial  $\eta^2 = .48$ . Therefore, an analysis of simple main effects for company response was performed with statistical significance receiving a Bonferroni adjustment and being accepted at the  $p < .025$  level. There was a statistically significant difference in mean ‘product evaluation’ score between personal blog and brand’s website,  $F(1, 312) = 20.08, p < .001$ , partial  $\eta^2 = .06$ . Therefore,  $H_1$  was supported.



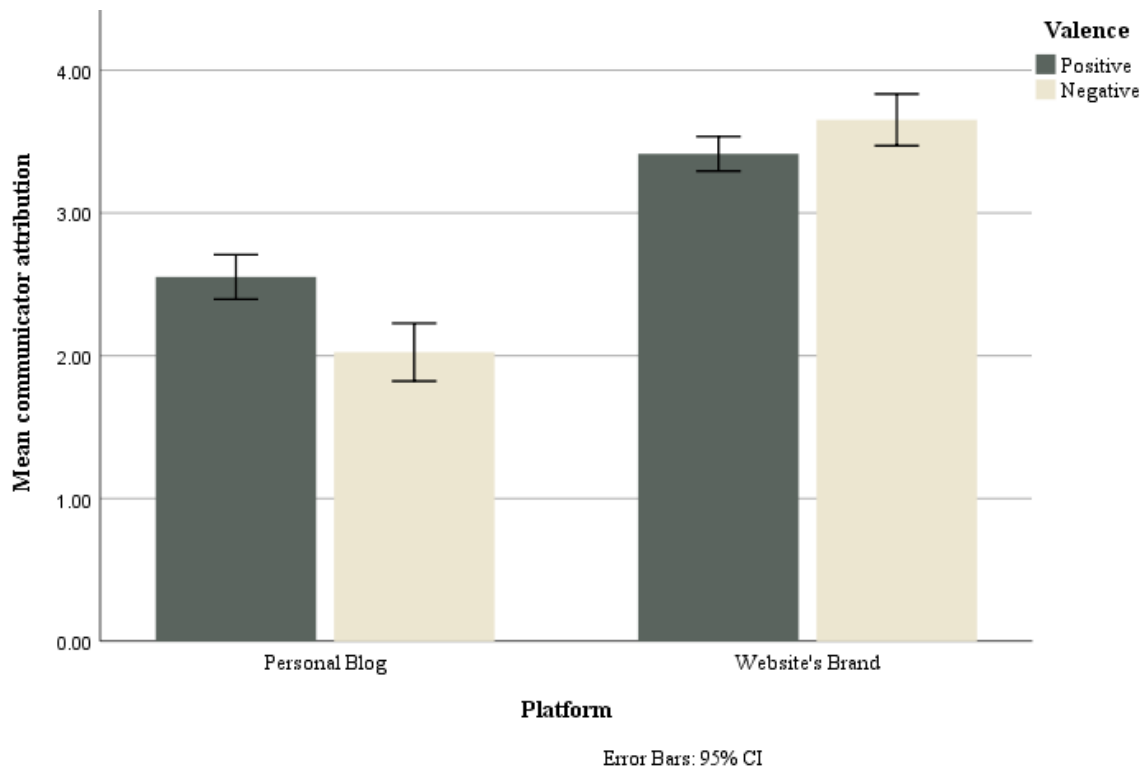
**Figure 5.** Interaction effect of review platform and review valence on consumers’ product evaluation

### **Main effect and interaction effect between review platform and valence on causal attribution**

$H_{2a}$  posits that consumers will be more likely to attribute positive online product reviews posted on a brand’s website towards the communicator attribution compared to positive online product reviews posted on a personal blog. An independent-samples  $t$ -test was run to determine if there was a difference of communicator attribution between positive review posted on a brand’s website

and a personal blog. The test result showed that a positive online product review posted on a brand's website ( $M = 3.41$ ,  $SD = .62$ ) has a higher attribution to the communicator compared to a positive online product review posted on a personal blog ( $M = 2.55$ ,  $SD = .57$ ), a statistically significant difference,  $M = .86$ , 95%  $CI [.66, 1.06]$ ,  $t(156) = 8.45$ ,  $p < .001$ . Therefore,  $H_{2a}$  is supported.

A two-way ANOVA was also conducted to examine the interaction between review platform and review valence, and the effect on communicator attribution. There was a statistically significant interaction between review platform and review valence,  $F(1, 312) = 168.19$ ,  $p < .001$ , partial  $\eta^2 = .35$ .

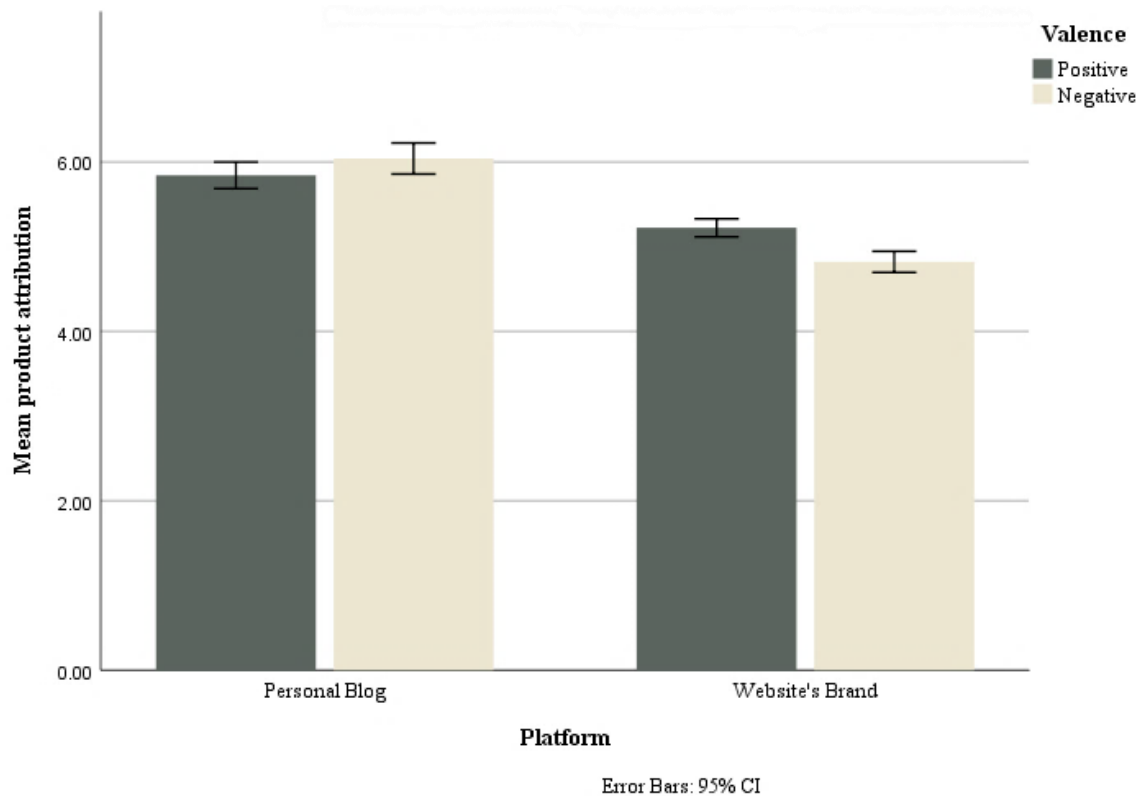


**Figure 6.** Interaction effect of review platform and review valence on communicator attribution

$H_{2b}$  posits that consumers will attribute negative online product reviews to the product, regardless of the platform where the reviews are posted. An independent-samples  $t$ -test was run to determine

whether there was no difference of product attribution between a negative review posted on a brand's website and a personal blog. However, the independent t-test showed that there was a significant difference ( $M = -1.22$ , 95%  $CI [-1.46, -0.98]$ ,  $t(156) = -10.19$ ,  $p < .001$ ) of brand's website ( $M = 4.82$ ,  $SD = .69$ ) and personal blog ( $M = 6.04$ ,  $SD = .58$ ) attribution to the product. Therefore,  $H_{2b}$  was rejected.

A two-way ANOVA was also conducted to examine the interaction between review platform and review valence, and the effect on communicator attribution. There was a statistically significant interaction between review platform and review valence,  $F(1, 312) = 15.68$ ,  $p < .001$ , partial  $\eta^2 = .05$ .



**Figure 7.** Interaction effect of review platform and review valence on product attribution

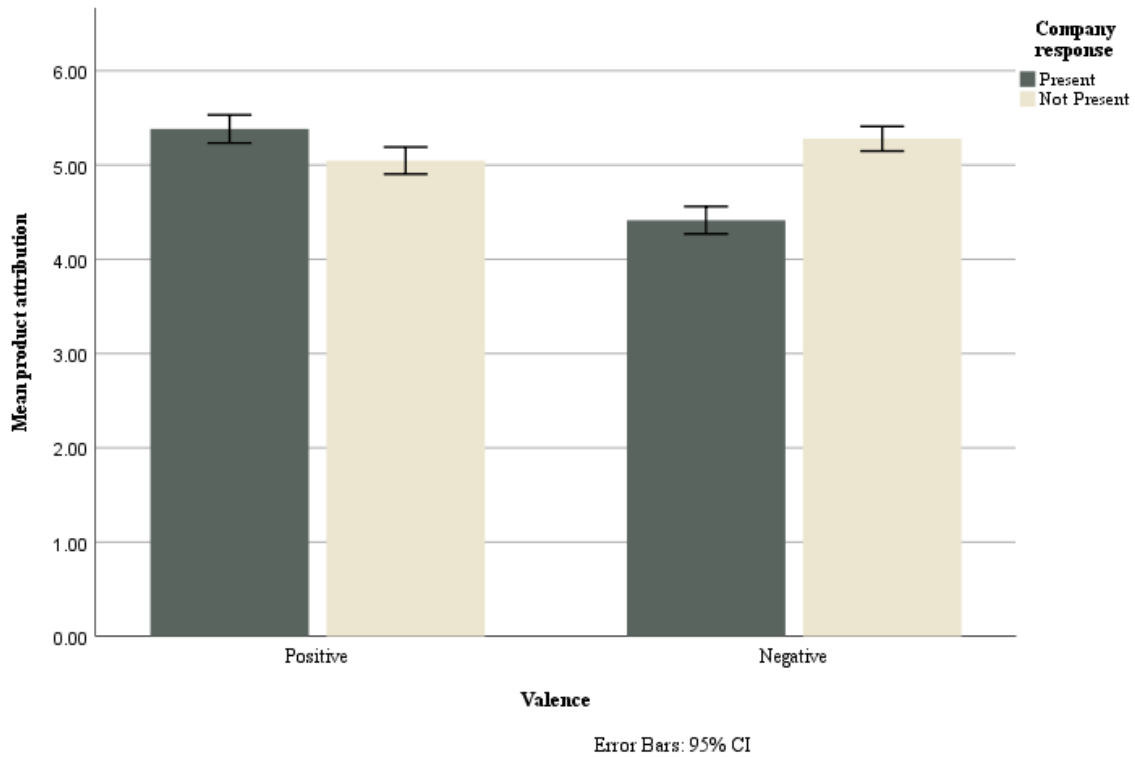


### **Interaction effect between valence and company response**

H<sub>3a</sub> posits that consumers will be more likely to attribute the positive online product reviews (posted on a brand's website) with company response to the product, compared to the positive online product reviews (posted on a brand's website) without company response. A two-way ANOVA was conducted to examine the effects of valence and company response on product attribution. Residual analysis was performed to test the assumptions of the two-way ANOVA. Outliers were assessed by inspection of a boxplot, normality was assessed using Shapiro-Wilk's normality test for each cell of the design and homogeneity of variances was assessed by Levene's test. There were no outliers, residuals were normally distributed and there was homogeneity of variances ( $p = .220$ ).

There was a statistically significant interaction between company response and valence to the product attribution,  $F(1, 218) = 70.12, p < .001$ , partial  $\eta^2 = .24$ . Therefore, an analysis of simple main effects for company response was performed with statistical significance receiving a Bonferroni adjustment and being accepted at the  $p < .025$  level. There was a statistically significant difference in mean 'product attribution' score between positive review with and without company response,  $F(1, 218) = 10.39, p = .001$ , partial  $\eta^2 = .05$ .

Pairwise comparison was run to test the simple main effect with reported 95% confidence intervals and p-values Bonferroni-adjusted within each simple main effect. For positive review, mean 'product attribution' score for review with company response was 5.38 ( $SD = .55$ ) and 5.05 ( $SD = .50$ ) for review without company response. Mean 'product attribution' score was .34 points, 95%  $CI [.13, .54]$  higher for positive review with company response than without company response,  $p = .001$ . Therefore, H<sub>3a</sub> is supported.



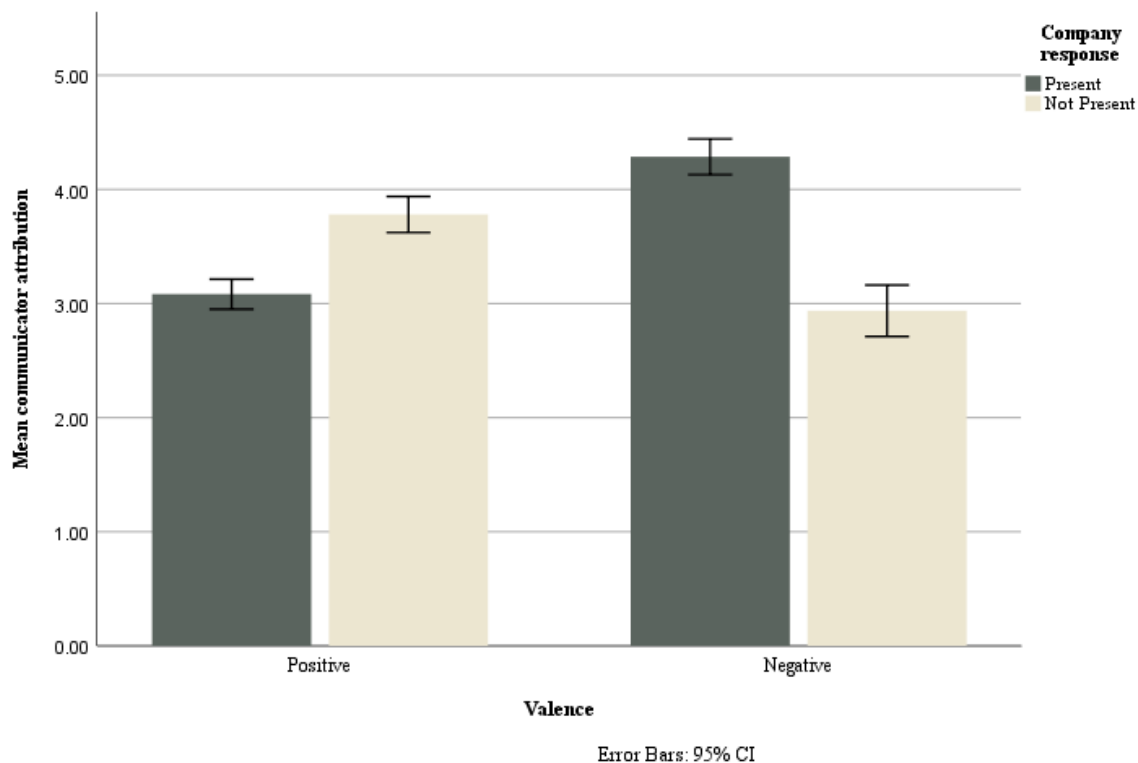
**Figure 8.** Interaction effect of review valence and company response on product attribution

H<sub>3b</sub> posits that consumers will be more likely to attribute the negative online product reviews (posted on a brand's website) with company response to the communicator, compared to the negative online product reviews (posted on a brand's website) without company response. A two-way ANOVA was conducted to examine the effects of valence and company response on communicator attribution. The assumption of homogeneity of variances was violated, as assessed by Levene's test for equality of variances,  $p < .001$ . The two-way ANOVA was still run as the group sample sizes are approximately equal and large. There is normality and the ratio of the largest group variance to the smallest group variance is less than three (Jaccard, 1998).

There was a statistically significant interaction between company response and valence and effect on communicator attribution,  $F(1, 218) = 142.58, p < .001$ , partial  $\eta^2 = .40$ . Therefore, an analysis

of simple main effects for company response was performed with statistical significance receiving a Bonferroni adjustment and being accepted at the  $p < .025$  level. There was a statistically significant difference in mean ‘communicator attribution’ score between negative review with and without company response,  $F(1, 218) = 130.87, p < .001$ , partial  $\eta^2 = .38$ .

Pairwise comparison was run to test the simple main effect with reported 95% confidence intervals and  $p$ -values Bonferroni-adjusted within each simple main effect. For negative review, mean ‘communicator attribution’ score for review with company response was 4.29 ( $SD = .62$ ) and 2.94 ( $SD = .83$ ) for review without company response. Mean ‘communicator attribution’ score was 1.35 points, 95%  $CI [1.12, 1.58]$  higher for negative review with company response than without company response,  $p < .001$ . Therefore,  $H_{3b}$  is supported.



**Figure 9.** Interaction effect of review valence and company response on communicator attribution

## Regression analysis

H<sub>4a</sub> posits that product attribution of positive reviews will generate a greater positive influence on product evaluation compared to the communicator attribution. A linear regression was run to understand the effect of product attribution and communicator attribution on product evaluation. There was independence of residuals, as assessed by a Durbin-Watson statistic of 1.82. There was homoscedasticity, as assessed by visual inspection of a plot of standardized residuals versus standardized predicted values. Residuals were normally distributed as assessed by visual inspection of a normal probability plot. Table 7 shows the overall result that will be explained further in the following paragraphs.

**Table 7**

Regression analysis predicting consumer's product evaluation in positive review valence

<i>Predictor</i>	<i>B</i>	$\beta$	<i>t-value</i>	<i>Sig.</i>
Product attribution	.37	.35	4.82	.000
Communicator attribution	-.31	-.34	-4.63	.000

*Dependent Variable: Product evaluation (Adj. R<sup>2</sup> = .34)*

Table 7 shows that both product attribution and communication attribution have significant influence on product evaluation. For positive review, both product attribution and communication attribution significantly predict consumers' product evaluation ( $F(2,155) = 41.46$ ,  $Adj. R^2 = .34$ ,  $p < .001$ ). Product attribution ( $\beta = .35$ ) had a higher positive relationship with product evaluation as compared to communicator attribution ( $\beta = -.31$ ). Additionally, product attribution ( $t(155) = 4.82$ ,  $p < .001$ ) also shows a greater positive contribution in predicting product evaluation as compared to communicator attribution ( $t(155) = -4.63$ ,  $p < .001$ ). Therefore, H<sub>4a</sub> is supported.

H<sub>4b</sub> posits that product attribution of negative reviews will generate a greater negative influence on product evaluation compared to the communicator attribution. A linear regression was run to

understand the effect of product attribution and communicator attribution on product evaluation. There was independence of residuals, as assessed by a Durbin-Watson statistic of 2.15. Table 8 shows the overall result that will be explained further in the following paragraphs.

**Table 8**

Regression analysis predicting consumer's product evaluation in negative review valence

<i>Predictor</i>	<i>B</i>	$\beta$	<i>t-value</i>	<i>Sig.</i>
(Constant)	3.937		9.20	.000
Product attribution	-.39	-.38	-6.31	.000
Communicator attribution	.39	.53	8.71	.000

*Dependent Variable: Product evaluation (Adj. R<sup>2</sup> = .68)*

Table 8 shows that both product attribution and communication attribution have significant influence on product evaluation. For negative review, both product attribution and communication attribution significantly predict consumers' product evaluation ( $F(2,155) = 171.29$ ,  $Adj. R^2 = .68$ ,  $p < .001$ ). Product attribution ( $\beta = -.387$ ) has a higher negative relationship with product evaluation as compared to communicator attribution ( $\beta = .391$ ). Additionally, product attribution ( $t(155) = -6.31$ ,  $p < .001$ ) also shows a greater negative contribution in predicting product evaluation as compared to communicator attribution ( $t(155) = 8.71$ ,  $p < .001$ ). Therefore, H<sub>4b</sub> is supported.

**Table 9**

Summary of supported and not supported hypotheses

<i>Hypothesis</i>	<i>Result</i>
<b>H<sub>1</sub>:</b> The impact of online product reviews on consumer's product evaluation is more pronounced when the reviews are posted on a personal blog compared with a brand's website.	Supported
<b>H<sub>2a</sub>:</b> Consumers will be more likely to attribute positive online product reviews posted on a brand's website towards the communicator attribution compared to positive online product reviews posted on a personal blog.	Supported
<b>H<sub>2b</sub>:</b> Consumers will attribute negative online product reviews to the product attribution regardless of the platform where the reviews are posted.	Rejected

<b>H<sub>3a</sub>:</b> Consumers will be more likely to attribute the positive online product reviews (posted on a brand's website) with company response to the product, compared to the positive online product reviews (posted on a brand's website) without company response.	Supported
<b>H<sub>3b</sub>:</b> Consumers will be more likely attribute the negative online product reviews (posted on a brand's website) with company response to the communicator, compared to the negative online product reviews (posted on a brand's website) without company response.	Supported
<b>H<sub>4a</sub>:</b> Product attribution of positive reviews will generate a greater positive influence on product evaluation compared to the communicator attribution.	Supported
<b>H<sub>4b</sub>:</b> Product attribution of negative reviews will generate a greater negative influence on product evaluation compared to the communicator attribution.	Supported

---

## Mediation analysis

### *Review valence – causal attribution – product evaluation*

Multivariate general linear analysis was used to investigate if causal attribution mediates the effect of review valence on product evaluation, given that there are two dependent (attribution) variables. Result indicates that review valence is a significant predictor of product attribution ( $\beta = -.293$ ,  $SE = .08$ ,  $p < .001$ ), but not a significant predictor of communicator attribution ( $\beta = .10$ ,  $SE = .11$ ,  $p = .338$ ). Because the assumption was not fulfilled, the mediation analysis was not carried further. Therefore, the mediation effect of causal attribution on the relationship between review valence and product evaluation is rejected.

### *Company response – causal attribution – product evaluation*

Multivariate general linear analysis was used to investigate if causal attribution mediates the effect of company response on product evaluation, given that there are two dependent (attribution)

variables. Since the study tested positive and negative reviews, two tests were done separately using select cases for each valence. For positive reviews, the result indicates that company response is not a significant predictor for both product attribution ( $\beta = .08$ ,  $SE = .11$ ,  $p = .481$ ) and communicator attribution ( $\beta = .07$ ,  $SE = .12$ ,  $p = .588$ ). In contrast, for negative reviews, the result indicates that company response is a significant predictor for both product attribution ( $\beta = 1.19$ ,  $SE = .10$ ,  $p < .001$ ) and communicator attribution ( $\beta = -1.74$ ,  $SE = .13$ ,  $p < .001$ ). Furthermore, the previous chapter has also shown that both product attribution and communication attribution are significant predictors for product evaluation (see Table 8).

The next step in the mediation analysis is to determine whether the company response significantly affects the product evaluation. Regression results indicate that company response significantly influences product evaluation ( $R^2 = .58$ ),  $F(1, 156) = 218.77$ ,  $p < .001$ . The results indicate a statistically significant change in  $R^2$  after the attribution variables were added to the regression equation in which the company response served as independent variables and product evaluation as the dependent variable ( $R^2 = .72$ ),  $F(3, 154) = 134.03$ ,  $p < .001$ . However, company response is still a significant predictor of product evaluation after controlling the mediator, product attribution and communicator attribution,  $\beta = -.52$ ,  $SE = .12$ ,  $p < .001$ , suggests a partial mediation.

The indirect effect was tested using a percentile bootstrap estimation approach with 10000 samples (Shrout & Bolger, 2002), implemented with the PROCESS macro Version 3 (Hayes, 2017). These results indicate the indirect coefficient was significant for both product attribution ( $\beta = -.33$ ,  $SE = .08$ , 95%  $CI [-.49, -.19]$ ) and communicator attribution ( $\beta = -.49$ ,  $SE = .10$ , 95%  $CI [-.68, -.30]$ ). Company response was associated with product evaluation that were approximately -.33 points higher as mediated by product attribution and -.49 points higher as mediated by communicator attribution. These results appear to suggest that both brand and communicator attributions have a

partial mediating effect on the relation between company response and product evaluations for negative review valence.

### **Additional analysis: Regression analysis**

An additional linear regression analysis was conducted as it is interesting to see if there is a significant effect of manipulation time exposure on product evaluation. 'Manipulation time exposure' refers to the total amount of time spent by participants observing manipulated website page. Since the study tested positive and negative reviews, two tests were done separately using select cases for each valence. Result shows that manipulation time exposure has significant influence on product evaluation. For both positive reviews ( $F(1, 156) = 5.76$ ,  $Adj. R^2 = .03$ ,  $p = .018$ ) and negative review ( $F(1, 156) = 5.64$ ,  $Adj. R^2 = .03$ ,  $p = .019$ ), product evaluation significantly predicted by manipulation time exposure.



## 5. DISCUSSION, LIMITATIONS AND IMPLICATIONS

This chapter provides a general discussion of the findings of the study. It examines the limitations of the study and possibilities for further research are investigated. The chapter ends with the implications.

### 5.1 General discussion

This study draws on prior conceptual evidence to develop and test hypotheses relating to the attributional responses of consumers when encountering online product reviews. The results have shown a significant influence of review platform, review valence, and consumer's causal attribution on consumer's product evaluation. In general, the results support the hypotheses and provide several key contributions.

Firstly, this study has found that **different platform types where online product reviews are posted have different impact strength on consumer's product evaluation**. The results show a significant difference in impact between a personal blog and brand's website on consumer's product evaluation, which confirms H<sub>1</sub>. For both positive and negative reviews, an independent platform has a more pronounced impact on consumer's product evaluation than a corporate platform. This result means that consumers are more persuaded by reviews posted on an independent platform. Thus, there are some characteristics in the independent platform which lead to more believable and persuasive reviews. The result is supporting previous studies stating that consumers perceive independent platforms as more objective, trustworthy and credible compared to corporate platforms (Xue & Phelps, 2004, Wiener & Mowen, 1986). Consumers perceive the reviews in a corporate platform as a biased representation of the product as it often associated with

its selling goals (Senecal & Nantel, 2004; Xue & Phelps, 2004). Hence, reviews posted in an independent platform affect consumers' product evaluation more than reviews posted in a corporate platform.

Secondly, this study found that **review platforms also impact consumers' causal attribution.**

The results show a significant difference between a brand's website and personal blog causal attribution in both tests. As described previously, the results reject H<sub>2b</sub>. This study has found that reviews posted on an independent platform are more likely attributed to the product, while reviews posted on a corporate platform are mostly attributed to the communicator. That means the negativity effect did not overrule the attribution process.

Contrary to previous studies (Herr *et al.*, 1991; Rozin & Royzman, 2001), this study has found that consumers still need to consider other alternative cues for causal attribution of the reviewers' intention regardless of the review valence. A possible logical explanation is because purchasing experience goods (such as beauty products) online involves a complex decision-making process. For example, online shoppers spend hours reading reviews before making a purchase decision (Freedman, 2008). That means online consumers tend to do a meticulous research to evaluate a product, instead of making a quick subconscious decision. This result may also be used to augment past findings (Herr *et al.*, 1991) that suggested receivers may not always find negative reviews to be diagnostic or useful.

Next, this study has found that **company response has a significant role in consumers' causal attribution.** The results suggest that there is a significant interaction effect between company response and review valence for both hypotheses. For positive reviews, product attribution is significantly higher when company response is present. This result is important, as previously was suggested that consumers tend to attribute reviews posted in corporate platforms to the

communicator. Consistent with previous study (Lee, 2005), the results mean that the presence of company response increase consumers' trust in the brand's website. Therefore, consumers ultimately trust the authenticity of the review itself.

For negative reviews, communicator attribution was significantly higher when company response is present. The clustered bar (Figure 3 and 4) also shows a significant difference between reviews with company response and without company response, especially in case of negative reviews. That means when the company response is present in the negative review, consumers tend to attribute the reviewer's motivation to the communicator, which allows consumers to disassociate the message from the product. This result is consistent with the literature which stated that a company response to negative reviews might help to frame the review as a low consensus piece of information (Lee & Song, 2010). Thus, when the company is able to respond to a negative online product review in the accommodative manner, consumers may compensate the negative evaluation of the product and more likely attribute the negative evaluation to the communicator (Lee & Song, 2010).

Finally, this study has found that **product attribution generates a significant higher influence on product evaluation compared to communicator attribution**. The test results show a significance relationship between causal attribution and product evaluation. Moreover, the results also show that product attribution has a higher effect on product evaluation which is directly proportional to review valence, compared with communicator attribution which has the opposite effect of review valence. These results are consistent with previous studies stated that the more consumers attribute online product reviews to the product's actual performance (or product attribution), the more consumers will have confidence in the accuracy of the review, and the more influential the review is (Mizerski, 1982; Sen & Lerman, 2007). Furthermore, in line with the

discounting principle in attribution theory (Kelley 1973), when the consumers suspect that the online product review is caused by non-stimulus factors (such as communicator attribution), the more consumers will discount the product's actual performance. Hence, consumers will be less persuaded by the review which is attributed to the communicator, compared to the review which is attributed to the product.

## **5.2 Limitation and future research direction**

This study contains some limitations that may influence the outcomes and the results generalizations. This section will mention and explain the limitations. Furthermore, relevant ideas for future research will also be mentioned.

Firstly, for the efficiency of data collection process, the data of this study was gathered via online media. However, with this method it was difficult to control whether participants were focused and observed the manipulation thoroughly or not. It may take more time but gathering data in person is suggested for future research. It will be easier to control the experiment and easier for participants to ask relevant questions about the questionnaires or the experiment in general. Regarding to manipulations, some participants mentioned that the page was displayed too small in their device. Even though there was an attempt to create mobile version manipulation and size up the text to tackle the issue, some participants still mentioned the text size in their device. A possible reason is that a still image is not responsive to adjust to screen size. Hence creating a manipulation website instead of a still image is suggested for future research, to be better compatible with participants' screen size.

Secondly, this study uses different page colours and layout for personal blog and brand's website manipulations. The reason for this decision is to achieve a realistic manipulation, reflecting the observation in the pre-test. However, indeed there is a possibility that page colours and layout might affect the study's results. Previous studies reported that colour appeal and layout design impacts attitude toward the website, and thus influenced consumers' purchase intention (Hsin Chang & Wen Chen, 2008; Wu, Lee, Fu, & Wang, 2013). As this study did not focus on those factors, it is suggested for future research examining online product reviews' impact on product evaluation to consider the page colours and layout as factors.

Thirdly, the additional analysis revealed that manipulation time exposure has a significant influence on product evaluation both for positive and negative review. This result means, exposure time is also an important predictor of consumers' product evaluation. A possible explanation for this result might be that consumers were able to gather important information related to the product evaluation decision because of a higher exposure time. While with a lower exposure time, consumers could not gather sufficient information to assist them in making a product evaluation decision. A further examination of this factor is suggested to understand the relationship better.

Next, this study only assesses accommodative company response strategy impact on product evaluation. This study reveals that accommodative company response has a significant impact on consumers' causal attribution, and ultimately on consumers' product evaluation. However, as discussed in the previous chapter (see Chapter 2.3), there are three response strategies: accommodative, "no-action"/ "inaction", and defensive strategies (Lee & Song, 2010). Considering that company response has an important influence on consumers' attribution process, it is interesting to see if the impact is different across different company response strategy types

proposed. Therefore, it is suggested for future research to consider examining other company response strategy types in relation to consumers' product evaluation.

Finally, one of the study results was that an independent platform has a significantly higher impact on product evaluation. Hence it is interesting to investigate this further to see if the impact will differ when the company works with independent platforms (e.g. sponsorship review or editorial content). While it is a common practice today to have sponsored content in independent platforms, it is not yet explored academically how this kind of practice impact consumers' attribution process in order to generate a product evaluation prior to purchase. Therefore, it is suggested for future research to consider examining the impact of sponsored reviews on independent platforms in relation to consumers' product evaluation.

### **5.3 Implications**

Theoretically, this study offers some new insights by focusing on review platforms, valence, and company response. The results have shown that review platforms have different impact on consumer's causal attribution and product evaluation. Furthermore, this study also provides new insights by identifying the interaction effect between the company response and review valence on consumers' causal attribution. This study especially highlights the important role of company response in the consumers' attribution process, ultimately impacts consumers' product evaluation. Finally, this study confirms the significance of consumers' attribution process in order to generate a product evaluation.

The findings of this study also mean several implications for practitioners. Firstly, this study has shown that reviews posted in an independent platform are more influencing the consumers' product evaluation compared to reviews posted on a corporate platform. Hence, practitioners could consider

working with the independent websites (e.g. blog, social media influencer, etc). However, there is a possibility of different effects of sponsored reviews on the independent platform, which need to be examined in further research. Next, company response plays an important role in influencing consumers' causal attribution, which ultimately affects product evaluation. Thus, it is important to invest in company response, should the company be interested in improving product evaluation. Finally, practitioners also need to understand that consumers exposed to online product reviews actively process the information and change their product evaluations. Therefore, it is important to actively monitor online product reviews, both on independent and corporate platforms.

## **6. CONCLUSION**

This study aims to explain the relationship of online product reviews and consumers' product evaluation by using causal attribution, including the interaction of review platforms, company response, and review valence. The results support the premise that online product reviews have a significant relationship with consumers' product evaluation. Specifically, the relationship could be explained by the interaction of review platforms, company response, and review valence. Firstly, this study has found that different platform types where online product reviews are posted have different impact strength on consumer's product evaluation. Secondly, this study found that review platforms impact consumers' causal attribution in both positive and negative valence. Next, this study has found that company response has a significant role in consumers' causal attribution. Finally, this study has found that product attribution generates a significant higher influence on product evaluation compared to communicator attribution.



## REFERENCES

- Ananda, A. F., & Wandebori, H. (2016, September). *The impact of drugstore makeup product reviews by beauty vlogger on Youtube towards purchase intention by undergraduate students in Indonesia*. Paper presented at International Conference on Ethics of Business, Economics, and Social Science, Yogyakarta.
- Atkin, J. L., McCardle, M., & Newell, S. J. (2008). The role of advertiser motives in consumer evaluations of 'responsibility' messages from the alcohol industry. *Journal of Marketing Communications*, 14(4), 315-335. doi:10.1080/13527260802141447
- Bailey, A. A. (2005). Consumer awareness and use of product review websites. *Journal of Interactive Advertising*, 6(1), 68-81. doi:10.1080/15252019.2005.10722109
- Bradley, G. L., & Sparks, B. A. (2009). Dealing with service failures: The use of explanations. *Journal of Travel & Tourism Marketing*, 26(2), 129-143. doi:10.1080/10548400902862010
- Browning, V., So, K. K., & Sparks, B. (2013). The influence of online reviews on consumers' attributions of service quality and control for service standards in hotels. *Journal of Travel & Tourism Marketing*, 30(1-2), 23-40. doi:10.1080/10548408.2013.750971
- Calder, B. J., & Burnkrant, R. E. (1977). Interpersonal influence on consumer behavior: An attribution theory approach. *Journal of Consumer Research*, 4(1), 29-38. doi:10.1086/208676

- Chandran, S., & Morwitz, V. G. (2005). Effects of participative pricing on consumers' cognitions and actions: A goal theoretic perspective. *Journal of Consumer Research*, 32(2), 249-259. doi:10.1086/432234
- Chatterjee, P. (2001). Online review: Do consumers use them? *Advances in Consumer Research*, 28, 129–133.
- Constantinides, E., & Fountain, S. J. (2008). Web 2.0: Conceptual foundations and marketing issues. *Journal of Direct, Data and Digital Marketing Practice*, 9(3), 231-244. doi:10.1057/palgrave.dddmp.4350098
- Davidow, M. (2003). Organizational responses to customer complaints: What works and what doesn't. *Journal of Service Research*, 5(3), 225-250. doi:10.1177/1094670502238917
- DeCarlo, T. E., & Leigh, T. W. (1996). Impact of salesperson attraction on sales managers' attributions and feedback. *Journal of Marketing*, 60(2), 47-66. doi:10.2307/1251930
- Doh, S., & Hwang, J. (2009). How consumers evaluate eWOM (electronic word-of-mouth) messages. *CyberPsychology & Behavior*, 12(2), 193-197. doi:10.1089/cpb.2008.0109
- Folkes, V. S. (1988). Recent attribution research in consumer behavior: A re-view and new directions. *Journal of Consumer Research*, 14(4), 548. doi:10.1086/209135
- Franke, G. R., Huhmann, B. A., & Mothersbaugh, D. L. (2004). Information content and consumer readership of print ads: A comparison of search and experience products. *Journal of the Academy of Marketing Science*, 32(1), 20-31. doi:10.1177/0092070303257856

- Freedman, L. (2008, February). *Merchant and customer perspectives on customer reviews and user-generated content*. Retrieved from The E-tailing Group website: [http://www.e-tailing.com/content/wp-content/uploads/2008/12/2008\\_WhitePaper\\_0204\\_4FINAL-powerreviews.pdf](http://www.e-tailing.com/content/wp-content/uploads/2008/12/2008_WhitePaper_0204_4FINAL-powerreviews.pdf)
- Granitz, N. A., & Ward, J. C. (1996). Virtual community: A sociocognitive analysis. *Advances in Consumer Research*, 23, 161-166.
- Harris, J., & Gupta, P. (2008). 'You should buy this one!' The influence of online recommendations on product attitudes and choice confidence. *International Journal of Electronic Marketing and Retailing*, 2(2), 176. doi:10.1504/ijemr.2008.019816
- Hayes, A. F. (2017). *Introduction to mediation, moderation, and conditional process analysis, second edition: A regression-based approach*. New York, NY: Guilford Publications.
- Hennig-Thurau, T., Gwinner, K. P., Walsh, G., & Gremler, D. D. (2004). Electronic word-of-mouth via consumer-opinion platforms: What motivates consumers to articulate themselves on the Internet? *Journal of Interactive Marketing*, 18(1), 38-52. doi:10.1002/dir.10073
- Herr, P. M., Kardes, F. R., & Kim, J. (1991). Effects of word-of-mouth and product-attribute information on persuasion: An accessibility-diagnostics perspective. *Journal of Consumer Research*, 17(4), 454. doi:10.1086/208570
- Hilton, D. J. (1995). The social context of reasoning: Conversational inference and rational judgment. *Psychological Bulletin*, 118(2), 248-271. doi:10.1037//0033-2909.118.2.248
- Hogg, R. V., Tanis, E., & Zimmerman, D. (2014). *Probability and statistical inference* (9th ed.). New York, NY: Pearson Higher Ed.

- Holbrook, M. B., & Batra, R. (1987). Assessing the role of emotions as mediators of consumer responses to advertising. *Journal of Consumer Research*, 14(3), 404. doi:10.1086/209123
- Homburg, C., & Fürst, A. (2007). See no evil, hear no evil, speak no evil: a study of defensive organizational behavior towards customer complaints. *Journal of the Academy of Marketing Science*, 35(4), 523-536. doi:10.1007/s11747-006-0009-x
- Hsin Chang, H., & Wen Chen, S. (2008). The impact of online store environment cues on purchase intention. *Online Information Review*, 32(6), 818-841. doi:10.1108/14684520810923953
- Jaccard, J. (1998). *Interaction effects in factorial analysis of variance*. Thousand Oaks, CA: SAGE.
- Jiménez, F. R., & Mendoza, N. A. (2013). Too popular to ignore: The influence of online reviews on purchase intentions of search and experience products. *Journal of Interactive Marketing*, 27(3), 226-235. doi:10.1016/j.intmar.2013.04.004
- Kelley, H. (1967). Attribution theory in social psychology. *Nebraska Symposium on Motivation*, 15, 192-238.
- Kelley, H. (1973). The processes of causal attribution. *American Psychologist*, 28(2), 107-128. doi:10.1037/h0034225
- Kiecker, P., & Cowles, D. (2002). Interpersonal communication and personal influence on the internet: A framework for examining online word-of-mouth. *Journal of Euromarketing*, 11(2), 71-88. doi:10.1300/j037v11n02\_04
- Konstantopoulou, A., Rizomyliotis, I., Konstantoulaki, K., & Badahdah, R. (2018). Improving SMEs' competitiveness with the use of Instagram influencer advertising and

eWOM. *International Journal of Organizational Analysis*. doi:10.1108/IJOA-04-2018-1406

KPMG International. (2017). *The truth about online consumers* (201701TW-G). Retrieved from KPMG International website: <https://assets.kpmg/content/dam/kpmg/xx/pdf/2017/01/the-truth-about-online-consumers.pdf>

Kudeshia, C., & Kumar, A. (2017). Social eWOM: Does it affect the brand attitude and purchase intention of brands? *Management Research Review*, 40(3), 310-330. doi:10.1108/mrr-07-2015-0161

Laczniak, R. N., DeCarlo, T. E., & Ramaswami, S. N. (2001). Consumers' responses to negative word-of-mouth communication: An attribution theory perspective. *Journal of Consumer Psychology*, 11(1), 57-73. doi:10.1207/s15327663jcp1101\_5

Lee, B. K. (2004). Audience-oriented approach to crisis communication. *Communication Research*, 31(5), 600-618. doi:10.1177/0093650204267936

Lee, B. K. (2005). Hong Kong consumers' evaluation in an airline crash: A path model analysis. *Journal of Public Relations Research*, 17(4), 363-391. doi:10.1207/s1532754xjpr1704\_3

Lee, M., Rodgers, S., & Kim, M. (2009). Effects of valence and extremity of eWOM on attitude toward the brand and website. *Journal of Current Issues & Research in Advertising*, 31(2), 1-11. doi:10.1080/10641734.2009.10505262

Lee, M., & Youn, S. (2009). Electronic word of mouth (eWOM). *International Journal of Advertising*, 28(3), 473-499. doi:10.2501/s0265048709200709

- Lee, Y. L., & Song, S. (2010). An empirical investigation of electronic word-of-mouth: Informational motive and corporate response strategy. *Computers in Human Behavior*, 26(5), 1073-1080. doi:10.1016/j.chb.2010.03.009
- Lepkowska-White, E., Brashear, T. G., & Weinberger, M. G. (2003). A test of ad appeal effectiveness in Poland and the United States - the interplay of appeal, product, and culture. *Journal of Advertising*, 32(3), 57-66. doi:10.1080/00913367.2003.10639136
- Li, M., Huang, L., Tan, C., & Wei, K. (2013). Helpfulness of online product reviews as seen by consumers: Source and content features. *International Journal of Electronic Commerce*, 17(4), 101-136. doi:10.2753/jec1086-4415170404
- Mauri, A. G., & Minazzi, R. (2013). Web reviews influence on expectations and purchasing intentions of hotel potential customers. *International Journal of Hospitality Management*, 34, 99-107. doi:10.1016/j.ijhm.2013.02.012
- Mizerski, R. W. (1982). An attribution explanation of the disproportionate influence of unfavorable information. *Journal of Consumer Research*, 9(3), 301. doi:10.1086/208925
- Mizerski, R. W., Golden, L. L., & Kernan, J. B. (1979). The attribution process in consumer decision making. *Journal of Consumer Research*, 6(2), 123. doi:10.1086/208756
- Mudambi, & Schuff. (2010). Research note: What makes a helpful online review? A study of customer reviews on Amazon.com. *MIS Quarterly*, 34(1), 185. doi:10.2307/20721420
- Nelson, P. (1970). Information and consumer behavior. *Journal of Political Economy*, 78(2), 311-329. doi:10.1086/259630

- Park, C., & Lee, T. M. (2009). Information direction, website reputation and eWOM effect: A moderating role of product type. *Journal of Business Research*, 62(1), 61-67. doi:10.1016/j.jbusres.2007.11.017
- Prahalad, C., & Ramaswamy, V. (2004). Co-creation experiences: The next practice in value creation. *Journal of Interactive Marketing*, 18(3), 5-14. doi:10.1002/dir.20015
- Qiu, L., Pang, J., & Lim, K. H. (2012). Effects of conflicting aggregated rating on eWOM review credibility and diagnosticity: The moderating role of review valence. *Decision Support Systems*, 54(1), 631-643. doi:10.1016/j.dss.2012.08.020
- Rozin, P., & Royzman, E. B. (2001). Negativity bias, negativity dominance, and contagion. *Personality and Social Psychology Review*, 5(4), 296-320. doi:10.1207/s15327957pspr0504\_2
- Schmallegger, D., & Carson, D. (2008). Blogs in tourism: Changing approaches to information exchange. *Journal of Vacation Marketing*, 14(2), 99-110. doi:10.1177/1356766707087519
- Sen, S., & Lerman, D. (2007). Why are you telling me this? An examination into negative consumer reviews on the web. *Journal of Interactive Marketing*, 21(4), 76-94. doi:10.1002/dir.20090
- Senecal, S., & Nantel, J. (2004). The influence of online product recommendations on consumers' online choices. *Journal of Retailing*, 80(2), 159-169. doi:10.1016/j.jretai.2004.04.001
- Shrout, P. E., & Bolger, N. (2002). Mediation in experimental and nonexperimental studies: New procedures and recommendations. *Psychological Methods*, 7(4), 422-445. doi:10.1037//1082-989x.7.4.422

- Sparkman, R. M. (1982). The discounting principle in the perception of advertising. *Advances in Consumer Research*, 9, 277-280.
- Sparks, B. A., & Bradley, G. L. (2014). A “Triple A” typology of responding to negative consumer-generated online reviews. *Journal of Hospitality & Tourism Research*, 41(6), 719-745. doi:10.1177/1096348014538052
- Stigler, G. J. (1961). The economics of information. *Journal of Political Economy*, 69(3), 213-225. doi:10.1086/258464
- Tsao, W., Hsieh, M., Shih, L., & Lin, T. M. (2015). Compliance with eWOM: The influence of hotel reviews on booking intention from the perspective of consumer conformity. *International Journal of Hospitality Management*, 46, 99-111. doi:10.1016/j.ijhm.2015.01.008
- Ullah, R., Ambler, N., Kim, W., & Lee, H. (2016). From valence to emotions: Exploring the distribution of emotions in online product reviews. *Decision Support Systems*, 81, 41-53. doi:10.1016/j.dss.2015.10.007
- Van Noort, G., & Willemsen, L. M. (2012). Online damage control: The effects of proactive versus reactive webcare interventions in consumer-generated and brand-generated platforms. *Journal of Interactive Marketing*, 26(3), 131-140. doi:10.1016/j.intmar.2011.07.001
- Wiener, J. L., & Mowen, J. C. (1986). Source credibility: On the independent effects of trust and expertise. *Advances in Consumer Research*, 13, 306-310.



- Wu, W., Lee, C., Fu, C., & Wang, H. (2013). How can online store layout design and atmosphere influence consumer shopping intention on a website? *International Journal of Retail & Distribution Management*, 42(1), 4-24. doi:10.1108/ijrdm-01-2013-0035
- Wu, W., & Lee, Y. (2012). The effect of blog trustworthiness, product attitude, and blog involvement on purchase intention. *International Journal of Management & Information Systems (IJMIS)*, 16(3), 265. doi:10.19030/ijmis.v16i3.7079
- Xia, L. (2013). Effects of Companies' Responses to Consumer Criticism in Social Media. *International Journal of Electronic Commerce*, 17(4), 73-100. doi:10.2753/jec1086-4415170403
- Xue, F., & Phelps, J. E. (2004). Internet-facilitated consumer-to-consumer communication: The moderating role of receiver characteristics. *International Journal of Internet Marketing and Advertising*, 1(2), 121. doi:10.1504/ijima.2004.004016

## **Appendix A**

*Condition 1: A positive review in the brand website with a company response*

### **Review**

I've been using it for two weeks now, and this cream is fantastic!

I put it on daily before bed and before I put on makeup in the morning. I have very sensitive skin with dry patches. This cream works wonders by soothing and moisturizing my skin! I love that all of the ingredients are vegan. It works really well for my sensitive skin.

The cream has a thick texture. However, it spreads nicely and absorbs quickly. It also has a subtle fragrance, which is very relaxing.

Price is very reasonable. I don't need to use much product in one application, so it goes a long way! Next to that, the idea of recyclable packaging also makes me feel good about the product!

I will repurchase!

### **Company response**

BLUSH Response

Thank you for your review! We're so happy to hear that you are loving BLUSH Deep Moisture Cream! If desired, you can add serum or face oil to your regimen to add extra hydration. You may wish to explore the following options to boost your skin hydration: BLUSH Hydrate + Glow Oil and BLUSH Hydrate + Glow Serum. Please don't hesitate to reach out to our team via [BLUSH.com/contact](https://blush.com/contact) with any further questions or concerns you may have.

*Condition 2: A positive review in the brand website without a company response*

## **Review**

I've been using it for two weeks now, and this cream is fantastic!

I put it on daily before bed and before I put on makeup in the morning. I have very sensitive skin with dry patches. This cream works wonders by soothing and moisturizing my skin! I love that all of the ingredients are vegan. It works really well for my sensitive skin.

The cream has a thick texture. However, it spreads nicely and absorbs quickly. It also has a subtle fragrance, which is very relaxing.

Price is very reasonable. I don't need to use much product in one application, so it goes a long way!

Next to that, the idea of recyclable packaging also makes me feel good about the product!

I will repurchase!

*Condition 3: A negative review in the brand website with a company response*

**Review**

I've been using it for two weeks now, and this cream is terrible!

I put it on daily before bed and before I put on makeup in the morning. I have very sensitive skin with dry patches. This cream works poorly, causing my skin even more dry and flaky! I'm sceptical about the vegan ingredients. It doesn't work at all for my sensitive skin.

The cream has a thick texture. I feel like I always have a product build up in my skin. It also has an unpleasant smell, which is disturbing.

Price is very expensive. The product comes in a small package, so it finished at once! Next to that, recyclable packaging also feels cheap.

I will not repurchase!

**Company response**

**BLUSH Response**

We're so sorry to hear that your skin was not compatible with BLUSH Deep Moisture Cream. All of our product in BLUSH using 100% vegan ingredients and we didn't add extra fragrance in it. For the product build up issue, you may be using too much of the product as you only need a small pea size amount of the product for the entire face.

Please note that this product offers surface hydration that acts as a direct topical supplement that keep the outer layer of the skin protected and well-hydrated. Skin that is dehydrated will definitely benefit from a moisturizer but a moisturizer will not fix the cause of the dehydration. If you have a very dry and dehydrated skin concerns we recommend to pair this product with BLUSH Hydrate + Glow Oil and BLUSH Hydrate + Glow Serum.

Please don't hesitate to reach out to our team via [BLUSH.com/contact](https://blush.com/contact) with any further questions or concerns you may have. If you'd like to discontinue use, please visit [BLUSH.com/terms](https://blush.com/terms) to explore our 365-day return policy.

*Condition 4: A negative review in the brand website without a company response*

**Review**

I've been using it for two weeks now, and this cream is terrible!

I put it on daily before bed and before I put on makeup in the morning. I have very sensitive skin with dry patches. This cream works poorly, causing my skin even more dry and flaky! I'm sceptical about the vegan ingredients. It doesn't work at all for my sensitive skin.

The cream has a thick texture. I feel like I always have a product build up in my skin. It also has an unpleasant smell, which is disturbing.

Price is very expensive. The product comes in a small package, so it finished at once! Next to that, recyclable packaging also feels cheap.

I will not repurchase!

*Condition 5: A positive review in the personal blog without a company response*

## **Review**

### **BLUSH Deep Moisture Cream Review**

Hi everyone, today's post is a review of the BLUSH Deep Moisture Cream. I've been using this moisturizer every single day for two weeks, so I'm finally ready to give it a review!

To begin below is some information from the brand's website:

#### **BLUSH Deep Moisture Cream Details**

Price : EUR 21.50 for 2.0 oz

Description : African herbs and mushrooms calm the skin when faced with daily stressors like UV rays and environmental pollutants.

Pentapeptide calms the stress reaction in sensitive and irritated skin. This deeply moisturizing cream is especially good for dry skin types.

Claim :

100% vegan ingredients

Recyclable packaging

Non-comedogenic

No animal testing

No dimethicone

No parabens

No phthalates

### My Experience

To give some background on my skin type, I have very sensitive skin with dry patches. This cream works wonders by soothing and moisturizing my skin! I love that all of the ingredients are vegan. It works really well for my sensitive skin.

The cream has a thick texture. However, it spreads nicely and absorbs quickly. It also has a subtle fragrance, which is very relaxing.

I also think the price is very reasonable. I don't need to use much product in one application, so it goes a long way! Next to that, the idea of recyclable packaging also makes me feel good about the product!

To conclude, I think this cream is fantastic, and I will definitely recommend it!



*Condition 6: A negative review in the personal blog without a company response*

## **Review**

### **BLUSH Deep Moisture Cream Review**

Hi everyone, today's post is a review of the BLUSH Deep Moisture Cream. I've been using this moisturizer every single day for two weeks, so I'm finally ready to give it a review!

To begin below is some information from the brand's website:

#### **BLUSH Deep Moisture Cream**

Price : EUR 21.50 for 2.0 oz

Description : African herbs and mushrooms calm the skin when faced with daily stressors like UV rays and environmental pollutants.

Pentapeptide calms the stress reaction in sensitive and irritated skin. This deeply moisturizing cream is especially good for dry skin types.

Claim :

100% vegan ingredients

Recyclable packaging

Non-comedogenic

No animal testing

No dimethicone

No parabens

No phthalates

### My Experience

To give some background on my skin type, I have very sensitive skin with dry patches. This cream works poorly, causing my skin even more dry and flaky! To be honest, I'm sceptical about the vegan ingredients. It doesn't work at all for my sensitive skin.

The cream has a thick texture. I feel like I always have a product build up in my skin. It also has an unpleasant smell, which is disturbing.

I also think the price is very expensive. The product comes in a small package, so it finished at once! Next to that, recyclable packaging also feels cheap.

To conclude, I think this cream is terrible, and I will not recommend it!

Appendix B

#	Valence				Skin Effect										
		Pesonal condition	Economical value	Fragrance	Skin reaction (i.e. flaky, breakout, clog, etc)	Sensation (i.e. sting, burn, fresh, hydrated, etc)	Colour	Face looks	Product Texture	Ingredients	Packaging	Usage habit	Usage period	Repurchase	Link
1	Negative				start breaking out all over my chin and around my nose, causing me prolonged breakouts and burning irritation, my chin and nose areas are perpetually flaky	It does a decent job of hydrating over all, every time I put it on my face my skin immediately starts stinging	my chin and nose areas are red						I used to use this moisturizer years ago and consistently since then. I have been using it daily.		<a href="https://www.fresh.com/US/all-moisturizers/lotus-youth-preserve-face-cream/H00002669.html">https://www.fresh.com/US/all-moisturizers/lotus-youth-preserve-face-cream/H00002669.html</a>
2	Negative				my nose and forehead irritated, clogging				too 'rich' for my really fragile skin	rose, apricot kernal and almond oil in it caused me issues					<a href="https://osmiaorganics.com/products/purely-simple-face-cream">https://osmiaorganics.com/products/purely-simple-face-cream</a>
3	Positive									anything other than straight coconut oil makes me break out horribly, but this has been A DREAM			using your face lotion for only 4 days	will forever use this lotion	<a href="https://www.yayforearth.com/reviews">https://www.yayforearth.com/reviews</a>
4	Positive		I don't use much - goes a long way.									use this after shower and then normally after workout shower.			<a href="https://goaskincare.com/products/regenerative-face-cream">https://goaskincare.com/products/regenerative-face-cream</a>
5	Positive			the light scent of grapefruit is relaxing and quickly fades				My skin never looks greasy after application	thick texture spreads nicely and absorbs quickly		The tube is perfect, I can get every last drop and not worry about spilling, dropping, or contaminating.			Highly recommend	<a href="https://jaobrand.com/products/face-creme-night">https://jaobrand.com/products/face-creme-night</a>
6	Positive	I have very dry, itchy skin all year long	had a special going on and bought it, recently ordered a 2-pack and received today along with 2 small size ones.						non-greasy and smoothed			carry it all the time in my purse			<a href="https://www.aloeinfusion.com/products/aloe-infusion-face-and-body-cream">https://www.aloeinfusion.com/products/aloe-infusion-face-and-body-cream</a>
7	Negative					doesn't moisturize just like its counterpart moisturizer			the texture of the cream is so bad, it is like white paint					I am never going to settle for this cream even if it is the only cream available at the moment!	<a href="https://in.oriflame.com/products/product?code=32702">https://in.oriflame.com/products/product?code=32702</a>
8	Positive			Beautiful scent					Beautiful texture, Absorbs well into my skin leaving it moisturized and not oily			I follow with oil.			<a href="https://kahina-givingbeauty.com/shop/kahina-face-cream/">https://kahina-givingbeauty.com/shop/kahina-face-cream/</a>

9	Positive		The small tube goes a long way surprisingly, its been opened a while (mine has been opened 3 months)					i feel like my skin has a nice dewy look to it		there are no nasties in it so it doesn't have as long a shelf life as the ones filled with nasties	I wonder if there is a viable way of putting the products in earth friendly packaging?	Use it alongside the cleanser and oil. without the oil, i need to use a fair bit more		Lovely products and will continue repurchasing	<a href="https://www.gotoskincare.com/products/face/very-useful-face-cream">https://www.gotoskincare.com/products/face/very-useful-face-cream</a>
10	Negative		Thought about sending it back until I'd saw that you have to also pay for return shipping. My bad for not checking that, most companies I've dealt with offer a return label. Too expensive just to toss.		it broke me out	my face felt so dry - not tight, extremely dry						I wore with and without make up and tried using it on my décolleté instead. I tried this with other strivectin product and I tried it with non irritating products I've used forever and it just did not work.		Was my first purchase with Strivectin so will definitely be careful to try the product from somewhere else that offers easier returns.	<a href="https://www.strivectin.com/tightening-sculpting-face-cream.html">https://www.strivectin.com/tightening-sculpting-face-cream.html</a>
11	Positive	Dry skin				it is soooooo hydrating		baby soft and smooth	benefits you get from this cream far outweigh the unique texture			You do have to give it some time and patience while it "soaks in"			<a href="https://oy-l.com/product/face-cream/">https://oy-l.com/product/face-cream/</a>
12	Positive								It goes on easily, absorbs well and is not greasy at all.						<a href="https://www.madhippie.com/products/face-cream">https://www.madhippie.com/products/face-cream</a>
13	Positive	50 yo, normal skin		frangrance free					lightweight						<a href="https://www.dove.com/us/en/dermaseries/face-care/face-cream/dermaseries-dry-skin-relief-overnight-face-cream.html">https://www.dove.com/us/en/dermaseries/face-care/face-cream/dermaseries-dry-skin-relief-overnight-face-cream.html</a>
14	Positive		affordable	smells good		hydrating			I find it a bit heavy on my normal skin			I use this moisturiser alternately with the miracle face oil		Will recommend it for drier skin types.	<a href="https://www.evolvebeauty.co.uk/products/daily-renew-facial-cream">https://www.evolvebeauty.co.uk/products/daily-renew-facial-cream</a>
15	Positive	rosacea prone skin. I'm 41 years old and I've been having rosacea since my twenties.			calms my skin right away	Soothing, refreshing, moisturizing. I don't need more hydration than this cream.	the redness disappear on application		it's so light			I use it as my day cream. . First, the cleanser, then, the toner, a few drops of face oil (organic hemp seed oil) and I finish with this cream.	I've been using this for 2 months now	I really recommend this marshmallow cream. I will buy again and again...	<a href="https://www.smithfarmsproducts.com/products/marshmallow-face-cream">https://www.smithfarmsproducts.com/products/marshmallow-face-cream</a>
16	Positive														<a href="https://revisionskincare.com/products/dejface-cream-advanced-all-in-one-age-defying-moisturizer">https://revisionskincare.com/products/dejface-cream-advanced-all-in-one-age-defying-moisturizer</a>
17	Positive	I have extremely dry skin and eczema, The winter is the worst time for my skin, I am 58 yrs old	worth the \$\$		my eczema is better, The Radiance Resurfacing foam is also great to exfoliate dry flaky skin- but super gentle and feels great afterwards					ingredients must be super healing		I smear the residual eye cream all around my face		I used to use Cerave face cream and Tacrolimus for eczema. Now I don't use it!	<a href="https://www.drbrandtskincare.com/products/xtend-your-youth-face-cream">https://www.drbrandtskincare.com/products/xtend-your-youth-face-cream</a>
18	Negative	not usually sensitive to any beauty products AT ALL								something in this cream did not agree with me				I will be returning it.	<a href="https://www.kiehls.com/skincare/rosa-arctica/rosa-arctica/942.html">https://www.kiehls.com/skincare/rosa-arctica/rosa-arctica/942.html</a>

19	Positive			The smell is pleasant and subtle, which is unique to a moisturizer this heavy!	My skin always ends up so dry that no amount of moisturizer can heal it. It burns whenever I put moisturizer on and its always red and flaky. UNTIL I found this moisturizer							A little goes a long way and my skin has never been so nice in the winter I put it on before bed and before I put on makeup in the morning!!!			<a href="https://www.lushusa.com/face/moisturizers/celestial/00407.htm">https://www.lushusa.com/face/moisturizers/celestial/00407.htm</a> I
20	Negative			The smell was also very chemical like.				The product was way too thick, and left a white creamy look on my face. As a consumer with darker skin, it didn't feel, nor look nice	The product was way too thick, and left a white creamy look on my face. As a consumer with darker skin, it didn't feel, nor look nice						<a href="https://www.marykay.com/en-us/products/all/mary-kay-intense-moisturizing-cream-180202">https://www.marykay.com/en-us/products/all/mary-kay-intense-moisturizing-cream-180202</a>
21	Positive			It also smells fantastic too	My skin was visibly more smooth and moisturized after application.	the cream feels very lightweight and absorbs almost instantly. The nourishing affects can be felt for several minutes after application.						Granted, I only use it at night	The sample I received was only .24 oz and it has been lasting me for weeks		<a href="https://www.malinandgoetz.com/advanced-renewal-cream">https://www.malinandgoetz.com/advanced-renewal-cream</a>
22	Positive			I love the way this facial cream feels and smells on my face.	I love the way this facial cream feels and smells on my face.	No break outs when I use this product!									<a href="https://www.weleda.com/product/s/sensitive-care-facial-cream">https://www.weleda.com/product/s/sensitive-care-facial-cream</a>
23	Positive				Drug store moisturizers DO NOT compare. My skin lost its glow and quickly begun looking tired & dull. Drug store moisturizers are fantastic at sitting on top of the skin, not penetrating and creating change.										<a href="https://katburki.com/product/face-cream/">https://katburki.com/product/face-cream/</a>
24	Positive				I have sensitive dry skin. None of the other moisturisers worked as this one does. Makes my skin hydrated and baby soft.								I have been using this moisturiser for quite a long time and don't think I will ever change to any other moisturiser.		<a href="https://uk.loccitane.com/moisturiser-dry-skin,83,1,29776,649981.htm?s=29959">https://uk.loccitane.com/moisturiser-dry-skin,83,1,29776,649981.htm?s=29959</a>

25	Positive	I have eczema and extremely sensitive skin and this doesn't sting my face when I get flare-ups, which is amazing!													<a href="https://www.marcelle.com/en/essentials-moisture-cream">https://www.marcelle.com/en/essentials-moisture-cream</a>
26	Positive				My skin and my daughter's skin looks and feels terrific! Skin issues neutralized.										<a href="https://osmiaorganics.com/products/purely-simple-face-cream">https://osmiaorganics.com/products/purely-simple-face-cream</a>
27	Positive			Nice light scent											<a href="https://www.rockymountainsoap.com/products/pomegranate-day-cream">https://www.rockymountainsoap.com/products/pomegranate-day-cream</a>
28	Positive	I have ultra sensitive skin and have never been able to use anti aging products before.						I'm seeing a difference on my frown lines							<a href="https://endotaspa.com.au/cellular-repair-face-cream.html">https://endotaspa.com.au/cellular-repair-face-cream.html</a>
29	positive					I use their night cream and body lotion as well, and my skin feels so healthy.									<a href="https://www.cetaphil.com/daily-facial-moisturizer-spf-50">https://www.cetaphil.com/daily-facial-moisturizer-spf-50</a>
30	positive	I was breaking out all the time before I started using this product.			Then I love the moisturizer because it brings moisturizer to my skin but it's not oily to the touch.									Love everything about these products and would definitely purchase.	<a href="https://www.laroche-posay.us/face-and-body-skin-care/face-products/face-moisturizer/toleriane-double-repair-facial-moisturizer-with-spf-3337875545846.html">https://www.laroche-posay.us/face-and-body-skin-care/face-products/face-moisturizer/toleriane-double-repair-facial-moisturizer-with-spf-3337875545846.html</a>