Understanding different attitudes towards advertising on Instagram and Facebook

Navn: Cecilie Strøm Haukeberg, Anniken Klyve

Start: 15.01.2019 09.00
Finish: 01.07.2019 12.00
Anniken Klyve:
Cecilie Strøm Haukeberg:

Master Thesis at BI Norwegian Business School

Understanding different attitudes towards advertising on Instagram and Facebook

Date of submission
26.06.2018

Deadline
01.07.2018

Campus
BI Oslo

Exam code and name
GRA 19703 Master Thesis

Program
Master of Science in Strategic Marketing Management

Supervisor
Fred Selnes
Acknowledgements

We would like to offer a special gratitude to our supervisor Professor Fred Selnes. His advice and support have been a tremendous help during the whole process. We also appreciate how BI Norwegian Business School has provided us with a variety of courses and knowledgeable professors that have contributed with insights along the way.

The following is a result of two years of insightful classes, interesting discussions, and hard work.

Thank you for reading.
Sincerely,

*Cecilie Strøm Haukeberg and Anniken Klyve*
Executive summary

The concept of attitude towards advertising has been widely tested. However, the concept lacks work regarding social media. The present study, therefore, provides important new insight regarding a topic that is both important for academics and managers. As consumers are bombarded with thousands of advertisements every day and the use of digital marketing is constantly increasing, social media appear to be where managers are investing their money. We, therefore, want to provide insight and guidelines as to what aspects of advertisements managers should focus on and which platform is best suited to achieve the aspired attitudes.

Through an online study with 246 respondents, the current paper finds clear evidence that Instagram is perceived more positively than Facebook and that informativeness has the biggest impact on attitude towards advertising on a social media platform. However, in contrast to previous studies, this study does not find evidence that entertainment has a significant impact on attitudes. The advice is, therefore, to focus on timely and relevant advertising to make the messages more informative.
# Table of Contents

1.0 Introduction .................................................................................................................. 5

2.0 Literature review ......................................................................................................... 7

2.1 Attitudes ....................................................................................................................... 7
    2.1.1 Attitudes towards advertising ........................................................................... 8
    2.1.2 Attitudes towards Internet advertising ............................................................ 9
    2.1.3 Attitudes towards social media advertising .................................................. 12

2.2 Social media ............................................................................................................... 13
    2.2.1 Advertising on social media ........................................................................... 13

2.3 Privacy ......................................................................................................................... 15
    2.3.1 Social media and privacy .............................................................................. 15
    2.3.2 Privacy calculus .......................................................................................... 16

2.4 Personalization .......................................................................................................... 17
    2.4.1 Intrusiveness .................................................................................................. 18

2.5 The conceptual model ............................................................................................... 18

3.0 Methodology ............................................................................................................... 21

3.1 Scale development .................................................................................................... 21

3.2 Pilot study .................................................................................................................. 23

3.3 Data Collection ......................................................................................................... 24

4.0 Data analysis .............................................................................................................. 24

4.1 Missing value analysis and data cleaning ............................................................... 24

4.2 Reliability and validity ............................................................................................ 25

4.3 Data Characteristics ................................................................................................. 25

4.4 Factor analysis ......................................................................................................... 26

4.5 Linear regression analysis ....................................................................................... 27

4.6 Independent t-test .................................................................................................... 31

4.7 Pearson correlations ............................................................................................... 32

4.8 Summary of results ................................................................................................. 33

5.0 Discussion .................................................................................................................. 33

5.1 Managerial implications ......................................................................................... 36

5.2 Limitations and further research ............................................................................ 37

6.0 References ............................................................................................................... 39

7.0 Appendices ................................................................................................................. 47
1.0 Introduction

Companies are working harder than ever to keep consumers’ attention as consumers are bombarded with commercial exposure of around 4,000 to 10,000 advertisements each day (Simpson, 2017). Marketers are, therefore, challenged to find new ways to communicate with their customers (D. Aaker, 2010). This might be one of the reasons why digital marketing today is accountable for over half of the total Norwegian advertising market (Medienorge, 2019). Additionally, social media advertising expenditures continue to increase and is expected to almost double within the next five years (CMO Survey, 2017). We, therefore, want to investigate consumers’ attitudes towards advertising on social media and explore whether attitudes differ between Instagram and Facebook. This is in order to assure that marketers’ targeted advertisements get the desired effects, and thus the desired profits.

Among all the existing marketing channels, it is important to pick the one that will suit your strategy and budget the best (Griffith, 2018). This starts with selecting a channel where your customers see your messages and react to it in the desired way (Griffith, 2018). It is, therefore, consequential to know where your target group is, when they want your information, and how they want it delivered (Griffith, 2018). Instagram and Facebook are two of the most popular social media channels and have coverage of respectively 55% and 83% of the Norwegian population (Ipsos, 2019). However, Facebook appears to have reached a plateau and is slightly decreasing, while Instagram’s user frequencies and coverage is still increasing (Ipsos, 2019). These platforms have become an important go-to for content consumption as consumers say it is one of the most relevant channels for advertisements (Cooper, 2018).

Social media advertising has the potential of being more effective than traditional advertising as a result of the precise targeting enabled by the demographic information provided by these channels (Selnes & Staude, 2017). For instance, computers have proven to disclose more precise personality traits from our activities on social media than our own family and friends are able to predict (University of Cambridge, 2015). Personalized advertisements specifically targeted at readers predicted moods, rather than their previous behavior, is said to
improve click-through rate by 40% (Bell, 2019). The type of targeting that comes from following your online activities with codes and cookies has been used for years (Bell, 2019). However, the effects are still questioned and perceived as creepy by many and unethical by some (Bell, 2019). Though the technology might be perceived as invasive, it is, in fact, beneficial for consumers to be provided with the information they need, when they are in need of it (Bell, 2019). In order to serve relevant, personalized advertising, marketers need to deliver advertisements at the right time (Padilla, 2016). They need to be attentive to where the customer is on its customer journey. There is no use in serving a discount on a new phone after the customer has already purchased one. Then it is too late and will only cause frustration and negative emotions (Padilla, 2016). Timely and relevant messages are, therefore, becoming just as important as communicating to the right audience (Zingaro, 2018).

A reason for Facebook’s great number of followers might be that it launched six years before Instagram (Facebook, 2019; Instagram, 2011). However, Facebook started pushing personalized advertisements within a year of its launch, while Instagram first started advertising in 2013 (Gil, 2019). This gave people more time to get increasingly annoyed by advertisements on Facebook and worried about their privacy, as no one likes being stalked by products they have researched online (Gulli, 2016). ACIGI- Ipsos global survey (2018) report that 52% of internet users say they are more concerned about online privacy than they were a year ago and that around 63% feel that social media has too much power (Bricker, 2018).

While there are several reasons for a company to be on social media, it is most importantly another platform to manage consumers attitudes towards your firm (Malthouse, Haenlein, Skiera, Wege, & Zhang, 2013). Attitude theory explains that attitudes are a consistent part of an individual’s personality, that is either learned through cognitive processes or experiences (Schiffman, 2015). They are crucial for marketing as they are arguably one of the major indicators of a person’s intention towards performing a behavior (Ajzen & Fishbein, 1977). Another reason for the major academic interest in the concept of attitudes is that they are considered to be relatively stable and enduring (Mitchell & Olson, 1981).
While there are a few studies that focus on attitudes towards internet advertising (Miller, 1996; Sarkar & Chowdhury, 2017; Schlosser, Shavitt, & Kanfer, 1999; Sun, Lim, Jiang, Peng, & Chen, 2010), there are only a limited number that address attitudes towards social media advertising (Boateng & Okoe, 2015; Saxena & Khanna, 2013; Selnes & Staude, 2017). The purpose of this study is, therefore, to provide new conceptualizations of this marketing issue and investigate consumers’ attitudes towards advertising on Instagram and Facebook. In conclusion, we propose the following research question for our study:

What are consumers’ attitudes towards advertising on Instagram relative to Facebook?

The paper is organized as follows. First, we give an overview of the essential theories concerning attitudes towards advertising. Then, we examine the characteristics of social media advertising and theories regarding privacy and personalization before we introduce our conceptual model and hypotheses. Section three provides insight into our method, including scale development and sampling process. Followingly, section four presents the analysis of our study, and section five discusses the results in relation to relevant literature. Section five also includes managerial implications, suggestions for future research, and the limitations we have recognized in our study.

2.0 Literature review

2.1 Attitudes

Attitudes are defined as “a learned predisposition to behave in a consistently favorable or unfavorable way with respect to a given object” (Schiffman, 2015, p. 172). That is to say, an attitude is a learned and consistent part of an individual's personality (Schiffman, 2015). It is used to describe something that we cannot see, which is often expressed through utterances and actions (Schiffman, 2015). The marketing literature concerning attitudes are divided into two different concepts. The first concept believes attitudes are stable object-related associations stored and then evoked in memory (Argyriou & Melewar, 2011). The second believe that attitudes are a strictly cognitive process or based on emotions and feelings.
Argyriou and Melewar (2011) find the two different perspectives to be supplementary rather than constraining as attitudes are evaluative judgments, involving several attribute dimensions and may stem from qualitatively different processes.

2.1.1 Attitudes towards advertising

Attitude towards an advertisement is defined as a “predisposition to respond in a favorable or unfavorable manner to a particular advertising stimulation during a particular exposure occasion” (Mackenzie, Lutz, & Belch, 1986). Literature reveals several factors that affect attitudes towards advertisements. Among these hold the extent of useful information provided in the advertisement, how entertaining the advertisement is, or if the advertisement signals the desired image (Pollay & Mittal, 1993; Selnes & Staude, 2017). Irrelevant advertisements can be perceived as noise and contribute to a negative perception of the sender or the channel (Selnes & Staude, 2017). Selnes and Staude (2017) found that people who are positive towards advertisements in a channel, in turn, perceive the advertisements to be more useful. Advertisements that are perceived to be more useful will affect the consumer’s positivity towards advertisements, advertisements in the channel, and in turn positively affect the brand (Selnes & Staude, 2017). Irrelevant advertisements can be perceived as noise and contribute to a negative perception of the sender or the channel (Selnes & Staude, 2017).

Shavitt, Lowrey, and Haefner (1998) found that people, in general, hold a more favorable attitude towards advertising. Reportedly, people enjoy advertisements and find them generally informative, even if they do not generally trust advertising (Shavitt, Lowrey, & Haefner, 1998). Males, younger consumers, and people with less education reported the most favorable attitudes towards advertising (Shavitt et al., 1998). The researchers also found “the feeling of enjoyment” induced by the advertisements to be one of the major influences of overall attitudes towards advertising (Shavitt et al., 1998).

Mehta and Purvis (1995) performed a study which revealed that the attitude towards advertising in general, is one of the most important factors that influences how much attention will be paid to an advertisement. The degree to which
individuals like to look at advertising and feel that it generally is informative affects how much attention they pay to advertisements in magazines (Mehta & Purvis, 1995). Further, the researchers also highlight how the print medium is controlled by the reader as they decide how much time to spend on a specific advertisement before they turn the page (Mehta & Purvis, 1995).

Advertising clutter
Research suggests that perceived advertising clutter can negatively affect attitude towards advertising in a medium (Elliott & Speck, 1998). Advertising clutter is defined as “one’s belief that the amount of advertising in a medium is excessive” (Elliott & Speck, 1998). Thus, it is undesired and might hinder the recognition of desired content and make the communication channel less efficient (Elliott & Speck, 1998). In catalogs and other media that are 100 percent advertising, advertisements are desired and do not typically constitute clutter (Elliott & Speck, 1998). In other words, it is relevant to separate “advertising clutter” and “perceived advertising clutter” (Elliott & Speck, 1998). The perception of advertising clutter is partially related to consumers interest (Elliott & Speck, 1998). If advertisements are relevant to the consumer or match the content in the magazines, consumers will not see them as clutter (Elliott & Speck, 1998). Thus, effective targeting should reduce the perception of clutter (Elliott & Speck, 1998). Additionally, the researchers believe that media differences can affect perceived clutter (Elliott & Speck, 1998). Advertisements that disrupt consumers when they are heavily involved with the media will increase the perception of advertising clutter (Elliott & Speck, 1998). Elliot and Speck (1998) also suggest that demographic variables can affect the perception of advertising clutter. They imply that the level of experience consumers have with a medium makes them more used to advertisements and perceive it to be less clutter (Elliott & Speck, 1998).

2.1.2 Attitudes towards Internet advertising

Compared to traditional media, internet advertising provides a higher degree of interactivity (Wang, Zhang, Choi, & D'Eredita, 2002). That is, it allows for two-way communication and active control as consumers can choose to click on hyperlinks and directly influence their own experience (Wang et al., 2002). Internet advertisements usually provide the consumer with a high degree of
control over advertising exposure (Schlosser et al., 1999). In contrast, traditional advertisements are to a higher degree forced at the consumers as they are relatively inactive in the exposure process (Schlosser et al., 1999).

Ducoffe introduced the construct of advertising value in traditional media in 1995 and in internet advertising in 1996, suggesting that advertising effectiveness is influenced by the value it offers to the consumers (Robert H. Ducoffe, 1995; Robert H Ducoffe, 1996). Advertising value was defined as “a subjective evaluation on the relative worth or utility of advertising to consumers” (Robert H. Ducoffe, 1995). Ducoffe believed that consumers’ response to advertising is a result of whether they get what they want from advertising or not (Robert H. Ducoffe, 1995). Informativeness, entertainment, and irritation were found to be the main factors associated with the attitude towards both traditional and Internet advertising (Robert H Ducoffe, 1996; Sun et al., 2010). Both informativeness and entertainment had a significant positive impact on advertising value, while irritation had a significant negative impact (Robert H. Ducoffe, 1995).

**Informativeness**

Informativeness can be defined as “the ability to effectively provide relevant information” (Oh & Xu, 2003). There is one main reason why companies advertise; to provide information about their products and brand (Saxena & Khanna, 2013). Further, supplying information is reported as the primary reason why consumers approve of advertising (Saxena & Khanna, 2013). Internet advertising provides unlimited information and unlimited sources of information beyond time and space (Yoon & Kim, 2001). Informativeness concern the consumers perceived satisfaction of product information offered in the advertisement or on a company website (Sarkar & Chowdhury, 2017; Sun et al., 2010). The level of informativeness provided will affect consumers’ perception of the advertised company and product and in turn the advertisement itself (Haghirian, Madlberger, & Tanuskova, 2005). Thus, the information delivered to the consumer through the advertisement needs a degree of usefulness to intrigue the consumer and provide a level of relevance (Sarkar & Chowdhury, 2017). Consumers expect that advertisements show timeliness, usefulness, and accuracy towards the consumer (Blanco, Blasco, & Azorín, 2010; Haghirian et al., 2005).
Entertainment

Entertainment can be defined as “the ability to arouse aesthetic enjoyment” (Oh & Xu, 2003). Saxena and Khanna (2013) state that an advertisement full of information is not worthy if it lacks entertaining content. Entertainment involves pleasure and involvement that leads to positive affect and mood of the consumer and can thus enhance the experience of advertising (Haghirian et al., 2005; Saxena & Khanna, 2013). If the advertisement is perceived as pleasant or likable, it is thought to have a positive impact on attitude towards the brand (Robert H Ducoffe, 1996). These positive feelings constitute the greatest role in consumers’ overall attitudes towards advertisements (Robert H Ducoffe, 1996; Haghirian et al., 2005; Shavitt et al., 1998).

An amusing advertisement message is generally perceived as more positive by the consumer as they are fulfilling the consumers need of escapism, diversion, aesthetic enjoyment, or emotional release (Haghirian et al., 2005; Sarkar & Chowdhury, 2017; Sun et al., 2010). Additionally, the consumers seem to give more attention to an advertisement when various tools are used to amuse them, which in turn proves that this can be used to involve the consumer more deeply (Sarkar & Chowdhury, 2017). The message has to be funny and consist to be able to capture the consumer’s attention immediately (Blanco et al., 2010). Entertainment is reported to exhibit almost four times more strength than information regarding attitude towards advertisements (Taylor, Lewin, & Strutton, 2011). Ducoffe (1995) found consumers who perceived advertising as entertaining to also evaluate it as informative. In addition, what is perceived as informative by one, could be perceived as entertaining by another (Alwitt & Prabhaker, 1992).

Irritation

Irritation represents the consumer’s negative reactions to any aspect of internet advertisements (Sun et al., 2010). Advertising irritation can be defined as “the negative, impatient, and displeasing feeling caused by various forms of advertising stimuli” (D. A. Aaker & Bruzzone, 1985). Consumers are likely to perceive advertisements as unwanted and irritating when there has been used
techniques that annoy, offend, insult, or overly manipulate (Sarkar & Chowdhury, 2017). Certain advertised products may also trigger perceived advertising irritation, in addition to perceived intrusiveness and perceived loss of control (D. A. Aaker & Bruzzone, 1985; Morimoto & Chang, 2006). Further, when information from advertisements are perceived as confusing or distracting, the consumers might react negatively (Sarkar & Chowdhury, 2017). Irritation is also found to decrease the general effectiveness of advertising (D. A. Aaker & Bruzzone, 1985). However, what is irritating and unwanted for some might be rewarding for others (Alwitt & Prabhaker, 1992).

Pelsmacker and Van den Bergh (1999) analyzed the relationship between advertisement characteristics and the level of irritation. They found that in order to avoid irritation, advertisers must focus on how they deliver the message, what they say, and how often they repeat it (Pelsmacker & Van den Bergh, 1999). Frequent exposure or repetition was mentioned as the main reasons for advertising irritation (Pelsmacker & Van den Bergh, 1999). Television was found to be the most irritating media, and the respondents stated that the reason was that there is too much advertising on television (Pelsmacker & Van den Bergh, 1999). Another reason for irritation is when the advertisement keeps the consumer away from what he/she was doing (Moore, Moore, Shanahan, & Mack, 2015). Furthermore, newspaper advertisements scored very low on the irritation factor as respondents said that “you can skip them” (Pelsmacker & Van den Bergh, 1999).

2.1.3 Attitudes towards social media advertising

Boateng and Okoe did a study where they researched the relationship between consumers response and attitude toward advertising on social media (Boateng & Okoe, 2015). They found that consumers with a favorable attitude towards advertising on social media are more likely to buy or look for further information when exposed to an advertisement on social media (Boateng & Okoe, 2015). Further, the researchers found that the respondents had a positive attitude towards advertising on social media as they found it to be an essential channel with good communication (Boateng & Okoe, 2015).
Selnes and Staude (2017) found that Facebook advertisements are perceived to be more relevant for those who use Facebook more, than for those who use Facebook less. Further, more relevant advertisements are perceived more positively by the consumers (Selnes & Staude, 2017). On the other hand, a reason that causes consumers to be negative towards advertising on social media is the depersonalization of their feed (Selnes & Staude, 2017). Advertisements on social media can overshadow your preferred posts and be perceived as disruptive (Selnes & Staude, 2017). However, influencer advertising on Instagram persuades consumers without triggering advertising recognition, and researchers believe this to be the reason why it is a more efficient way of advertising (Evans, Phua, Lim, & Jun, 2017).

2.2 Social media

Social media platforms enable users to create personal profiles, communicate, and connect with other users and brands by liking, sharing, commenting, and viewing (Phua, Jin, & Kim, 2017). A great advantage of social media sites over traditional media is, therefore, their capacity for better user interactivity (Phua et al., 2017). Young adults today are the first “digital natives” and has never known a world without technology (Serazio, 2015). Their intimate relationship to the digital world and social media is one of this generation's strengths (Serazio, 2015). Several researchers have sought to demonstrate how and why people use social media sites (Correa, Hinsley, & de Zúñiga, 2010; Muntinga, Moorman, & Smit, 2011; Phua et al., 2017; Whiting & Williams, 2013). The findings suggest social interaction, information seeking, passing of time, entertainment, and relaxation as the five main reasons (Whiting & Williams, 2013).

2.2.1 Advertising on social media

In recent years, advertising on social media has become an important platform for companies trying to communicate with consumers (Evans et al., 2017). It is a medium that is interactive in nature and generates awareness and information without interactive involvement (Saxena & Khanna, 2013). This advantage makes advertising on social media the most competitive platform for information sharing (Saxena & Khanna, 2013). Through social media, the companies can engage with
their audience in several different ways including paid ads, sponsored posts, electronic word-of-mouth, and through the brand’s own account (Evans et al., 2017). In this paper, we will focus on paid ads in the feed.

Instagram and Facebook differ from how their technology determines the advertising content in the consumers’ feed. Instagram mainly uses image recognition technology to determine the content (Bond, 2019). That is to say, the platform utilizes signals from consumers interest, timeliness, and relationships to assess the details of a given post (Bond, 2019). If a consumer regularly engages with posts that feature interior design, the algorithm gives preference to interior design-related images when organizing the consumer’s feed (Bond, 2019). In this way, advertisers can rely on the content itself to target consumers instead of filling the captions with hashtags (Bond, 2019). Furthermore, Instagram recognizes which friends, celebrities, or brands you interact with most often and prioritize posts from these accounts (Bond, 2019). Facebook, on the other hand, target advertisements to their users by collecting data from all your inputs on their sites, as well as what sites you visit while you are logged on to Facebook on your computer or phone and additional information from third-party companies (Castillo, 2017).

Voorveld et al., (2018) did a study where they looked at the differences between the social media platforms with a focus on advertising engagement. They found that each digital platform has different strengths and weaknesses and that the dimension of negative emotion connected to advertising was highest for YouTube and Facebook (Voorveld, Van Noort, Muntinga, & Bronner, 2018). The advertisements on YouTube are unavoidable, and the researchers believe this to be the reason why there are negative emotions connected to those advertisements (Voorveld et al., 2018). On the other hand, advertisements on Instagram is experienced as more entertaining compared to the other platforms (Voorveld et al., 2018). Furthermore, Voorveld et al. (2018) found that engagement is highly related to advertising evaluations and that the relationship is highly dependent on the social media platform. Each platform includes different experience dimensions which affect the consumers’ evaluation of the advertisement (Voorveld et al., 2018). The different social media platforms should, therefore, be studied individually and not as an umbrella concept (Voorveld et al., 2018).
2.3 Privacy

Privacy is defined as “the claim of an individual to determine what information about himself or herself should be known to others” (Westin, 2003). Literature separates physical privacy and information privacy where the former concern physical access to an individual’s private space and the latter concern access to an individual’s personal information (H. Jeff Smith, Dinev, & Xu, 2011). We will use the term privacy in reference to information privacy hereafter, as that is our main focus.

2.3.1 Social media and privacy

Tucker (2014) investigated how internet users’ perception of control over their personal information affects how likely they are to click on online advertising on social media. He found that strengthening privacy controls can minimize customer reactance as it gives the consumer perception of control (Tucker, 2014). Tucker (2014) also reveals how privacy concerns can lead to reactance, which means that consumers will resist the advertisements even if they find them appealing.

Warner-Søderholm et al. (2018) performed a study where they found significant differences in the levels of trusting behavior among different gender, ages, preferences of social media, and the use of social media (Warner-Søderholm et al., 2018). Furthermore, they found that younger females who were heavy users of social media were more likely to trust the content presented (Warner-Søderholm et al., 2018).

According to Facebook’s founder Mark Zuckerberg, people are over time becoming increasingly more comfortable sharing information (Kirkpatrick, 2011). Additionally, he believes that age impacts how intrusive you find Facebook’s exposure (Kirkpatrick, 2011). Enclosed in this is the factor that youths care less about privacy and, thus, the protection of it (Kirkpatrick, 2011). Furthermore, Malik, Hiekkanen, Dhir, and Nieminen (2016) found users who are more active on social network sites are less sensitive to privacy concerns. The researchers suggest that knowledge regarding expectations and use of privacy settings
contribute to increasing trust (Malik, Hiekkanen, Dhir, & Nieminen, 2016). This is consistent with prior literature suggesting that users fail to utilize the privacy settings provided and disclose sensitive information without intention (Acquisti et al., 2006; Fogel & Nehmad, 2009; Hargittai, 2010).

2.3.2 Privacy calculus

Research reveals that consumers obtain a positive attitude towards the sharing of personal information in social media if the advertisements they are provided with are more relevant (Selnes & Staude, 2017). This is related to the privacy calculus model, which is a framework created for analyzing the trade-offs between privacy risks and perceived benefits (Sun, Wang, Shen, & Zhang, 2015). Privacy risk is defined as “the degree to which an individual believes that a high potential for loss is associated with the release of personal information to a firm” (N. Malhotra, Kim, & Agarwal, 2004). Perceived benefits from the social platform and privacy risks from the same platform impact the intention of information disclosure (Sun et al., 2015). An individual calculates the risk by assessing the possibility and perceived severity of negative consequences related to the potential loss of control over personal information (H. Jeff Smith et al., 2011).

The perceived risks are associated negatively with the disclosure of information opposite to the perceived benefits, which is positively associated (Sun et al., 2015). For instance, a person’s need for entertainment or social relationships can outweigh the observed risk of disclosing personal data (Kokolakis, 2017). Additionally, the negative effects of perceived risk can decrease purchase intention, intention to disclose personal information, and increase privacy concerns (H. Jeff Smith et al., 2011). On the other hand, the privacy benefits of information disclosure have been identified to include social adjustment benefits, personalization, and financial rewards (H. Jeff Smith et al., 2011). The value of personalization can override privacy concerns as it is found to be almost two times more influential when evaluating whether to disclose personal information (H. Jeff Smith et al., 2011). Research also reveals that consumers are more likely to share personal information in exchange for personalization benefits (H. Jeff Smith et al., 2011; T. B. White, 2004).
2.4 Personalization

Personalization can be defined as “a specialized flow of communication that sends different recipients distinct messages tailored to their individual preferences or characteristics” (T. White, Zahay, Thorbjørnsen, & Shavitt, 2008). Personalized service offers can be developed by gathering data about customers online behavior and performed through targeted advertisements matching consumers’ interests (Aguirre, Mahr, Grewal, de Ruyter, & Wetzels, 2015; Bleier & Eisenbeiss, 2015). When the level of personalization increases, service relevance, and customer adoption will typically increase as well (Aguirre et al., 2015).

However, personalization can evoke privacy concerns as an increased sense of vulnerability and feeling of manipulation (Aguirre et al., 2015; Bleier & Eisenbeiss, 2015). This can, in turn, lower the adoption rates (Aguirre et al., 2015).

A study by Aguirre et al. (2015) investigates personalization issues and find the firm’s strategy for collecting information from social media sites crucial for determining how customers react to personalized advertising online. The participants exhibit a greater click-through intention when the firm engage in overt information collection in order to create more personalized advertisements, in contrast to when the information is collected covertly (Aguirre et al., 2015). This reflects that consumers experience a feeling of vulnerability when firms undertake covert information collection strategies (Aguirre et al., 2015). Further, they find that trust-building marketing strategies can diminish the negative effect (Aguirre et al., 2015). The negative effect of covert data collection can also be mitigated when personalized advertisements appear on a trustworthy website (Aguirre et al., 2015). Likewise, Bleier and Eisenbeiss (2015) found that trust is an important moderator when measuring click-through rates from personalized advertising. The rate increases by 27% when personalization has a higher depth and are more closely tailored to their consumers’ previous online shopping behaviors (Bleier & Eisenbeiss, 2015). In contrast, the click-through rates for the less trusted retailer decreased by 46% with a higher depth of personalization (Bleier & Eisenbeiss, 2015).
2.4.1 Intrusiveness

Van Doorn and Hoekstra (2013) investigated the trade-off between personalized advertisements and the demand for the required personal data in order to do so. The researchers found that consumers’ sense of intrusiveness is affected when companies use personal information with greater distinctiveness (Doorn & Hoekstra, 2013). The feeling of intrusiveness can to some degree be reduced by the positive effects of advertisement fit but only with low levels of personalization (Doorn & Hoekstra, 2013). Higher degrees of personalization increase levels of intrusiveness, which negatively affect purchase intention (Doorn & Hoekstra, 2013).

White et al. (2008) found that consumers experience personalization reactance when the firm has not explicitly justified the use of the consumers’ personal characteristics and they are faced with highly personalized messages. However, the researchers also found that higher perceived utility will make justification for the personalization less important (T. White et al., 2008). Although marketers intend it to be otherwise, consumers may perceive a highly personalized message as too personal and intrusive (T. White et al., 2008). White et al. (2008) define ‘too personal’ as communication that is “extending beyond friendly recognition to suggest an inappropriate level of familiarity with consumers’ preferences and behavior”.

2.5 The conceptual model

The Ducoffe (1995) model serves as the base upon which the model for our study is built (see Figure 1). However, the Ducoffe (1995) model is extended by replacing the irritation variable for the two variables: disruptiveness and intrusiveness. We find these two variables to be more suitable for attitudes towards advertising on social media.
Informativeness

As mentioned earlier, Sarkar & Chowdhury (2017) stated that informativeness is consumers’ perceived satisfaction of product information offered in the advertisements and is used to intrigue the consumer and increase the relevance of an advertisement. This is further supported by Haghirian et al. (2005) who found the level of informativeness provided to affect consumers perception of the advertisement itself. Selnes and Staude (2017) found consumers to obtain a positive attitude towards the sharing of personal information in social media if the ads are more relevant. Service relevance will also typically increase when the level of personalization increases (Aguirre et al., 2015). We, therefore, anticipate that the higher perceived informativeness in the advertisement, the more positive attitude towards advertising on Instagram and Facebook.

Hypothesis 1: The more informative advertising, the more positive attitude towards advertising in the channel.
Entertainment

If the advertisement is perceived pleasant or likable it is thought to have a positive impact on attitude towards the brand and advertisements (Robert H Ducoffe, 1996). Sarkar and Chowdhury (2017) supported Ducoffe’s (1995) statement that entertainment plays the greatest role for overall attitude towards advertisements. We, therefore, anticipate that the more entertaining the advertisements is, the more positive attitude towards advertisements on Instagram and Facebook.

Hypothesis 2: The more entertaining advertising, the more positive attitude towards advertising in the channel.

Disruptiveness

The advertisements on YouTube and Facebook are unavoidable, and Voorveld et al. (2018) believe this to be the reason why negative emotion is connected to those advertisements. On the other hand, Evans et al. (2017) found influencer advertising on Instagram to not trigger advertising recognition, and we anticipate that this will be the same for regular advertising on Instagram. Furthermore, Pelsmacker and Van der Bergh (1999) found too much advertising to be perceived as irritating in addition to frequent exposure and repetition. We anticipate that higher perceived quantity of advertisements will result in a more negative attitude towards advertisements as disruptive advertisements are proven to be perceived more negatively.

Elliott and Speck (1998) found advertisements to be perceived as clutter if they were disrupting the consumers when they were heavily involved with the media. Moore et al. (2018) found advertisements before videos to be perceived as annoying. Elliott and Speck (1998) found that advertisements were perceived as less clutter when they match the content on the platform. Perceived disruptiveness and clutter can lead to irritation which can decrease the general effectiveness of advertising (D. A. Aaker & Bruzzone, 1985). Therefore, we anticipate that more disruptive advertising will have a negative effect on attitude towards advertising.

Hypothesis 3: The more disruptive advertising, the more negative attitude towards advertising in the channel.
Intrusiveness

According to White et al. (2008), consumers may perceive highly personalized advertising as too personal as it shows an inappropriate level of familiarity with the consumers’ preferences and behavior. We, therefore, hypothesize that advertisements perceived as intrusive will have a negative effect on attitudes towards advertising.

Hypothesis 4: The more intrusive advertising, the more negative attitude towards advertising in the channel.

3.0 Methodology

The present study conducted a quantitative study as this is a relevant research design when the purpose is to describe psychological constructs (N. K. Malhotra, 2010, p. 106). This provides the advantage of collecting substantial data quantities in a short amount of time in a highly economical way (N. K. Malhotra, 2010, p. 171; Saunders, Lewis, & Thornhill, 2009, p. 144). Additionally, we chose a within-subjects design in order to be able to compare participants’ attitudes towards Instagram and Facebook (N. K. Malhotra, 2010, p. 548). Since we planned to run a multiple linear regression, it was important to have at least five times as many respondents as variables (De Pelsmacker, Van Kenhove, Janssens, & Wijnen, 2008, p. 140). We had 13 independent variables and one dependent for each of the mediums and, therefore, in need of at least 70 respondents. We ended up with 246 respondents after deleting four respondents with a large number of missing variables.

3.1 Scale development

Attitude towards advertising cannot be measured directly as opposed to factual characteristics. We, therefore, adopted scales from previous studies as these have proven reliability and validity. The survey was composed of seven sections and was multilingual. That is, the participants had the opportunity to choose between either Norwegian or English in order to minimize misunderstandings as a result of language barriers (Kapborg & Berterö, 2002). The instrument used for the
collection of data was a seven-point Likert scale questionnaire from strongly agree to strongly disagree. All participants were presented with the same questionnaire (see Appendix 1). However, the questions for Facebook and Instagram were randomly rotated (see Figure 2) to prohibit order bias, which could potentially damage the validity of the scales (Ferber, 1952).

To ensure higher levels of internal reliability a multi-item scale was used (Robert H Ducoffe, 1996). Within the first section, respondents ‘general attitude towards advertisements’ was measured with a four-item scale modified from Schlosser, Shavitt, and Kanfer (1999) and Shavitt, Lowrey, and Haefner (1998). Next, ‘general privacy concerns’ was measured by a single construct modified from Smith, Milberg, and Burke (1996). To reduce measurement error and increase reliability, we measured general attitude towards Facebook and Instagram on the mean score of three bipolar evaluative scales developed by Gardner (1985) as a measure of brand attitude.
The second part of the questionnaire included thirteen items, which contained informativeness, entertainment, disruptiveness, and intrusiveness. These items were all measured twice in order to measure the same concepts for both Instagram and Facebook individually. Similar to Ducoffe (1995, 1996) respondents were asked to state their answers to the statements by considering their perception of advertising in general, not a single advertisement or advertising for a particular product. Informativeness was measured with the scale adapted from Ducoffe (1995, 1996) and one item modified from Blanco, Blasco, and Azorín (2010). The concept was additionally supplemented with the question ‘advertisements on Instagram/Facebook are clearly targeted towards my interests and needs’. Furthermore, entertainment was measured with the scale modified from Ducoffe (1995, 1996), Tsang, Ho, and Liang (2004), and Blanco, Blasco, and Azorín (2010).

The measurement items for disruptiveness was adopted from Ducoffe (1995, 1996) and further supplemented with the question ‘I really dislike advertisements on Instagram/Facebook because they are unavoidable’. Next, intrusiveness was measured by a modified scale adapted from Edwards, Li and Lee (2002), Mooradian (1996), and Doorn and Hoekstra (2013). Intrusiveness was additionally supplemented by the question ‘advertisements on Instagram/Facebook creeps me out’.

The last section of the survey contained five items in total. To measure time spent on the two social media platforms one item modified from Roberts (2010) and Debatin, Lovejoy, Horn, and Hughes (2009) was utilized. A nominal scale was used for the collection of the respondents’ demographic data such as gender, education, and profession. Age was measured at a ratio level (De Pelsmacker et al., 2008, p. 2). Finally, after answering the demographic question section, respondents were directed to a window with a text thanking them for completing the survey.

3.2 Pilot study

We performed a pilot study with 20 respondents to see whether there was a problem with the questionnaire design in order to exclude any potential obstacles
(Saunders et al., 2009, p. 394). This provided us with an indication of the questionnaire’s face validity, as to whether it appears to make sense for the respondents (Saunders et al., 2009, p. 394). In the light of the responses, we rearranged certain questions, parted the main blocks into several smaller blocks to improve the response simplicity, and added a progress bar. No questions appeared to be in need of paraphrasing or alteration.

3.3 Data Collection

A self-report survey was conducted at the end of May 2019. In order to recruit respondents, we availed snowball sampling, which is a non-probability convenience sampling method (Goodman, 1961). This method was chosen due to lack of resources as it is a highly economical way of collecting a large amount of data from a sizable sample in a short amount of time (Saunders et al., 2009, p. 144). It does, however, not provide results that are generalizable outside of the sample (Saunders et al., 2009, p. 213).

As a starting point, we administered the survey through our personal Facebook accounts, asking friends and acquaintances to respond and distribute it further. In this way, we attempted to obtain respondents with a broader age variation and backgrounds to allow for natural variation in our sample. Thus, improving validity and reliability. Additionally, utilizing Facebook as a platform for distribution assured obtaining respondents who frequently avail Facebook. We posted the survey with a text asking for respondents who use both Facebook and Instagram somewhat regularly. This decreased the representativity of the respondent’s population. However, respondents who are not familiar with the platforms would not be able to answer questions regarding advertisements on these platforms.

4.0 Data analysis

4.1 Missing value analysis and data cleaning

Before analyzing the data, we performed a data cleaning where we looked for missing values and multivariate outliers. We deleted four respondents due to a
large number of missing variables. In accordance with De Pelsmacker et al. (2008), we used the value ‘99’ to indicate the answers that were not completed, as it does not occur amongst the possible answers in the survey (De Pelsmacker et al., 2008, p. 13). We indicated the ‘99’ value in explicitly in SPSS as a ‘discrete missing value’ to make sure it would not be treated as a normal value. Finally, we used Mahalanobis distance to detect multivariate outliers. One respondent was removed due to a large Mahalanobis distance.

4.2 Reliability and validity

We used Cronbach’s Alpha to measure internal consistency reliability (Saunders et al., 2009, p. 374). Corrected item total correlation revealed that the ‘targeted’ variable within informativeness for Instagram had a somewhat weak score. Followingly, the score of Cronbach's Alpha could increase from .80 to .82 if the item was removed. However, we have chosen to keep the ‘targeted’ variable. We found the same problem with the ‘targeted’ value for Facebook where the Cronbach's Alpha value could increase from .77 to .79. We chose to keep the ‘targeted’ item for Facebook informativeness as well.

Regarding entertainment, Cronbach's Alpha for Instagram was .89 and .84 for Facebook. The corrected item total correlation had no weak loadings for either Instagram or Facebook. Disruptiveness had a Cronbach's Alpha score of .73 for both Instagram and Facebook. Everything below .7 is considered a low score and since .73 is close to this value we chose to run the two questions explaining disruptiveness independently. Finally, intrusiveness had a Cronbach's Alpha of .88 for Instagram and .86 for Facebook.

4.3 Data Characteristics

We used descriptive statistics and graphs in SPSS in order to gain insight and explore the data. This was to check in case any gender or age groups were overrepresented and in order to explore whether age and gender had an impact on attitudes. The gender of our participants is distributed perfectly equally with 50% males and 50% females. Almost half of our participants (48%) are the age 25 or under and the second biggest group makes up 30% of our respondents and are
between the ages of 26 and 35. 4.9% of our respondents are between 36 and 45 years old and 4.5% are between the ages of 46 and 55. The last group of respondents are over the age of 56 and makes up 12.6% of our participants. Around half of the participants (53.3%) are students, followed by full-time employees at 38.6% and part-time employees at 6.1%. Only 1.6% of our participants are unemployed and 0.4% are military.

The biggest portion of our participants uses both Instagram and Facebook more than five times per day. However, Instagram users are considerably more active (47.9%) than Facebook users (34.6%). Following, around 15% use both Instagram (15.9%) and Facebook (15.5%) four or five times per day. Compared to Instagram (14.6%), Facebook (28.5%) has almost double the percentage of users clicking in two or three times a day. The same is true for once-a-day users, 15% of participants say they use Facebook once a day and only about 8% say the same for Instagram. Further, about 5% of participants say they use Instagram (4.9%) and Facebook (5.3%) a few times a week. Lastly, participants who use Instagram and Facebook less than once a week account for respectively 8% and 1.62%.

4.4 Factor analysis

In order to reduce the number of variables related to the measures of informativeness, entertainment, and intrusiveness we conducted a factor analysis. The purpose was to reduce the number of variables into one simple factor with little information loss (De Pelsmacker et al., 2008, p. 245). The variables were all measured on the same 7-point Likert scale and due to the ‘assumption of equal appearing intervals,’ it is common to treat Likert scales as an interval measure (De Pelsmacker et al., 2008). Further, as stated in the methodology section, our sample size was more than ten times the number of variables and the requirement regarding the number of respondents is met (n=246). Moreover, the variables must be sufficiently correlated with each other in order to perform a factor analysis (N. K. Malhotra, 2010). We, therefore, used the formal statistics Bartlett's test of sphericity and Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy (MSA) to see if this was the case.
We ran a factor analysis for Instagram Informativeness and found that the KMO is higher than .5 (=.760) and the value is, therefore, acceptable (De Pelsmacker et al., 2008, p. 255). Bartlett's test of sphericity is significant ($p$<.001), indicating that there is a high enough degree of correlation. The three assumptions were, therefore, satisfied, making a factor analysis appropriate (De Pelsmacker et al., 2008, p. 255). Similarly, we find a KMO (=.837) for Instagram entertainment and (=.709) for Instagram intrusiveness. Both had significant Bartlett's test of sphericity ($p$<.001). Factor analysis is, therefore, also applicable to these items.

Regarding Facebook, we found Informativeness for Facebook to have a KMO of (=.747), Entertainment (=.812) and Intrusiveness (=.721). They all had significant Bartlett's test of sphericity ($p$<.001). Thus, factor analysis is appropriate for all of them.

4.5 Linear regression analysis

We conducted a multiple regression in order to examine the relationship between one variable and several others (N. K. Malhotra, 2010, p. 560).

**Instagram**

By inspecting the model summary we can see that 54.3% of the variation in attitude towards advertisements on Instagram can be explained by informativeness, entertainment, disruptiveness and intrusiveness (R square=.543). However, since the statistics readjust for the number of independent variables in the model it is more suitable to look at the adjusted R square (De Pelsmacker et al., 2008, p. 169). Consequently, 51% of the variation in attitude towards advertisements on Instagram can be explained by the independent variables. The ANOVA output confirms the overall significance of the model, $F$(15, 220)=16.262, ($p$<.001). To that end, we can confirm that adjusted r-square do not equal zero and continue to interpret the coefficients (De Pelsmacker et al., 2008, p. 169).

Normality assumptions are satisfied. The distribution of the residual follows the shape of the normal curve (see Appendix 2) and there appears to be a close fit between the dotted line and the 45-degree curve (see Appendix 3), which indicates normality (De Pelsmacker et al., 2008, p. 155). With a further test of
normality, we can see from Table 1 that both the Kolmogorov-Smirnov test and the Shapiro-Wilk test is significant due to their significant values greater than .05. The standardized residuals are, therefore, confirmed normally distributed (De Pelsmacker et al., 2008, p. 157).

Table 1. Test of Normality Instagram

<table>
<thead>
<tr>
<th></th>
<th>Kolmogorov-Smirnov</th>
<th>Shapiro-Wilk</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Statistic df Sig.</td>
<td>Statistic df Sig.</td>
</tr>
<tr>
<td>Standardized Residual</td>
<td>.035 221 .200</td>
<td>.995 221 .706</td>
</tr>
</tbody>
</table>

* a. Lilliefors Significance Correction

We investigated the variables for multicollinearity by finding out whether variables can be explained by the other variables in the analysis (Burns & Burns, 2008). A multicollinearity problem is present if there is a correlation between two variables (De Pelsmacker et al., 2008, p. 161). The VIF data suggests that multicollinearity is not a problem as the VIF scores are well below 10 for each variable (Burns & Burns, 2008, p. 388). The assumption regarding multicollinearity is, therefore, met.

The significant variables that explain attitude towards advertising on Instagram are general attitude towards advertising, quantity, unavoidable, and informativeness (see Appendix 4). Hypothesis 1 and 3 is followingly supported. However, we do not find any significant support for hypothesis 2 and 4 in this regression. We interpret the standardized Beta coefficients when testing the independent variables’ effect on the dependent variable. When holding the other variables constant, we can see that one unit increase in “general attitude towards advertising” will increase attitude towards advertisements on Instagram by \( \beta = .217 \) (\( p = .001 \)). Further, one unit increase in “quantity” will decrease attitude towards advertisements on Instagram by \( \beta = -.236 \) (\( p = .001 \)) when holding the other variables constant. When holding the other variables constant, we can see that one unit increase in “unavoidable” will decrease attitude towards advertisements on Instagram by \( \beta = -.182 \) (\( p = .010 \)). When holding the other variables constant, we can see that one unit increase in “Informativeness” will increase attitude towards advertisements on Instagram by \( \beta = .221 \) (\( p = .005 \)).
To further interpret our findings, we ran a linear regression on the informativeness variable which seems to be the second most important variable to explain attitudes towards advertising on Instagram. All the variables are significant, and we see that “timely” is the most important variable to explain informativeness with a Standardized $\beta = .370$. “Highly relevant” is the second most important variable with $\beta = .221$ and “targeted” explains the least with $\beta = .178$.

**Facebook**

In a similar way as with the interpretation of the previous model summary, we inspect the adjusted R square and find that 41.3% of the variation in attitude towards advertisements on Facebook can be explained by the variables informativeness, entertainment, disruptiveness, and intrusiveness (Adjusted R square=.413). The ANOVA output confirms the overall significance of the model, $F(15, 225)=11.552, p<.001$.

Normality assumptions are satisfied. The distribution of the residual follows the shape of the normal curve (see Appendix 5) and there appears to be a close fit between the dotted line and the 45-degree curve (see Appendix 6), which indicates normality (De Pelsmacker et al., 2008, p. 155). With a further test of normality, we can see from Table 2 that the Kolmogorov-Smirnov test is significant due to its significant value greater than .05. The standardized residuals are, therefore, confirmed normally distributed (De Pelsmacker et al., 2008, p. 157).

**Table 2. Test of Normality Facebook**

<table>
<thead>
<tr>
<th>Tests of Normality</th>
<th>Kolmogorov-Smirnov</th>
<th>Shapiro-Wilk</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Statistic</td>
<td>df</td>
</tr>
<tr>
<td>Standardized Residual</td>
<td>.057</td>
<td>226</td>
</tr>
</tbody>
</table>

We investigated the variables for multicollinearity by finding out whether variables can be explained by the other variables in the analysis (Burns & Burns, 2008). If there is a present of a high correlation between two variables, a multicollinearity problem is present (De Pelsmacker et al., 2008, p. 161). The VIF
data suggests that multicollinearity is not a problem as the VIF scores are well below 10 for each variable (Burns & Burns, 2008, p. 388). The assumption regarding multicollinearity is, therefore, met since the highest VIF value is 2.065.

We can see that the significant variables that explain attitude towards advertising on Facebook are general attitude towards advertising, general personalization concern, quantity, informativeness, and entertainment (see Appendix 7). Hypothesis 1, 2 and 3 is followingly supported for Facebook attitude. However, we do not find any significant support for hypothesis 4 in this regression. We interpret the standardized Beta coefficients when testing the independent variables’ effect on the dependent variable. When holding the other variables constant, we can see that one unit increase in “general attitude towards advertising” will increase attitude towards advertisements on Facebook by $\beta = .165$ ($p = .014$). Further, one unit increase in “general personalization concern” will decrease attitude towards advertisements on Instagram by $\beta = -.169$ ($p = .008$). One unit increase in “quantity” will decrease attitude towards advertisements on Instagram by $\beta = -.135$ ($p = .036$). When holding the other variables constant, we can see that one unit increase in “informativeness” will increase attitude towards advertisements on Instagram by $\beta = .288$ ($p < .001$). Finally, we can see that one unit increase in “entertainment” will increase attitude towards advertisements on Instagram by $\beta = .157$ ($p = .031$).

To further interpret our findings, we ran a linear regression on the informativeness variable which seems to be the most important variable to explain attitudes towards advertising. All the variables are significant, and we see that “timely” is the most important variable to explain informativeness $\beta = .293$. “Highly relevant” is the second most important variable with $\beta = .227$ and “targeted” explains the least with $\beta = .181$.

When running a regression on the entertainment variable we found that the variable “personalization” is the most important item with $\beta = .304$, and that “engaging” is almost as important as important with $\beta = .301$. The variable that is least important is “aesthetically enjoyable” with $\beta = .173$. 
4.6 Independent t-test

In order to compare Instagram and Facebook, we chose to run independent t-tests with a Factor where Instagram is 1 and Facebook 2. By performing an independent sample t-test we were able to see if the attitude towards advertisements on Instagram were significantly different from the attitude towards advertisements on Facebook. Firstly, we looked at the ‘Levene’s test of equality of variances’ to find out if the group variances were equal (De Pelsmacker et al., 2008, p. 66). They do not have the same variance, \( F = 19.366 \) \((p < .001)\) and the null hypothesis of equal variances can be rejected. The t-value is, therefore, read from the output for equal variances not assumed. There is a highly significant difference in attitudes towards ads on Instagram and Facebook \((p < .001)\). The mean scores indicate that the respondents have a more positive attitude towards advertising on Instagram \((M = 3.64)\) than Facebook \((M = 2.92)\) supported at a 99.9% significance level.

We also ran an independent sample t-test with informativeness for Instagram and Facebook as the test variable. Further, a factor indicating 1 for Instagram and 2 for Facebook as the grouping variable, we found that equal variances were assumed \( F = .555 \) \((p = .457)\). We interpret that there is a significant difference in ‘informativeness’ for Instagram and Facebook \((p = .001)\). Our findings indicate that the respondents perceive Instagram to be more informative \((M = 3.69)\) than Facebook \((M = 3.28)\). Thus, we can conclude that advertisements on Instagram are perceived to be more informative than advertisements on Facebook.

We did a similar test with entertainment to look for differences between Instagram and Facebook. By looking at the ‘Levene’s test of equality of variances’ we see that equal variances are not assumed, \( F = 11.332 \) \((p = .001)\). The output for equal variances not assumed is used and \((p < .001)\). There appears to be a highly significant difference in ‘entertainment’ for Instagram and Facebook, and the findings indicate that respondents perceive Instagram \((M = 3.87)\) to be more entertaining than Facebook \((M = 2.87)\).

Quantity was also tested with an independent samples t-test and by looking at the ‘Levene’s test of equality of variances’ we can see that this is insignificant \( F = .144 \) \((p = .705)\). Equal variances are assumed and there is a highly significant difference
in ‘quantity’ for Instagram and Facebook \( (p<.001) \). The findings indicate that respondents perceive Facebook \( (M=5.30) \) to have a higher amount of advertisements than Instagram \( (M=4.77) \).

By interpreting the ‘Levene’s test of equality of variances’ we see that equal variances are not assumed \( F=5.482 \ (p=.020) \). Further, we can see that ‘unavoidable’ for Instagram and Facebook differ significantly \( (p=.003) \). The means help explain that respondents perceive advertising on Facebook \( (M=4.77) \) significantly more unavoidable than ads on Instagram \( (M=4.33) \). Thus, these findings indicate that Instagram is perceived as less disruptive than Facebook, measured by quantity and unavoidable.

Intrusiveness is measured with three questions and followingly computed into one variable to look at the differences between Instagram and Facebook. By looking at the ‘Levene’s test of equality of variances’ we see that equal variances are assumed, \( F=.135 \ (p=.713) \). There is a highly significant difference in ‘intrusiveness’ for Instagram and Facebook \( (p<.001) \). Respondents appear to find Facebook \( (M=4.57) \) significantly more intrusive than Instagram \( (M=4.07) \). We can, therefore, conclude that advertising on Facebook is being perceived as more intrusive than advertising on Instagram.

4.7 Pearson correlations

We decided to run a few correlation tests to look for other elemental connections in our dataset.

We found a significant positive correlation between Instagram usage and age at a \( p<.001 \) level. The younger respondents use Instagram more than older respondents. However, no correlation was found between age groups and Facebook usage.

A correlation test between privacy concerns and age revealed a significant difference at a \( p=.001 \) level. The older consumers seem to be more concerned about their personal privacy.
We found support for the correlation between age and attitude towards advertising at a $p=.002$ level. The younger respondents tend to like advertisements in a greater deal than the older respondents.

Finally, there is a strong correlation between the perceived amount of advertising and attitude towards advertising at a $p<.001$ level. This correlation is strongly significant both for Facebook and Instagram.

4.8 Summary of results

*Table 3. Summary of results*

<table>
<thead>
<tr>
<th>Hypothesis</th>
<th>Conclusion</th>
</tr>
</thead>
<tbody>
<tr>
<td>H1</td>
<td>The more informative advertising, the more positive attitude towards advertising in the channel.</td>
</tr>
<tr>
<td>H2</td>
<td>The more entertaining advertising, the more positive attitude towards advertising in the channel.</td>
</tr>
<tr>
<td>H3</td>
<td>The more disruptive advertising, the more negative attitude towards advertising in the channel</td>
</tr>
<tr>
<td>H4</td>
<td>The more intrusive advertising, the more negative attitude towards advertising in the channel</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Variables</th>
<th>Conclusion</th>
</tr>
</thead>
<tbody>
<tr>
<td>Informativeness</td>
<td>Instagram is perceived more informative than Facebook</td>
</tr>
<tr>
<td>Entertainment</td>
<td>Instagram is perceived more entertaining than Facebook</td>
</tr>
<tr>
<td>Disruptiveness</td>
<td>Instagram is perceived less disruptive than Facebook</td>
</tr>
<tr>
<td>Intrusiveness</td>
<td>Instagram is perceived less intrusive than Facebook</td>
</tr>
<tr>
<td>General attitude towards advertising</td>
<td>General attitude towards advertising is perceived more positive for Instagram than Facebook</td>
</tr>
</tbody>
</table>

5.0 Discussion

The primary objective of the present study is to provide insights into consumers’ different attitudes towards advertisements on Instagram and Facebook. Overall, our results reveal that Instagram is perceived more positively than Facebook, both
when comparing general attitude towards advertising and all the four variables: informativeness, entertainment, disruptiveness, and intrusiveness.

The results from the analysis provide strong evidence that informativeness is one of the most important factors to explain attitude towards advertising on a social media platform. This supports the statement from Saxena and Khanna (2013) regarding how information is the primary reason why consumers approve of advertising. In our study, we found advertising on Instagram to be perceived as more informative than advertising on Facebook. This might be because advertisements on Instagram are personalized using consumers’ own engagement on the platform. Facebook, on the other hand, collects data from all site’s consumers visit while logged on to Facebook. These advertisements might, therefore, be perceived as too personalized and can, in turn, make consumers perceive the advertisements as less informative. This can be explained by reactance, concerning how consumers will resist an advertisement they find appealing because of privacy concerns (Tucker, 2014). Following, we found general personalization concerns to be the second most important item for explaining attitude towards advertising on Facebook.

The variable that has the biggest impact on informativeness is timeliness. Timeliness concerns providing the right information at the right time (Bell, 2019; Zingaro, 2018). For advertisers to be perceived as informative, they need to be aware that it is equally important what information they deliver as when they deliver it. This concern more than simply providing Christmas advertisements in December, but also staying on top of current trends and other focal points for the target group. Above all, an advertisement is usually not relevant for the consumer if it lacks timeliness: Christmas advertisements are not that relevant after Christmas Eve.

Regarding attitude towards advertising on Instagram, quantity was the item with the greatest impact. Respondents’ attitudes towards advertising decrease significantly if they perceived the advertisement quantity as high. On the other hand, quantity was not as significant for Facebook. This might be reasoned in Elliot and Speck’s (1998) finding, that level of experience with a medium makes consumers more used to the advertisement on said medium, and perceive it as less
clutter and quantity. Thus, the fact that Facebook started advertising six years before Instagram might have made consumers more used to Facebook advertising.

It is important to avoid the perception of high quantities, as too much advertising on the platform will provoke more negative feelings as the advertisements can overshadow the users preferred posts and depersonalize their feed (Pelsmacker & Van den Bergh, 1999; Selnes & Staude, 2017). Our findings indicate that Instagram users prefer advertisements that are not too distinct and, therefore, blend in amongst the other contents. This is consistent with the findings from Evans et al. (2017) concerning how influencer advertising persuades customers without triggering advertising recognition. Pelsmacker and Van den Bergh (1999) found that a reason newspaper advertisement induced little irritation was that respondents could skip them if they wanted to and we believe this to be a further reason for Instagram’s quantity perception. On the other hand, Facebook has advertisements in its videos that are impossible to skip. What’s more is that repeat advertising is said to be the main reason for advertising irritation (Pelsmacker & Van den Bergh, 1999). This might be a reason why we found respondents to perceive Instagram as having a significantly lower advertisement quantity than Facebook.

The present study provides results that are conflicting with Ducoffe (1995; 1996) and Taylor et al. (2011) who found entertainment to be one of the major, positive influences of attitude towards advertising. Our study did not support these results as entertainment did not seem to be a significant variable for attitudes towards advertising on Instagram. However, entertainment is significant for describing attitudes towards advertising on Facebook. It is, therefore, surprising that we, equivalent to Voorveld et al. (2018), found that Instagram is experienced as more entertaining than Facebook. This might be because consumers expect Instagram to be entertaining, and they, therefore, take entertainment on Instagram advertisements for granted when developing attitudes towards advertising. Further, it is important to note that an advertisement is not fully satisfying if it is full of information yet lacks entertainment (Saxena & Khanna, 2013).

Zuckerberg believes that age impacts how intrusive you find the exposure on Facebook (Kirkpatrick, 2011). We find support for this due to a strongly
significant positive correlation between privacy concerns and age. Older respondents seem to be more concerned about their personal privacy than younger respondents. This might be because young adults today are the first digital natives and have more experience with social media platforms than older consumers (Serazio, 2015). Further, younger respondents are found to use Instagram more than older respondents. Warner-Søderholm et al. (2018) support these findings. They found that younger consumers who were heavy users of social media are more likely to trust the content presented on social media (Warner-Søderholm et al., 2018).

Furthermore, we find support for Selnes and Staude’s (2017) statement, that Facebook ads are perceived as more relevant for those who use it more. This is true for both Facebook and Instagram. It is natural to assume that a higher user frequency provides the targeting technologies with more information to create more accurate personalized advertisements. It is, therefore, plausible that a benefit of using Instagram and Facebook more is that you are provided with more relevant advertisements. This is congruent with the privacy calculus paradox where personalized, relevant information is provided in the exchange of personal information (Sun et al., 2015).

5.1 Managerial implications

The present study supplies important new insight regarding a topic that is both important for academics and managers. However, all conclusions drawn from this study have to be considered unrepresentative outside the sample. Managers should focus on the following four aspects.

**Informativeness**

There is evidence that informativeness has the biggest impact on attitude towards advertising on a social media platform. We advise managers to focus on timeliness to make advertisements more informative by focusing on what information they deliver and when they provide it.

**Target groups**

Managers need to focus on developing more precise and nuanced target groups in
order to provide targeted advertisements that are relevant to the consumer. Personalization on an individual level might, however, be perceived as uncomfortable and should be kept to a minimum.

**Quantity**
In order to avoid irritation, advertisers should focus on how often they repeat messages and how many different platforms are used to distribute the same advertisement. As advertisers have little control over the general advertising amount on the different platforms, they have to control their own distribution and restrain themselves to the most relevant platforms. This can impact perceived advertisement quantity and prevent negative perceptions towards advertisers’ own brands.

**Instagram**
Our third and final suggestion is to utilize Instagram as the main advertising platform since advertising on this platform is perceived as more informative, more entertaining, less disruptive, and less intrusive. However, managers need to be aware of how they distribute their advertisements as it needs to be seamlessly integrated into consumers’ feed and look like regular content. They must also examine their main target group and be aware that the main users of this platform are younger consumers.

5.2 Limitations and further research

**Limitations**
Like most other studies, our study also has a few limitations. We have identified three limitations. Firstly, there is a weakness regarding the sample of our study. The sample is limited even though we have some variety regarding age, occupation, and distribution of gender which contribute to strengthening our findings. We, therefore, have to display caution regarding claims of external validity. Secondly, we did not measure any specific advertisements and recognize that this could possibly affect the results. There is a chance the variables might affect consumers differently in relation to specific advertisements. Lastly, we did not consider how exogenous variables like cultural differences can influence the findings. Especially privacy concerns might be culturally dependent. In this way,
our sample might be overly homogeneous as the survey was distributed through snowball sampling, which often results in a somewhat similar background of the respondents.

*Suggestions for further research*

Our results suggest that informativeness has the biggest impact on attitude towards advertising on a social media platform. Future research might examine these results in an experimental setting, which could further exclude any external factors. As we used snowball sampling in our study and might suffer from a homogeneous sample, we suggest future research to utilize another sampling technique that will result in a more representative sample. Additionally, future research should explore other variables that affect the attitude towards advertisement on a social media channel as the adjusted R2 of this study only explained 41.3% for Facebook and 51% for Instagram of the attitudes.
6.0 References


Bell, E. (2019). How ethical is it for advertisers to target your mood? Retrieved from

https://www.theguardian.com/media/commentisfree/2019/may/05/how-ethical-is-it-for-advertisers-to-target-your-mood


Padilla, J. (2016). Timeliness is Relevance: Speed is the New Data Point of Differentiation. Retrieved from https://www.signal.co/blog/real-time-relevance/?fbclid=IwAR2Lm7xjMJ2tagq5ZwvV1sGOOn__wD-yul8bd0rYsroZvYxd3DfSbcvzkk


Differentiating Role of Platform Type. *Journal of Advertising, 47*(1), 38-54. doi:10.1080/00913367.2017.1405754


7.0 Appendices

Appendix 1: Questionnaire

**General attitudes towards advertising**

- In general, do you like or dislike advertising?

**Attitudes towards advertising on Instagram and Facebook**

- Related to Instagram, do you like or dislike advertising in general?
- To what extent do you view Instagram as good/bad, desirable/undesirable, negative/positive
- Related to Facebook, do you like or dislike advertising in general?
- To what extent do you view Facebook as good/bad, desirable/undesirable, negative/positive

**Informativeness**

- In general, advertisements are very informative

**Instagram Informativeness**

- Advertisements on Instagram supply highly relevant information on products
- Advertisements on Instagram provide very timely information on products
- Advertisements on Instagram are clearly targeted towards my interests and needs
- Advertisements on Instagram are considerably more informative than other sources of social media advertising

**Facebook Informativeness**

- Advertisements on Facebook supply highly relevant information on products
Advertisements on Facebook provide very timely information on products.
Advertisements on Facebook are clearly targeted towards my interests and needs.
Advertisements on Facebook are considerably more informative than other advertising sources.

**Entertainment**

- In general, advertisements are very entertaining.

*Instagram Entertainment*

- Advertisements on Instagram are aesthetically enjoyable and visually pleasing.
- Advertisements on Instagram are very engaging.
- Advertisements on Instagram capture my sense of what is entertaining.
- Advertisements on Instagram are considerably more entertaining than other sources of social media advertising.

*Facebook Entertainment*

- Advertisements on Facebook are aesthetically enjoyable and visually pleasing.
- Advertisements on Facebook are very entertaining.
- Advertisements on Facebook capture my sense of what is entertaining.
- Advertisements on Facebook are considerably more entertaining than other sources of social media advertising.

**Disruptiveness**

*Instagram quantity*

- There is too much advertising on Instagram.
- I really dislike advertisements on Instagram because they are unavoidable.
Facebook irritation

- There is too much advertising on Facebook
- I really dislike advertisements on Facebook because they are unavoidable

Intrusiveness

- In general, personalized advertisements on social media are an invasion of my privacy.

Instagram Intrusiveness

- Advertisers on Instagram knows too much about me
- Advertisements on Instagram are uncomfortably targeted towards me
- Advertisements on Instagram creeps me out

Facebook Intrusiveness

- Advertisers on Facebook knows too much about me
- Advertisements on Facebook are uncomfortably targeted towards me
- Advertisements on Facebook creeps me out

General privacy concerns

- In general, how concerned are you about your personal privacy?

Demographic

- How often do you use Facebook?
- How often do you use Instagram?
- Age
- Gender
- Profession

Appendix 2: Normality curve Instagram

**Charts**

![Histogram](image)

Dependent Variable: Related to Instagram, do you like or dislike advertisements in general?

Histogram

- Mean = 4.54616
- Std Dev = 0.905
- N = 221

Regression Standardized Residual

Frequency

-4 -2 0 2 4

Appendix 3: Normal P-Plot Instagram

![Normal P-Plot](image)

Dependent Variable: Related to Instagram, do you like or dislike advertisements in general?

Normal P-P Plot of Regression Standardized Residual

- Expected Cum Prob
- Observed Cum Prob
## Appendix 4: Instagram coefficients

*Coefficients*

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
</tr>
<tr>
<td>1</td>
<td>(Constant)</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>4.726</td>
<td>.779</td>
<td>6.064</td>
</tr>
<tr>
<td></td>
<td>In general, do you like or dislike advertising?</td>
<td>.229</td>
<td>.065</td>
</tr>
<tr>
<td></td>
<td>Advertisements are very informative</td>
<td>-.025</td>
<td>.069</td>
</tr>
<tr>
<td></td>
<td>Advertisements are very entertaining</td>
<td>-.053</td>
<td>.067</td>
</tr>
<tr>
<td></td>
<td>Personalized advertisements on social media are an invasion of my privacy</td>
<td>.040</td>
<td>.062</td>
</tr>
<tr>
<td></td>
<td>In general, how concerned are you about your personal privacy? GeneralAttitude_Inagram</td>
<td>-.039</td>
<td>.066</td>
</tr>
<tr>
<td></td>
<td>- There is way too much advertising on Instagram</td>
<td>.090</td>
<td>.066</td>
</tr>
<tr>
<td></td>
<td>I really dislike advertisements on Instagram because they are unavoidable</td>
<td>-.301</td>
<td>.087</td>
</tr>
<tr>
<td></td>
<td>How often do you use Instagram?</td>
<td>-.183</td>
<td>.070</td>
</tr>
<tr>
<td></td>
<td>Age</td>
<td>.003</td>
<td>.010</td>
</tr>
<tr>
<td></td>
<td>Gender</td>
<td>-.071</td>
<td>.170</td>
</tr>
<tr>
<td></td>
<td>Profession</td>
<td>.105</td>
<td>.089</td>
</tr>
<tr>
<td></td>
<td>Factor Intrusiveness Instagram</td>
<td>-.151</td>
<td>.115</td>
</tr>
<tr>
<td></td>
<td>Factor Informativeness Instagram</td>
<td>.369</td>
<td>.131</td>
</tr>
<tr>
<td></td>
<td>Factor Entertainment Instagram</td>
<td>.171</td>
<td>.142</td>
</tr>
</tbody>
</table>

Dependent Variable: Related to Instagram, do you like or dislike advertisements in general?
Appendix 5: Normality curve Facebook

![Histogram](image1)

Dependent Variable: Related to Facebook, do you like or dislike advertisements in general?

Mean = 3.42E-15
Std. Dev. = 0.966
N = 220

Appendix 6: Normal P-Plot Facebook

![Normal P-Plot](image2)

Dependent Variable: Related to Facebook, do you like or dislike advertisements in general?
Appendix 7: Facebook coefficients

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
</tr>
<tr>
<td>1</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>(Constant)</td>
<td>4.315</td>
<td>.702</td>
</tr>
<tr>
<td></td>
<td>In general, do you like or dislike advertising?</td>
<td>.145</td>
<td>.058</td>
</tr>
<tr>
<td></td>
<td>Advertisements are very informative</td>
<td>.026</td>
<td>.062</td>
</tr>
<tr>
<td></td>
<td>Advertisements are very entertaining</td>
<td>-.045</td>
<td>.061</td>
</tr>
<tr>
<td></td>
<td>Personalized advertisements on social media are an invasion of my privacy</td>
<td>-.154</td>
<td>.057</td>
</tr>
<tr>
<td></td>
<td>In general, how concerned are you about your personal privacy?</td>
<td>-.063</td>
<td>.058</td>
</tr>
<tr>
<td></td>
<td>Age</td>
<td>-.007</td>
<td>.008</td>
</tr>
<tr>
<td></td>
<td>Gender</td>
<td>-.119</td>
<td>.150</td>
</tr>
<tr>
<td></td>
<td>How often do you use Facebook?</td>
<td>-.061</td>
<td>.058</td>
</tr>
<tr>
<td></td>
<td>Profession</td>
<td>.152</td>
<td>.082</td>
</tr>
<tr>
<td></td>
<td>GeneralAttitude_Facebook</td>
<td>.055</td>
<td>.069</td>
</tr>
<tr>
<td></td>
<td>There is way too much advertising on Facebook</td>
<td>-.143</td>
<td>.068</td>
</tr>
<tr>
<td></td>
<td>I really dislike advertisements on Facebook because they are unavoidable</td>
<td>-.056</td>
<td>.069</td>
</tr>
<tr>
<td></td>
<td>Factor Intrusivenes Facebook</td>
<td>-.171</td>
<td>.092</td>
</tr>
<tr>
<td></td>
<td>Factor Informativeness Facebook</td>
<td>.406</td>
<td>.102</td>
</tr>
<tr>
<td></td>
<td>Factor entertainment Facebook</td>
<td>.227</td>
<td>.105</td>
</tr>
</tbody>
</table>

a. Dependent Variable: Related to Facebook, do you like or dislike advertisements in general?