

How does YouTube and TV ads relevance, credibility and irritation influence consumers' purchasing intention?

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ABSTRACT,

With the rise of social media users, social media platforms become more relevant to marketers, one of those platforms is YouTube. In this paper, YouTube advertising is compared to a similar traditional marketing tool, TV advertising. The comparison is based on three independent variables: advertisements relevance, credibility and irritation. Their influence on purchasing intention is measured using a regression analysis. Moreover, the effect of demographics variables in this relationship is researched. The results show that ad credibility and irritation have no significant relationship with purchase intention. However, ad relevance has a significant positive relationship with consumers' purchasing intention. Findings also display that TV advertising shows better ad credibility and relevance and for young people purchase intention than YouTube ads. As regards demographics results display that difference in gender has no influence on the four variables mentioned earlier, but there are some interesting differences between the age groups, mainly young people(16-35) score higher on most variables.

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Keywords

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1. INTRODUCTION

There are a lot of big Social Media platforms (e.g. Instagram, Facebook and YouTube), the number of users of these platforms are massively increasing every day. At this moment, there are more than 3.8 billion social media users around the globe, that is approximately 49% of the total world population (datareportal, 2020). This enormous population of Social Media users provides big opportunities and challenges for marketers. The main goal for the marketers is to target directly the right consumer (nibusinessinfo, 2020). Social media marketing is often described by the POEM model: paid, owned and earned media.

In this paper only paid media is used and it is described as “the purchase of ad inventory on a media channel or publisher site to broadcast your brand message and reach your target audiences. It is a form of digital advertising that includes sponsored content to promote a brand’s products or services” (Pereira. M., 2020) . In this paper, YouTube advertising (Paid Media marketing) are compared to TV advertising (traditional marketing). Both advertising methods are comparable, because advertisements on both platforms on which content and advertisements are displayed in video form. Comparing TV and YouTube advertising is also interesting, because YouTube is able to provide more personalized advertisements (support.google, 2020) than TV, because YouTube advertisers have more information about the consumer than TV advertisers. This personalized data enables advertisers to reach users based on their interests and demographics. Due to the fact that YouTube advertisers have more specific data about their consumers than TV advertisers, the expectation is that consumers have a more positive attitude towards YouTube than TV advertising. In order to measure whether a difference in attitude towards advertising leads to a change in customer behaviour, the variable purchasing intention is used.

1.1 Academic relevance

Social Media and online marketing are relatively new fields of research. Previous papers have focused on the attitude towards YouTube advertising, but they compared it to other social media advertising platforms like Facebook and Twitter. (Balakrishnan, Balasubramanian and Manickavasagam, 2014)

Moreover, there are also papers that measure the attitude towards advertising, nevertheless in those papers other variables are used and attitude towards advertising is not linked to purchasing intention or another variable that defines customer behaviour. (Campbell and Wright, 2008) and (Ling, Piew & Chai, 2010).

There already are some papers which compared TV and YouTube advertising, however these studies do not compare both advertising methods to purchasing intention. (Crigler, Just, Hume, Mills and Hevron, 2008)

1.2 Practical Relevance

This paper will be able to determine whether there is a difference between the attitude towards TV advertising and YouTube advertising or not and if there is a significant difference if that would lead to a difference in the intention to buy. This research could be useful for marketers, because if one of the advertising methods leads to a higher intention to buy, it will be easier for marketers to choose which advertising method to use.

1.3 Research Scope

This paper basically consists of two parts: literature review and analyzing data. The literature review encompasses the conceptualization and operationalization stages.

The literature review will be done in order to make a ‘Theoretical Framework’, this part is important by identifying and defining

the variables used in this paper. These definitions are backed by various literature resources. In Chapter 2 the very broad concept ‘the attitude towards advertising’ is split into three variables and are conceptualized. In the following Chapter all variables are operationalized based on existing statements and scales. Most important concepts and keywords that will be used are relevance, credibility, irritation and purchasing intention.

When the conceptualization and operationalization stages are finalized the questionnaire can be constructed and distributed. After the data is obtained, the correlations between all the variables can be made and hypotheses are tested. Also differences between TV and YouTube advertising on the basis of each variable are measured. Lastly, variables like gender and age are used to define whether there are some significant differences between demographic groups. After the analysis, conclusions are drawn.

1.3.1 Research Question

The resulting research question consists of two parts:

The first part is: How does ads relevance, credibility and irritation influence consumers’ purchasing intention?

The second part is: is there a difference between TV and YouTube advertising in these variables.

Sub questions:

1. Is there a difference between TV and YouTube advertising in ad relevance, credibility, irritation and purchasing intention?
2. How do ad relevance, credibility, irritation relate to purchasing intention?
3. How do ad relevance, credibility, irritation and purchasing intention relate to demographic variables like gender and age?
4. Which advertisement method (TV or YouTube) is the best to invest in?

2. THEORETICAL FRAMEWORK

In this chapter four variables mentioned earlier are defined and conceptualized. All these variables are used because they have a significant relationship with the ‘attitude towards advertising’. That concept was left out of the theoretical framework, due to a mistake ‘the attitude towards advertising’ was not measured. Three variables are used in order to split up the attitude towards an advertisement: relevance, credibility and irritation.

Using these variables results in the following Theoretical Framework.

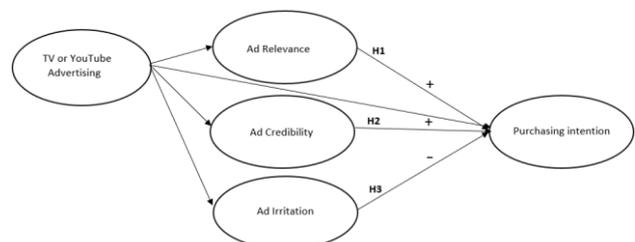


Fig. 2: Theoretical Framework

2.1 Relevance

The first variable is ‘ad relevance’, this variable is used, because relevant and informative ads, result in a more positive consumers’ attitude towards advertising (Koshy and Manohar). A definition of relevance is from a paper, which studies the influence of personal relevance to the attitude towards ‘an object’ (in this paper an object is an advertisement) In the paper the relevance is defined as follows “personal relevance in an attitude

object is ‘the extent that consumers perceive advertisements to be self-related or in some way instrumental in achieving their personal goals and values’ (Celsi & Olson 1988). Personal relevance is the essential characteristic for involvement which has commonly been used in attitude research (Petty & Cacioppo 1981; Zaichkowsky 1985)” (Campbell and Wright, 2008). Another conceptualization of ad relevance is “the degree to which the ad is relevant to the audience, whether the ad is interesting for the audience or not. Another factor which is influencing the relevance is whether the ad is convincing or not, because the ad could be shown to the targeted audience, when the ad is not convincing the audience will interpret it as not relevant.” (Chang, 2011) *H1: There is a significant positive effect of ad relevance and purchasing intention. H1.1: The ad relevance of YouTube is significantly higher than TV.*

2.2 Credibility

The second variable is ‘ad credibility’, this variable is used because consumers’ perception about the credibility of advertisements positively influences their attitude towards ads (MacKenzie, Scott B. and Richard J. Lutz, 1989), (Chang, Chingching, 2011) and (Ling, Piew & Chai, 2010).

The latter study also comes up with several definitions: “Adler and Rodman (2000) define credibility as ‘the believability of the addresser and its perception in the listeners’ mind”. Mackenzie and Lutz (1989) identify advertising credibility as “the consumers’ general perception towards the truthfulness, reliability, trustworthiness and believability of an advertisement.” (Ling, Piew & Chai, 2010). *H2: There is a significant positive effect of ad credibility and purchasing intention. H2.1: The ad credibility of YouTube is significantly higher than TV.*

2.3 Irritation

The third variable ‘advertising irritation’ is used, because it is very relevant to both TV and YouTube advertising. When the same YouTube ads pop-up very frequently, these ads are often perceived as irritating. TV advertising is also seen as irritating, because advertising blocks are often very long and interrupt TV programs. Advertising irritation has a significant negative relationship with attitude towards advertising. (Edwards, Hairong and Joo-Hyun Lee, 2002) and (Zanjani, Shabnam, Diamond, and Chan, 2012)

Irritation is defined as “the consumers didn’t like the advertisements in which the message is not delivered effectively or the message theme is not based on reality. So these types of ads failed to convince consumers.” Ducoffe (1995, 1996) Another definition of irritation is “the belief of the consumers that some advertisements misled the consumers and the result is in a negative attitude towards the advertisements. The government had implemented some rules and regulations to protect the consumer from advertisements that are based on deception. The irritating advertisement has a negative effect.” (Koshy & Manohar). *H3: There is a significant negative effect of ad irritation and purchasing intention. H3.1: The ad irritation of YouTube is significantly lower than TV.*

2.4 Purchase Intention

The last concept is purchase intention Grewal, Monroe, and Krishnan (1998) defined purchasing intention as “a probability that lies in the hands of the customers who intend to purchase a particular product.” Another conceptualization of purchasing intention is “Zeithaml (1988) and (Schiffman and Kanuk, 2009) discovered that customers’ decision to buy a product (purchasing intention) depended largely on the product’s value and recommendations that other consumers have shared, for example

on social media. The application of firm created advertising (viral marketing) together with user-generated word of mouth (WOM) leads to spontaneous forwarding and recommendations by users who find the brands worthy of consideration.” (Hoy & Milne, 2010). These conceptualizations are similar to the definition of MBA Skool, which is used in this research and defines it as follows “the willingness of a customer to buy a certain product or a certain service”. *H4: The purchase intention of YouTube is significantly higher than TV.*

3. METHODOLOGY

3.1 Research Design

An accurate research design is an essential part in order to answer the research question and sub questions. As mentioned in Chapter 2 encompasses the theoretical framework of four variables relevance, irritation, credibility and purchasing intention. These concepts should help to explain the research question, which consist of two parts, and the sub questions, which can be found in the table below (Fig. 3).

Question	Method
What are variables which define the attitude towards advertising?	Secondary research: Literature review
How to define purchasing intention?	Secondary research: Literature review
How do ad relevance, credibility, irritation and purchasing intention relate to demographic variables like gender and age?	Primary research: Survey (SPSS)
How do ad relevance, credibility, irritation relate to purchasing intention?	Primary research: Survey (SPSS)
Which advertisement is the best to invest in?	Implications based on primary research (Survey)

Table. 1: Methods used in order to answer the research question

As you can see in the table above the research design can be divided into two parts; primary and secondary research. The primary research part of this paper is collecting data and the secondary research part consists of literature review. The literature review is already done in Chapter 2, below starts the design of collecting data.

3.2 Sampling

For this survey a non-probability sample is used, because the online questionnaire is divided using my personal circle, so there is no assurance that the probability that each population element participates in this research is equal. Besides, the sample encompasses only Dutch people, so it is not a representative sample which makes it not valid to generalize the results. The non-probability sampling method that has been used is called voluntary sampling, which is a sampling method in which people could determine by itself whether they want to participate or not.

There are 141 individuals who filled in the questionnaire, one person filled in only half of the questionnaire, the answers of this person are deleted. Some respondents forget to answer one or statements

From the 140 respondents who completed the questionnaire is the majority female (55% . As expected are all respondents Dutch. The age of respondents differs from 16 to 70.

3.3 Designing Questions

The statements that were used in the online survey questionnaire were based on existing frameworks and all measured by an 5 point Likert-scale.(Fig. 4, below)

Concept	Variable	Source	Scale
Attitude towards advertising	Ad relevance	William O. Bearden & Richard G. Netemeyer.	Five point Likert scale 6 statements
Attitude towards advertising	Ad credibility	Chang (2011)	Five point Likert scale 6 statements
Attitude towards advertising	Ad irritation	Jagani. K. & Goldsmith. R	Five point Likert scale 7 statements
Consumer behaviour	Purchasing intention	Wang, Minor, and Wei (2011)	Five point Likert scale 3 statements

Table 2: Operationalization table

The questionnaire was basically divided into three sections, the first sections consisted of statements related to the demographics of the respondent, the second part encompassed statements related to YouTube advertising and the third section consisted of statements related to TV advertising. The second and third sections, which were related to the advertising platforms, can be divided into five parts. The first part measures the use of YouTube and TV using two statements, these statements are based on Hasan. M. & Sheikh. M.R. (2018, June). Subsequently, the respondents were asked to indicate their opinion about the relevance of both types of advertisements. The relevance of the advertisements was measured by six different statements. (Bearden & Netemeyer) Followed by the third part, which measures the level of credibility of advertisements. This concept is measured using six statements, the statements are based on Chang (2011). The fourth part measured the perceived level of irritation watching advertisements on both platforms. This concept is measured using seven statements, (Jagani. K. & Goldsmith. R.) The last part measures the intention to buy after watching an advertisement. This aspect is measured by three statements, which are based on Wang, Minor, and Wei (2011).

All statements could be answered by a 5 point Likert scale, in order to make it easier and more clear for the respondents and easier to analyze the results. All statements are general, because if the statements focused on a certain product a lot of respondents will not have used or bought the product and therefore they will not be usable for this research.

In total, the questionnaire consisted of 51 questions, which can be found in the appendix. (Appendix, Chapter 3) The time used to complete the survey was approximately five to ten minutes and could be done online at any moment in the period of one week, using any device that can be connected to the internet.

3.4 Data collection

As mentioned earlier for the survey in this paper an online questionnaire is used. An online questionnaire is considered to be the most appropriate survey type, because YouTube can only be used on internet-based devices. In addition, the current quarantine situation forces an online survey, because personal

contact is not allowed. So, the target group of users are potential watchers of TV and YouTube. The questionnaire consists of two similar parts, in the first part all statements are related to YouTube advertising and in the second part all statements are related to TV advertising.

The main language of the survey was English, because almost all scientific papers are English. But, due to the fact that the sample of the study mostly consists of Dutch people, the survey could also be conducted in Dutch. Because some Dutch people do not understand all English terms used in the questionnaire. In order to distribute the online questionnaire, people are contacted using my personal circle.

4. ANALYSIS

The questionnaire is being evaluated using SPSS. The five point Likert-Scale based responses of each statement will be analyzed to identify the perceived relevance, credibility and irritation of advertisements and the purchasing intention of consumers and the difference in those variables between YouTube and TV advertising will be stretched. .

Each subpart is built up in the same way. Firstly a short introduction about the measurement of the variables, followed by highlighting some differences between YouTube and TV advertising. Then a conclusion whether there is a significant difference of the variable between TV and YouTube advertising. Lastly, the estimates of regression between the variables and purchasing intention is discussed. The estimate of regression is used, because in this paper encompasses repeated measures. In this situation the estimate of regression is able to estimate the relationship between the variables and purchasing intention and for example correlation analysis not.

This composition described above applies to all subparts.

It needs to be mentioned that some respondents forgot to fill one or two questions, the answers of these people are not deleted. In some instances are percentages the result of statements answered by 138 or 139 people. If this is the case it is mentioned.

4.1 Relevance

In the first instance advertising relevance was planned to be measured using six statements, however due to the fact that the researcher forgot to translate one of those statements to Dutch, this statement has been deleted from the research. With five statements left it is important to measure the internal consistency, are the statements close as a group? The internal consistency is measured using Cronbach's alpha. Cronbach's alpha of the five statements was 0.661, which indicates an acceptable level of reliability.

After the reliability test, the data can be analyzed. Both advertising methods were not considered to be meaningful, for YouTube 105 (75%) respondents (strongly) disagreed to the statement and TV advertising(one person forgot to answer this statement related to TV) 98 people (70,5% of 139 respondents). Yet, for YouTube advertising 61,4% of the respondents strongly disagreed with the statement and for TV this was only 32,4%.

Moreover, the TV could be considered to be more meaningful, it also gave people good ideas. Only one respondent agreed to the statement 'YouTube gives me good ideas' and not even anyone strongly agrees to this statement. This is a huge difference comparing it to TV advertising, whereby 11 persons agreed and one strongly agreed to the statement.

These two examples both indicate that TV ads are more relevant than YouTube ads. In order to determine if this difference in relevance is significant a Paired Sample T-test is used. As you

can see in the table below the mean advertising relevance of TV is 0.49 higher than YouTube, with a significance level < 0.000. So, TV advertising is significantly more relevant than YouTube advertising.

	Mean Δ	SE Mean	Sig. (2-tailed)
Yrelevance - Trelevance	-.48777	.06436	.000
Ycredibility - Tcredibility	-.17640	.05031	.001
Yirritation - Tirritation	.04956	.05299	.351
Yintention - Tintention	-.21014	.05707	.000

Table 4: mean difference between YouTube and TV advertising

As you can see in table 5, at the end of this chapter, the estimate of regression between ad relevance and purchasing intention is with 0.319 with an intercept of 1.173 relatively strong. This means that there is a relatively strong positive relationship between both variables.

4.2 Credibility

Ad credibility was measured using six statements. The internal consistency of these statements is very high, leading to a Cronbach's alpha of 0,870 which means that they have a very good level of reliability.

The answers of all statements are (almost) normally distributed, this applies to both advertising methods. It needs to be mentioned that all statements related to TV almost perfectly stick to this normal distributed pattern and YouTube answers of some statements tend to be bound towards one side. A Paired Sample T-test also proves that the differences in credibility between TV and YouTube are very small, table 4 provides the results which state that TV advertising credibility is 0,176 higher than YouTube credibility, with a significance < 0.000. So almost all statements are normally distributed, with a small higher score on credibility of TV advertising.

As you can see in the table 5 the estimate of regression between ad credibility is not significant, which means that there is no relationship between both variables.

4.3 Irritation

Seven statements were used to define the level of irritation of TV and YouTube advertising. These statements had a Cronbach's alpha of 0.681 which means that their reliability is of an acceptable level, approximately the same level of reliability as the statements used to measure advertising relevance.

The level of advertising irritation is measured using seven statements. One of these statements is 'YouTube/TV advertisements insult my intelligence'. For TV advertisements 80 people (57,6% of 139 respondents) agreed to this statement, for YouTube advertisements 83 respondents (59,7% of 139 respondents). This looks like a small difference, yet respectively 29,5% and 40,3% strongly agreed to the statement. So a Paired Sample T-test is used to state whether the difference is significant or not. This test provides a significance of > 0.3 which means that there is no significant difference between both advertising methods regarding 'insult of intelligence'.

Another statement which needs to be highlighted is whether both advertising are a good source of product information. Regarding

TV advertising 45 respondents disagreed to this statement and for YouTube 79 people disagreed, respectively 17 (8.2%) and 39 (28,1% of 139 respondents) strongly disagreed. This difference is also confirmed with a Paired Sample T-test, according to this test YouTube ads scores almost 0.5 higher on the level than TV ads, with significance level <0.000. So, the conclusion is that people perceive that TV ads are a much better source of information than YouTube ads.

Nevertheless, the total level of irritation of both advertising methods does not significantly differ. The Paired Sample T-test provided a mean difference of 0.05 in the favor of YouTube advertising (table 4), which would mean that YouTube advertising is perceived to be more irritating. But, due to the fact that the significance is 0.351, which is a lot more than 0.05, the difference is not considered to be significant. So, there is no significant difference in the perceived ad irritation between TV and YouTube.

As you can see in table 5 the estimate of regression between advertising irritation and purchasing intention is -0.123 with an intercept of 1.173. The significance level is 0.087 which is really high and means that the relationship is not really significant. So, there is a very weak negative relationship between both variables and this relationship also is not significant.

4.4 Purchasing intention

Purchasing intention is measured using three statements, Cronbach's alpha of these statements was with 0.656 similar to the Cronbach's alpha of the statements of ad relevance and irritation. Meaning that the internal consistency of these statements are acceptable.

In order to measure purchasing intention one of the statements used was 'I rate my chances of purchasing immediately after watching TV ads as very low', this statement is negatively correlated purchase intention, so in order to correlate this statement positively with purchasing intention, the answers of this statement are recoded. An interesting difference between TV and YouTube advertising is that respectively 83 (59,7% of 139 respondents) and 101 (73,2% of 138 respondents) strongly disagreed to this statement. Resulting in a significant lower purchasing intention of YouTube advertising than for TV advertising.

In order to measure the difference in purchasing intention between YouTube and TV advertising a Paired Sample T-test is used. The test shows that the mean purchasing intention of TV is 0.210 higher than of YouTube advertising (table 4). So, the purchasing intention of TV advertising is significantly higher than of YouTube advertising.

	Estimate	SE	Sig.
Intercept	1.173180	.398390	.004
Ad credibility	-.002999	.064062	.963
Ad relevance	.318718	.059209	.000
Ad irritation	-.123369	.071816	.087

a) Dependent variable: Purchasing intention

Table 5: Regression analysis

5. GENDER AND AGE

In this chapter differences between gender and aged will be analyzed. Gender encompasses two variables male (1) and female (2). Age is measured using groups, these groups are: 16-25 (group 1), 26-35 (group 2), 36-45 (group 3), 46-55 (group 4) and 55-70 (group 5).

If you read 'total' followed by a variable name, this means that the answers of both YouTube and TV advertising are used in order to measure this variable.

5.1 Gender

As you can see in the appendix (Appendix, Chapter 5) the output of the Paired Sample T-tests is the mean difference in ad relevance of TV higher than YouTube advertising for females is this difference smaller than for males. This also applies to advertising credibility. Yet for ad irritation appears a significant difference between male and female, for females there is no significant difference in ad irritation between TV and YouTube, nevertheless for males irritate more on YouTube advertisements than TV advertisements. This could be an explanation why males would rather intend to buy something of TV advertisements than YouTube advertisements, for females this difference in purchase intention between TV and YouTube ads is much smaller (respectively 0.296 and 0.123).

Up here differences between male and female are stated in the difference between TV and YouTube advertising. Now, differences between males and females for every variable are analyzed. As you can see in the estimates of fixed effects and the linear regression analysis output there are for all variables there no significant differences between males and females. The same applies for all variables if focus is one only one advertising method. Explanations for this could be that the questionnaire focuses on advertising in general and does not focus on specific product advertising. The conclusion is that gender does in general not make a difference in TV and YouTube advertising on the variables; relevance, credibility irritation and purchasing intention.

5.2 Age

As you can see in the table of fixed effects of total relevance the ad relevance drops as people become older. For example the ad relevance of people between 16-25 is approximately 26% (0.4636/1.7582) higher than of people aged between 55 and 70.

Another similar difference is that advertisement credibility of people between 16-25 is more than 18% (0.431/2.35=18.3) higher than people aged between 55-70. Hereby it needs to be mentioned that from an age of 36-70 there is no significant difference. So for the youngest group are TV and YouTube ads more credible, especially for YouTube.

Age is not relevant on YouTube and total ad irritation, as you can see in the tables of fixed effects relating to ads irritation are there no significant differences between the age groups. However for the irritation towards TV ads there is a significant difference. People between 16-25 and 26-35 score much lower on their level of irritation, respectively 10% (-0.362/3.62) and over 13% (-0.477/3.62=0.132) than people from the oldest group. There could be multiple reasons for this, one of them is that young people tend to do other stuff during commercial breaks on TV, for example checking their mobile phone. Due to the fact that YouTube ads pop-up more frequently and are much shorter, consumers have to watch them and there is no time to do other stuff.

Then the last variable purchasing intention, the estimates of fixed effects table and the linear regression analysis of total purchasing intention displays that there is no significant difference between age groups and their purchasing intention. Still, more detailed estimates of fixed effects tables display interesting information. For example is the purchasing intention of YouTube ads for people between 16-35 approximately 25% (-0.4/1.6) lower than for people between 55-70. The purchasing intention of YouTube looks like the opposite of TV purchasing intention. The purchasing intention of TV ads of people between 16-25 and 26-

35 are respectively 32% (0.381/1.193) and 40,7% (0.4856/1.1934) higher than people from 55-70, these differences are huge. The age groups from 36-45 and 46-55 are not used in these comparisons, because their statistics were not significant.

6. FINDINGS AND IMPLICATIONS

This chapter is divided into two parts. The first part consists of discussing the finding, starting the results of Cronbach's alpha, followed by highlighting the differences in the variables between TV and YouTube advertising. Then the hypotheses are accepted or not and lastly the influence of demographics are discussed.

The second part encompasses discussing the implications of the results and recommending future topics of research.

6.1 Findings

The findings resulting from Cronbach's alpha displays that the internal consistency of variables have an acceptable level of reliability. Except from one positive outlier, namely the statements used in order to measure advertising reliability have a very good level of internal consistency reliability.

The Paired Sample T-tests provided unexpected results, TV advertisements are more relevant and credible to their consumers than YouTube advertisements. In addition, the purchasing intention of consumers of TV advertising is also higher than YouTube advertising. Consumer's perceived irritation is the only variable where there is no difference between YouTube and TV advertising.

The regressions between ad relevance, credibility and irritations and the dependent variable, purchasing intention, also provide interesting results. Namely, the results of the linear regression display that there is no relationship between ad credibility and purchase intention and it shows also that there is a strong, positive relationship between advertising relevance and the dependent variable. Besides, the relationship between the last variable, advertising irritation, and purchasing intention is weak, negative and not significant.

Hypothesis	Accepted or not?
H1: There is a significant positive effect of ad relevance and purchasing intention. H1.1: The ad relevance of YouTube is significantly higher than TV.	Accepted Not accepted
H2: There is a significant positive effect of ad credibility and purchasing intention. H2.1: The ad credibility of YouTube is significantly higher than TV.	Not accepted Not accepted
H3: There is a significant negative effect of ad irritation and purchasing intention. H3.1: The ad irritation of YouTube is lower than TV.	Not accepted Not accepted
H4: The purchase intention of YouTube is higher than TV.	Not accepted

Table 3: Hypotheses accepted or not?

The finding of linear regression and the Paired Sample T-tests display that advertisements age has not an influence on the perceived ad irritation. The results also display that ads are much more credible and relevant for people from 16-35 than from people older than 35. This could have been a reason for a higher purchasing intention of TV ads of younger than 35. However, it also needs to be mentioned that these young people have a lower purchase intention of YouTube advertisements than the older groups.

The other demographic variable, gender, provides results on which the conclusion can be made that gender has no influence on the four variables: ad credibility, relevance, irritation and purchasing intention.

6.2 Implications and recommendations

The paper shows to marketers that the TV advertisements are more relevant and credible, so the recommendation to marketers is to focus more on TV advertising than YouTube advertising. Especially if their target group of marketers is younger than 35, because the purchasing intention of TV ads of those people is much higher than YouTube ads.

The recommendations to other researchers is to identify reasons why YouTube ads are less credible and relevant and why especially younger rather intend to purchase products shown in TV advertisements than YouTube ads. YouTube is also recommended to research the effectiveness of their advertising system.

7. CONCLUSION

In this paper, YouTube and TV advertising were compared using four variables: ad relevance, credibility irritation and the dependent variable purchasing intention. This resulted in the answer of the research question of how does YouTube and TV ads relevance, credibility and irritation influence consumers' purchasing intention. In order to answer this question quantitative analysis was used. In the research 141 people participated by filling in the questionnaire. The main findings were that TV advertisements are more credible, relevant and the consumers have a higher purchasing intention than YouTube advertisements. Besides, ad relevance is the only variable with a significant regression with purchasing intention and gender does not influence the variables. Lastly, the age groups displayed that purchasing intention of TV advertising is higher than of YouTube advertising. Concluding, currently TV advertisements targeted between 16-35 are the best option to invest in.

8. LIMITATIONS

Due to the fact that resources were limited, this paper has some drawbacks. Firstly, all respondents are Dutch the sample is not representative, so this research is only limited to the Netherlands. Secondly, the sample is not representative, as a result of the small sample size and the non-probability sample.

In hindsight the variable 'attitude towards advertising' should have been measured by independent statements, this could have been useful to measure the regression with relevance, credibility, irritation and purchasing intention. It also would have provided proof of the difference between TV and YouTube in attitude towards advertising.

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10. REFERENCES

- Agarwal, Motwani, & Shrimali. (2014, April). Customers' Attitude towards Social Media Marketing, 13-15.
- Balakrishnan, Balasubramanian and Manickavasagam (2014). "Perception of Indian consumers towards social media. Bearden W. & Netemeyer, R., "Advertisements in Facebook, LinkedIn, YouTube and Twitter". Handbook of Marketing Scales
- Beltramini, Richard F. (1982). "Advertising Perceived Believability Scale," in Proceedings of the Southwest Marketing Association, Daniel R. Corrigan, Frederic B. Kraft, and Robert H. Ross. Cape Girardeau, MO: Southeast Missouri State University, 1-3.
- Campbell and Wright. (2008). "Shut-up I don't care: understanding the role of relevance and interactivity on consumer attitudes towards repetitive online advertising," 64.
- Carmicheal. K. (2020, 5 February). Paid Social Media: Worth the investment? Retrieved from: <https://blog.hubspot.com/marketing/paid-social-media>
- Chang, Chingching (2011). "Feeling Ambivalent About Going Green," *Journal of Advertising*, 40 (4), 19-32.
- Cottea, Coulterb , Moorec: Enhancing or disrupting guilt: the role of ad credibility and perceived manipulative intent (2005)
- Crigler, Just, Hume, Mills and Hevron, (2011). "YouTube and TV advertising campaigns" *IPolitics: Citizens, Elections, and Governing in the New Media Era*, 103.
- Datareportal. (2020, March 23). Social Media users by Platform. Retrieved from: <https://datareportal.com/social-media-users>
- Edwards, Steven M., Hairong Li and Joo-Hyun Lee (2002), "Forced Exposure and Psychological Reactance: Antecedents and Consequences of the Perceived Intrusiveness of Pop-Up Ads," *Journal of Advertising*, 29 (3), 83- 95.
- Grewal, D., Monroe, K. B., & Krishnan, R. (1998). The effects of price-comparison advertising on buyers' perceptios of acquisition value, transaction value, and behavioural intentions, *Journal of Marketing*, 62, 46-59.
- Hasan. M. & Sheikh. M.R. (2018, June). Factors affecting Attitude towards Social Marketing through Social Media, 20-22.
- Hoy, M. G., & Milne, G. (2010). Gender difference in privacy-related measure for young adult Facebook users. *Journal of Marketing*, 62, 46-59
- June Cottea,*, Robin A. Coulterb , Melissa Moorec: Enhancing or disrupting guilt: the role of ad credibility and perceived manipulative intent (2005)
- Koshy & Manohar. Role of advertising in the formation of attitudes towards online advertising, 3-4.
- Jagani. K. & Goldsmith. R.. Impact of relevance and clutter of a advertisement on irritation – an experimental study on the US and Indian consumer.
- Lenting. M. Wat heeft content marketing te maken met paid, owned en earned media? Retrieved from: <https://www.newblack.nl/wat-heeft-content-marketing-te-maken-met-paid-owned-en-earned-media/>
- Li, Hairong, Steven M. Edwards, and Joo-Hyun Lee (2002), "Measuring the Intrusiveness of Advertisements: Scale Development and Validation," *Journal of Advertising*, 31 (2), 37

- Ling, Piew & Chai (2010) . The Determinants of Consumers' Attitude Towards Advertising.
- MacKenzie and Lutz, 1989, p. 51) Ad credibility and attitude," Journal of Consumer Research, Vol. 29, No. 3, pp. 306-318
- MacKenzie, Scott B. and Richard J. Lutz (1989), "An Empirical Examination of the Structural Antecedents of Attitude Toward the Ad in an Advertising Pretesting Context," Journal of Marketing, 53 (2), 48–65.
- Mbaskool. "Purchase Intention Definition". Retrieved from: <https://www.mbaskool.com/business-concepts/marketing-and-strategy-terms/10976-purchase-intention.html>
- Nibusinessinfo. (2020). "Why use direct marketing?" Retrieved from: <https://www.nibusinessinfo.co.uk/content/why-use-direct-marketing>
- Pereira, M.(2020) "What is Paid Media? Definition, Types, Process with examples" Retrieved from: <https://marketing.toolbox.com/articles/what-is-paid-media-definition-types-process-with-examples>
- Russell, C. A., 2002, "Investigating the effectiveness of product placements in television shows: The role of modality and plot connection congruence on brand memory
- Schiffman, L. & Kanuk, L. (2009). *Consumer behaviour* (10th ed.). Prentice Hall.
- Socialmediamodelen. Paid, Owned and Earned Media. Retrieved from: <https://www.socialmediamodelen.nl/social-media-strategie-implementatie-modellen/paid-owned-earned-media/>
- Support.google. (2020). "Ads on videos you watch". Retrieved from: <https://support.google.com/youtube/answer/3181017?hl=en>
- Wicks. D Examples of Traditional Marketing. Retrieved from: <https://smallbusiness.chron.com/examples-traditional-marketing-20423.html>
- Zeithaml, V. (1988). Consumer perceptions of price, quality and value: A means-end model. *Journal of Marketing*, 52, 2-22.
- Zanjani, Shabnam H. A., William D. Diamond, and Kwong Chan (2012), "Does Ad-Context Congruity Help Surfers and Information Seekers Remember Ads in Cluttered E-magazines," *Journal of Advertising*, 40 (4), 67-83

Appendix Chapter 3

Questionnaire

YouTube use

1. I regularly watch videos on YouTube.
2. I like watching YouTube

Based on Hasan. M. & Sheikh. M.R. (2018, June). Factors affecting Attitude towards Social Marketing through Social Media, 20-22.

Relevance: questioning the meaningfulness of the ad and its product with respect to the viewer's need

1. During YouTube ads I generally think how the product might be useful for me.
 2. During YouTube ads I generally feel as though I was right there in the commercial experiencing the same thing. (deleted)
 3. YouTube ads generally are meaningful to me.
 4. YouTube ads generally do not have anything to do with me or my needs.
 5. YouTube ads gave me a good idea.
 6. During YouTube ads I think of reasons why I would buy or not buy the product.
- "Handbook of Marketing Scales" By: William O. Bearden & Richard G. Netemeyer.

Credibility

1. YouTube advertisements generally are believable.
2. YouTube advertisements generally are trustworthy.
3. YouTube advertisements generally are credible.
4. YouTube advertisements generally are reasonable.
5. YouTube advertisements generally are convincing.
6. YouTube advertisements generally are unbiased

Based on Chang (2011)

SCALE ORIGIN:

The scale used by Chang (2011) was built with terms taken from scales by Beltramini (1982) and MacKenzie and Lutz (1989). Specifically, Chang (2011) selected some positive anchors from the bi-polar adjectives used in the earlier studies.

Irritation

1. YouTube ads insult my intelligence
2. YouTube advertisements are annoying
3. YouTube ads are good source of product information
4. YouTube ads are highly deceptive
5. YouTube advertisements are fun to see
6. YouTube advertisements are phony
7. In general most YouTube advertisements are highly disturbing

Based on Jagani. K. & Goldsmith. R

Jagani. K. & Goldsmith. R. IMPACT OF RELEVANCE AND CLUTTER OF A

ADVERTISEMENT ON IRRITATION – AN EXPERIMENTAL STUDY ON THE US AND INDIAN CONSUMERS

Purchase intention

1. After watching YouTube ads, I intend to purchase from the website immediately.
2. After watching YouTube ads, the likelihood of me purchasing from the website immediately is very high
3. I rate my chances of purchasing immediately after watching YouTube ads as very low.

Based on Wang, Minor, and Wei (2011)

SCALE ORIGIN:

The scale appears to have been created by Wang, Minor, and Wei (2011) for use in the experiment they conducted.

TV use

1. I regularly watch TV
2. I like watching TV

Relevance

1. During TV ads I generally think how the product might be useful for me.
2. During TV ads I generally feel as though I was right there in the commercial experiencing the same thing.
3. TV ads generally are meaningful to me.
4. TV ads generally do not have anything to do with me or my needs?
5. TV ads gave me a good idea.
6. During TV ads I think of reasons why I would buy or not buy the product.

Credibility

1. TV advertisements generally are believable.
2. TV advertisement generally are trustworthy.
3. TV advertisement generally are credible.
4. TV advertisement generally are reasonable.
5. TV advertisement generally are convincing.
6. TV advertisement generally are unbiased

Irritation

1. TV ads insult my intelligence
2. TV advertisements are annoying
3. TV ads are good source of product information
4. TV ads are highly deceptive
5. TV advertisements are fun to see
6. TV advertisements are phony
7. In general most TV advertisements are highly disturbing

Purchase intention

1. After watching TV ads, I intend to purchase from the website immediately.
2. After watching TV ads, the likelihood of me purchasing from the website immediately is very high
3. I rate my chances of purchasing immediately after watching TV ads as very low

I will use the Five-point Likert scale in this questionnaire.

Red coloured statements are statements which are negatively correlated with their variable

Appendix Chapter 4

Cronbach's alpha

Reliability

Scale: Credibility reliability

Case Processing Summary

		N	%
Cases	Valid	277	98,9
	Excluded ^a	3	1,1
	Total	280	100,0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
,870	6

Reliability

Scale: Relevance reliability

Case Processing Summary

		N	%
Cases	Valid	279	99,6
	Excluded ^a	1	,4
	Total	280	100,0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
,661	5

Scale: Irritation reliability

Case Processing Summary

		N	%
Cases	Valid	275	98,2
	Excluded ^a	5	1,8
	Total	280	100,0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
,681	7

Scale: Purchasing Intention reliability

Case Processing Summary

		N	%
Cases	Valid	277	98,9
	Excluded ^a	3	1,1
	Total	280	100,0

a. Listwise deletion based on all variables in the procedure.

Reliability Statistics

Cronbach's Alpha	N of Items
,656	3

Paired Samples Test

		Paired Differences							
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
Pair 1	Yrelevance - Trelevance	-,48777	,75876	,06436	-,61502	-,36052	-7,579	138	,000
Pair 2	Ycredibility - Tcredibility	-,17640	,58883	,05031	-,27588	-,07691	-3,506	136	,001
Pair 3	Yirritation - Tirritation	,04956	,61575	,05299	-,05526	,15437	,935	134	,351
Pair 4	Yintention - Tintention	-,21014	,67040	,05707	-,32299	-,09730	-3,682	137	,000

4.1 Relevance

Estimates of Fixed Effects^a

Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,758238	,119821	137,681	14,674	,000	1,521311	1,995165
[AgeGroup=1,00]	,463622	,134916	137,667	3,436	,001	,196847	,730397
[AgeGroup=2,00]	,396147	,163582	139,625	2,422	,017	,072729	,719565
[AgeGroup=3,00]	,239773	,151353	137,652	1,584	,115	-,059505	,539050
[AgeGroup=4,00]	,157280	,169337	137,650	,929	,355	-,177559	,492118
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.
[Gender=1]	,058619	,088451	138,168	,663	,509	-,116274	,233511
[Gender=2]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Totalrelevance.

b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects^a

Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,983582	,161115	137	12,312	,000	1,664990	2,302175
[AgeGroup=1,00]	,576196	,181401	137	3,176	,002	,217488	,934903
[AgeGroup=2,00]	,630680	,221708	137	2,845	,005	,192269	1,069092
[AgeGroup=3,00]	,066590	,203489	137	,327	,744	-,335795	,468975
[AgeGroup=4,00]	,135448	,227666	137	,595	,553	-,314746	,585642
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.
[Gender=1]	,015919	,119173	137	,134	,894	-,219737	,251576
[Gender=2]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Trelevance.

b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects^a

Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,535391	,132615	138,000	11,578	,000	1,273171	1,797612
[AgeGroup=1,00]	,353122	,149329	138,000	2,365	,019	,057854	,648390
[AgeGroup=2,00]	,188586	,179914	138,000	1,048	,296	-,167158	,544330
[AgeGroup=3,00]	,412187	,167530	138,000	2,460	,015	,080929	,743445
[AgeGroup=4,00]	,179424	,187437	138	,957	,340	-,191197	,550045
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.
[Gender=1]	,093826	,097741	138,000	,960	,339	-,099439	,287090
[Gender=2]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Yrelevance.

b. This parameter is set to zero because it is redundant.

4.2 Credibility

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	2,349738	,145044	138,848	16,200	,000	2,062957	2,636518
[Gender=1]	,116031	,106392	136,746	1,091	,277	-,094355	,326417
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	,431158	,162929	137,781	2,646	,009	,108993	,753323
[AgeGroup=2,00]	,265111	,196661	138,586	1,348	,180	-,123732	,653954
[AgeGroup=3,00]	,017716	,182725	137,630	,097	,923	-,343596	,379028
[AgeGroup=4,00]	,065425	,204993	138,823	,319	,750	-,339887	,470737
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Totalcredibility.
b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	2,265044	,167683	137	13,508	,000	1,933461	2,596626
[Gender=1]	,137932	,120106	137	1,148	,253	-,099569	,375433
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	,311811	,186706	137	1,670	,097	-,057387	,681010
[AgeGroup=2,00]	,222252	,223788	137	,993	,322	-,220275	,664778
[AgeGroup=3,00]	,190305	,209155	137	,910	,364	-,223284	,603895
[AgeGroup=4,00]	,151982	,233010	137	,652	,515	-,308779	,612743
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Ycredibility.
b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	2,447468	,154022	136,000	15,890	,000	2,142880	2,752055
[Gender=1]	,074264	,114187	136,000	,650	,517	-,151549	,300076
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	,549592	,173403	136,000	3,169	,002	,206676	,892508
[AgeGroup=2,00]	,357993	,211920	136,000	1,689	,093	-,061092	,777078
[AgeGroup=3,00]	-,163323	,194504	136,000	-,840	,403	-,547966	,221319
[AgeGroup=4,00]	-,010506	,221497	136,000	-,047	,962	-,448530	,427517
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Tcredibility.
b. This parameter is set to zero because it is redundant.

4.3 Irritation

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	3,463845	,124721	147,438	27,773	,000	3,217372	3,710318
[Gender=1]	,025728	,089972	138,363	,286	,775	-,152170	,203626
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	-,123006	,139141	143,488	-,884	,378	-,398037	,152025
[AgeGroup=2,00]	-,196158	,168182	144,775	-1,166	,245	-,528566	,136251
[AgeGroup=3,00]	-,022896	,155905	142,961	-,147	,883	-,331073	,285281
[AgeGroup=4,00]	,061477	,173820	141,481	,354	,724	-,282144	,405098
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Totalirritation.
b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	3,296894	,158345	134,000	20,821	,000	2,983715	3,610073
[Gender=1]	,091098	,106920	134,000	,852	,396	-,120370	,302567
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	,130571	,172217	134,000	,758	,450	-,210043	,471186
[AgeGroup=2,00]	,111261	,206709	134,000	,538	,591	-,297573	,520094
[AgeGroup=3,00]	-,023045	,192306	134,000	-,120	,905	-,403392	,357303
[AgeGroup=4,00]	,221027	,212232	134,000	1,041	,300	-,198731	,640786
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Yirritation.
b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	3,616587	,134564	137	26,876	,000	3,350496	3,882678
[Gender=1]	-,040238	,099534	137	-,404	,687	-,237060	,156584
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	-,362011	,151507	137	-2,389	,018	-,661606	-,062416
[AgeGroup=2,00]	-,477421	,185172	137	-2,578	,011	-,843585	-,111257
[AgeGroup=3,00]	-,008400	,169955	137	-,049	,961	-,344475	,327674
[AgeGroup=4,00]	-,083641	,190148	137	-,440	,661	-,459646	,292364
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Tirritation.
b. This parameter is set to zero because it is redundant.

Paired Samples Test

		Paired Differences							
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
Pair 1	Yirritation1 - Tirritation1	-,13768	1,07522	,09153	-,31867	,04331	-1,504	137	,135

4.4 Purchase Intention

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,382659	,126078	140,325	10,967	,000	1,133401	1,631917
[Gender=1]	,066520	,092439	136,947	,720	,473	-,116273	,249312
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	-,005168	,141454	138,974	-,037	,971	-,284849	,274512
[AgeGroup=2,00]	,056303	,172582	138,302	,326	,745	-,284937	,397544
[AgeGroup=3,00]	,005837	,158607	138,802	,037	,971	-,307762	,319435
[AgeGroup=4,00]	-,053437	,177218	138,296	-,302	,763	-,403844	,296970
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Totalintention.
b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,592732	,133068	136	11,969	,000	1,329581	1,855883
[Gender=1]	,042815	,095655	136	,448	,655	-,146348	,231978
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	-,409817	,148144	136	-2,766	,006	-,702780	-,116854
[AgeGroup=2,00]	-,391917	,180034	136	-2,177	,031	-,747946	-,035888
[AgeGroup=3,00]	-,205177	,165941	136	-1,236	,218	-,533336	,122983
[AgeGroup=4,00]	-,254621	,184864	136	-1,377	,171	-,620201	,110959
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Yintention.
b. This parameter is set to zero because it is redundant.

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,193413	,158269	137	7,540	,000	,880447	1,506380
[Gender=1]	,086427	,117068	137	,738	,462	-,145068	,317922
[Gender=2]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	,380970	,178197	137	2,138	,034	,028597	,733343
[AgeGroup=2,00]	,485596	,217792	137	2,230	,027	,054926	,916265
[AgeGroup=3,00]	,196898	,199895	137	,985	,326	-,198381	,592177
[AgeGroup=4,00]	,128343	,223646	137	,574	,567	-,313901	,570587
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.

a. Dependent Variable: Tintention.
b. This parameter is set to zero because it is redundant.

Appendix Chapter 5

Male

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,305022	,580522	125,990	2,248	,026	,156185	2,453859
[AdType=1,00]	-,111578	,092956	76,315	-1,200	,234	-,296702	,073547
[AdType=2,00]	0 ^b	0	.	.	.	.	.
Totalrelevance	,324294	,087282	125,487	3,715	,000	,151558	,497029
Totalcredibility	-,039953	,095536	117,732	-,418	,677	-,229145	,149239
Totalirritation	-,116360	,112169	124,991	-1,037	,302	-,338356	,105637

a. Dependent Variable: Totalintention.

b. This parameter is set to zero because it is redundant.

Female

Estimates of Fixed Effects ^a							
Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,149498	,551222	142,398	2,085	,039	,059862	2,239134
[AdType=1,00]	-,013126	,079198	79,196	-,166	,869	-,170759	,144507
[AdType=2,00]	0 ^b	0	.	.	.	.	.
Totalrelevance	,302050	,079689	136,921	3,790	,000	,144470	,459630
Totalcredibility	,012473	,083341	130,527	,150	,881	-,152402	,177347
Totalirritation	-,128193	,095461	140,136	-1,343	,181	-,316922	,060536

a. Dependent Variable: Totalintention.

b. This parameter is set to zero because it is redundant.

For all respondents

Paired Samples Test									
		Paired Differences							
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
Pair 1	Yrelevance - Trelevance	-,48777	,75876	,06436	-,61502	-,36052	-7,579	138	,000
Pair 2	Ycredibility - Tcredibility	-,17640	,58883	,05031	-,27588	-,07691	-3,506	136	,001
Pair 3	Yirritation - Tirritation	,04956	,61575	,05299	-,05526	,15437	,935	134	,351
Pair 4	Yintention - Tintention	-,21014	,67040	,05707	-,32299	-,09730	-3,682	137	,000

Only men

Paired Samples Test									
		Paired Differences							
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
Pair 1	Yrelevance - Trelevance	-,52381	,74178	,09345	-,71062	-,33700	-5,605	62	,000
Pair 2	Ycredibility - Tcredibility	-,22487	,62659	,07894	-,38267	-,06706	-2,848	62	,006
Pair 3	Yirritation - Tirritation	,20484	,62818	,07914	,04663	,36304	2,588	62	,012
Pair 4	Yintention - Tintention	-,29630	,69331	,08735	-,47091	-,12169	-3,392	62	,001

Only women

Paired Samples Test									
		Paired Differences							
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)
					Lower	Upper			
Pair 1	Yrelevance - Trelevance	-,47297	,76683	,08914	-,65063	-,29531	-5,306	73	,000
Pair 2	Ycredibility - Tcredibility	-,13889	,56294	,06634	-,27117	-,00660	-2,093	71	,040
Pair 3	Yirritation - Tirritation	-,07483	,57832	,06912	-,21273	,06307	-1,083	69	,283
Pair 4	Yintention - Tintention	-,12329	,63951	,07485	-,27250	,02592	-1,647	72	,104

AGE Groups
16-25

		Paired Samples Test								
		Paired Differences								
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)	
					Lower	Upper				
Pair 1	Yrelevance - Trelevance	-,62373	,63906	,08320	-,79027	-,45719	-7,497	58	,000	
Pair 2	Ycredibility - Tcredibility	-,38136	,61825	,08049	-,54247	-,22024	-4,738	58	,000	
Pair 3	Yirritation - Tirritation	,25303	,50985	,06638	,12016	,38589	3,812	58	,000	
Pair 4	Yintention - Tintention	-,41808	,58589	,07628	-,57076	-,26539	-5,481	58	,000	

26-35

		Paired Samples Test								
		Paired Differences								
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)	
					Lower	Upper				
Pair 1	Yrelevance - Trelevance	-,85556	,57724	,13606	-1,14261	-,56850	-6,288	17	,000	
Pair 2	Ycredibility - Tcredibility	-,21296	,39526	,09316	-,40952	-,01641	-2,286	17	,035	
Pair 3	Yirritation - Tirritation	,29972	,80161	,19442	-,11243	,71187	1,542	16	,143	
Pair 4	Yintention - Tintention	-,50000	,66911	,15771	-,83274	-,16726	-3,170	17	,006	

36-45

		Paired Samples Test								
		Paired Differences								
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)	
					Lower	Upper				
Pair 1	Yrelevance - Trelevance	-,04444	,68463	,13176	-,31527	,22639	-,337	26	,739	
Pair 2	Ycredibility - Tcredibility	,17901	,54288	,10448	-,03574	,39377	1,713	26	,099	
Pair 3	Yirritation - Tirritation	-,30335	,58558	,11270	-,53500	-,07170	-2,692	26	,012	
Pair 4	Yintention - Tintention	-,06173	,66046	,12711	-,32300	,19954	-,486	26	,631	

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		Paired Samples Test								
		Paired Differences								
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)	
					Lower	Upper				
Pair 1	Yrelevance - Trelevance	-,37500	,74789	,18697	-,77352	,02352	-2,006	15	,063	
Pair 2	Ycredibility - Tcredibility	,03333	,58146	,15013	-,28867	,35533	,222	14	,827	
Pair 3	Yirritation - Tirritation	,03423	,52482	,13120	-,24543	,31388	,261	15	,798	
Pair 4	Yintention - Tintention	,00000	,57090	,14272	-,30421	,30421	,000	15	1,000	

56-70

		Paired Samples Test								
		Paired Differences								
		Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference		t	df	Sig. (2-tailed)	
					Lower	Upper				
Pair 1	Yrelevance - Trelevance	-,44211	1,06579	,24451	-,95580	,07159	-1,808	18	,087	
Pair 2	Ycredibility - Tcredibility	-,17593	,44455	,10478	-,39699	,04514	-1,679	17	,111	
Pair 3	Yirritation - Tirritation	-,35565	,43967	,10992	-,58994	-,12137	-3,236	15	,006	
Pair 4	Yintention - Tintention	,35185	,63113	,14876	,03800	,66571	2,365	17	,030	

Estimates of Fixed Effects^a

Parameter	Estimate	Std. Error	df	t	Sig.	95% Confidence Interval	
						Lower Bound	Upper Bound
Intercept	1,173180	,398390	267,497	2,945	,004	,388802	1,957558
[Gender=1]	,075356	,078916	130,311	,955	,341	-,080766	,231479
[Gender=2]	0 ^b	0	.	.	.	.	.
[AdType=1,00]	-,053406	,060224	152,804	-,887	,377	-,172385	,065573
[AdType=2,00]	0 ^b	0	.	.	.	.	.
[AgeGroup=1,00]	-,071277	,125285	143,629	-,569	,570	-,318918	,176364
[AgeGroup=2,00]	,008578	,150119	137,797	,057	,955	-,288256	,305413
[AgeGroup=3,00]	,031287	,136448	135,878	,229	,819	-,238549	,301123
[AgeGroup=4,00]	-,021643	,152845	135,866	-,142	,888	-,323906	,280621
[AgeGroup=5,00]	0 ^b	0	.	.	.	.	.
Totalcredibility	-,002999	,064062	252,452	-,047	,963	-,129162	,123164
Totalrelevance	,318718	,059209	267,404	5,383	,000	,202142	,435293
Totalirritation	-,123369	,071816	268,833	-1,718	,087	-,264762	,018023

a. Dependent Variable: Totalintention.

b. This parameter is set to zero because it is redundant.