Consumer Attitudes Towards Online Grocery Shopping
A Research Conducted on Swedish Consumers

Bachelor's thesis within Business Administration
Author: Anna Blomqvist - 921226
Frida Lennartsson - 920304
Louise Nyman - 921014

Tutor: Joaquín Cestino
Jönköping May 2015
Abstract

**Purpose:** The aim of this research is to investigate if positive attitudes influence the intentions to purchase groceries online. In order fulfil the purpose and test the relationship between attitudes and intentions, the Theory of Planned Behaviour is used as the underlying theoretical model.

**Background:** The e-commerce market in Sweden is regarded as one of the most developed e-commerce markets in Europe, however the grocery market is still striving for an online breakthrough. One of the largest obstacles for the online grocery market is the lack of consumer adoption. Previous research has emphasized the importance of understanding consumer attitudes and its influence on the consumers’ intention to adopt an e-commerce behaviour. Existing theories recognize a gap within positive attitudes’ and their influence on the intentions to adopt e-commerce.

**Method:** An explanatory strategy and a deductive approach were applied in order to test the Theory of Planned Behaviour. Three hypotheses were developed based on the model. The empirical study was based on a quantitative approach and the data collection was made possible through an online survey targeted towards adults in Sweden. Furthermore the analysis of the data was done in SPSS through factor analysis, correlation matrix, descriptive variables and multi linear regression analysis, this provided answers for the hypotheses with a 95% confidence interval.

**Findings and conclusion:** The analysed empirical findings presented overall positive attitudes, as well as a strong correlation between positive attitudes and intentions within online grocery shopping. This answers the research question and fulfils the purpose of examining the influence that positive attitudes have on intentions within the field of online grocery shopping. This research successfully tests the Theory of Planned Behaviour and suggestions for further research is to examine the underlying factors in a qualitative study.
Acknowledgements

We hereby acknowledge all the people that have been present during the process of writing this bachelor thesis, we are very grateful for your patience support and understanding.

We would like to express our gratitude to our tutor Joaquín Cestino. You have believed in us and provided great insights to the subject during process. We would not have made it without your guidance through some of our more difficult tasks. We also acknowledge Adele Berndt, Anders Melander, Daniel Gunnarsson and other practitioners at JIBS for great advice based on your knowledge on how to write a bachelor thesis. Without your help and guidance we would not have been able to complete this bachelor thesis.

________________________________________
Anna Blomqvist                     Louise Nyman

________________________________________
Frida Lennartsson
Table of Contents

1 Introduction .................................................................................................................. 1
  1.1 Background .............................................................................................................. 1
  1.2 Problem Discussion ............................................................................................ 1
  1.3 Purpose ................................................................................................................ 2
  1.4 Definitions ............................................................................................................. 3
    1.4.1 E-commerce .................................................................................................... 3
    1.4.2 Theory of Planned Behaviour ....................................................................... 3
    1.4.3 Attitude .......................................................................................................... 3
    1.4.4 Subjective Norm ............................................................................................ 3
    1.4.5 Perceived Behavioural Control .................................................................. 3
    1.4.6 Intention ......................................................................................................... 3
    1.4.7 Behaviour ....................................................................................................... 3
    1.4.8 Online Grocery Shopping .......................................................................... 3
  1.5 Delimitations .......................................................................................................... 3
  1.6 Contributions ......................................................................................................... 4
  1.7 Disposition ............................................................................................................ 4

2 Theoretical Framework ................................................................................................. 5
  2.1 E-commerce .......................................................................................................... 5
    2.1.1 Online Consumer Behaviour ...................................................................... 6
  2.2 Theory of Planned Behaviour ............................................................................ 6
    2.2.1 Attitude .......................................................................................................... 7
    2.2.2 Subjective Norm ............................................................................................ 8
    2.2.3 Perceived Behavioural Control .................................................................. 9
    2.2.4 Intention ......................................................................................................... 9
    2.2.5 Behaviour ....................................................................................................... 10
  2.3 Consumer Involvement ......................................................................................... 10
    2.3.1 Habits ............................................................................................................ 11
  2.4 Consumer Barriers ................................................................................................. 11
    2.4.1 Resistance to Change ................................................................................. 12
  2.5 Relevance of Theories ......................................................................................... 13
  2.6 Hypothesis Development ...................................................................................... 13
    2.6.1 Hypotheses ................................................................................................... 13

3 Methodology & Method ................................................................................................. 15
  3.1 Methodology .......................................................................................................... 15
    3.1.1 Research Strategy ....................................................................................... 15
    3.1.2 Research Philosophy .................................................................................. 15
    3.1.3 Research Approach ..................................................................................... 16
  3.2 Method .................................................................................................................. 17
    3.2.1 Data Collection ............................................................................................ 17
    3.2.2 Secondary Data ........................................................................................... 17
    3.2.3 Primary Data ................................................................................................ 17
    3.2.4 Sampling ...................................................................................................... 18
    3.2.5 Questionnaire Design ............................................................................... 19
  3.3 Data Analysis .......................................................................................................... 21
    3.3.1 Factor Analysis ............................................................................................ 21
    3.3.2 Descriptive Statistics .................................................................................. 22
Figures
Figure 1.1 Figure of the disposition of the research ................................. 4
Figure 2.1 Figure of the outline of the theoretical framework .................... 5
Figure 2.2 Figure of the Theory of Planned Behaviour (Fishbein & Ajzen, 1975) ........................................................................................................ 7
Figure 2.3 Figure of the hypotheses derived from Theory of Planned Behaviour ........................................................................................................ 14
Figure 4.1 Figure of the gender distribution of respondents ......................... 25
Figure 4.2 Figure of the age distribution of respondents ............................. 26
Figure 4.3 Figure of the respondents' annual household income ............... 26
Figure 4.4 Figure of the respondents' weekly spending on groceries .......... 27
Figure 4.5 Figure of the hypotheses ............................................................ 36
Figure 5.1 Figure of H1, H2 & H3 ................................................................. 37

Tables
Table 4.1 KMO and Bartlett's Test .............................................................. 28
Table 4.2 Factor Loading ........................................................................... 29
Table 4.3 Attitude statement means ........................................................... 30
Table 4.4 Subjective norm statement means ............................................. 30
Table 4.5 Perceived behavioural control statement means ......................... 31
Table 4.6 Intention statement means .......................................................... 31
Table 4.7 Correlation Matrix .................................................................... 32
Table 4.8 Multi Linear Regression Analysis Model Summary ................... 33
Table 4.9 Multi Linear Regression Analysis ............................................... 35

Appendix
Appendix ................................................................................................. 51
1 Introduction

In the first section the topic e-commerce is introduced, along with a background to the online grocery market. It also includes the problem and purpose and is concluded by presenting the overall definitions, delimitations and academic value of the research.

1.1 Background

“Online shopping is moving rapidly from a minority hobby, to an everyday part of most people’s lives and a quiet revolution is taking place which is empowering consumers and shifting the balance of power in the supply chain towards the consumers”

Doherty and Ellis-Chadwick, 2010 p.957

The e-commerce adoption is constantly growing, even to this present day. In many nations today a majority close to 90% of the national firms have a website and even if all of them does not offer e-commerce solutions this shows the importance of a firm being available online (Ellis-Chadwick, 2011). The rapid growth of e-commerce can be derived from the new consumer need for convenience and comfort in their purchasing process (Seybert, 2012).

Even if a significant portion of the population today chooses to purchase their products online, there are still specific markets that struggle to get the consumer to adapt and shift behaviour. Within e-commerce in Sweden, one of the markets that still experience this struggle is the online grocery market. There are two possible aspects of what is causing this. First, there could be a lack of willingness from the grocers, since the business model is not yet profitable enough to implement (GS1 Sweden & HUI Research, 2012) The technical aspects within the business model that challenge the grocer is how to manage the stock of goods, present the groceries, how and at what times to deliver the goods and how to manage returns of goods. Secondly, it could be a problem within consumer attitudes, which directly influences consumer intentions and behaviour. There is however still believed that the market has great potential for growth, due to the traditional grocery market’s size (Svensk Digital Handel, 2014).

This research will focus on the consumers’ perspective since it is believed that they are the key to a more rapid and sustainable development in the online grocery market. Previous market research recognise difficulties for consumers to change their behaviour and habits, as well as the acceptance of functional attributes such as not being able to touch or feel the tangible goods when purchasing groceries (Svensk Digital Handel, 2014). Altering how consumers purchase groceries involves a change in behaviour, which is derived from a change in attitudes (Fishbein & Ajzen, 1975). This emphasise how attitude theory and models can aid when explaining consumer adoption towards e-commerce. Furthermore Grandón, Nasco and Mykytyn, (2011) highlights the importance of understanding how consumer attitudes influence the adoption of IT, especially e-commerce.

1.2 Problem Discussion

E-commerce is a new retail channel and therefore a vast amount of new research within online consumer behaviour is conducted. The current and past research area of e-commerce has been limited to three main aspects: barriers and driver of e-commerce adoption, customer segmentation and e-commerce acceptance modelling (Iglesias-Pradas, Pascual-Miguel, Hernández-García & Chaparro-Peláez, 2013).
When reviewing existing literature and conducted research, a significant lack of research of attitudes influence of intentions is acknowledged. This is an important field for further investigation since attitude is the leading factor that influences intentions, which in turn affect behaviour (Ajzen, 2012). Fishbein and Ajzen made arguably the most significant contribution to attitude and behavioural research through their first Theory of Reasoned Action and later also through Theory of Planned Behaviour (Ajzen, 2012). A majority of existing literature is based on these two models. The Theory of Planned Behaviour is shown to be the most appropriate method to measure consumer attitudes within online grocery shopping according to Grandón et al. (2011), thus this theory will be applied in this research when investigating the attitudes influence on intentions.

The application of the Theory of Planned Behaviour implemented by Grandón et al. (2011) within e-commerce showed that attitudes have an influence on consumer behaviour within e-commerce adoption. Furthermore, the takeaway from the research was: “further research may examine the direct effect of positive and negative attitude on the intention to adopt IT, particularly e-commerce” (Grandón et al., 2011 p.297). This strengthens the purpose of this research, as well as Swinyard and Smith (2011) who argues that academic literature about online shopping has not yet reached mature development.

When reviewing previous work, it is evident that there is a gap in the literature regarding using positive and negative attitudes as a tool in explaining consumer e-commerce behaviour. The literature review proves that attitudes have significant influence on consumer behaviour and it is previously proved that positive attitudes have a positive influence on consumer behaviour and negative attitudes have a negative influence on consumer behaviour (Fishbein & Ajzen, 1975). However these findings has not yet been applied to the e-commerce market. The gap identified based on previous research, is the positive attitude influence on intention within the online grocery market.

1.3 Purpose

The purpose of this research is to investigate the consumers’ attitude-intention relationship regarding online grocery shopping in Sweden.

This research focuses on positive attitudes whether there is an influence on the consumer intentions to purchase groceries online. It is the change in purchasing pattern from going to a physical store to an online store. Therefore, it focuses on the shoppers’ intentions and adoption of whether or not to use online grocery shopping. It is believed that this research is needed and has high relevance since the online grocery market only represents 1% of the total grocery market in Sweden and this implies a low consumer adoption. This research will contribute with knowledge of positive attitudes and if they influence the intention to purchase groceries online, furthermore this will lead to a better understanding within the area of research.

To explain and examine the phenomena further, theories relevant to the attitude-intention relationship will be used. Theory of Planned Behaviour by Ajzen and Fishbein (1980) will constitute the theoretical ground for the research and in accordance with this model, external factors such as subjective norms, perceived behavioural control and intentions will also be incorporated. The research will be guided by the research question: “Does consumers’ positive attitudes influence the decision of purchasing groceries online?”
1.4 Definitions

1.4.1 E-commerce
The term e-commerce refers to the action of electronically mediated financial transactions between two parties. This commercial interchange can be between organizations, individuals or a mixture of both. In this report it refers to the action between organizations and individuals, so called business-to-consumers (B2C) (Ellis-Chadwick, 2011).

1.4.2 Theory of Planned Behaviour
The Theory of Planned Behaviour is considered one of the most successful theories in social psychology and it aspires to explain people’s behaviour, such as consumer behaviour, in different situations and domains (Klöckner, 2011).

1.4.3 Attitude
According to Smith and Stevens (2008) an attitude is someone’s tendency to evaluate an object either for the positive or the negative. A positive attitude is a learned tendency to evaluate an object as being favourable (Fishbein & Ajzen, 1975).

1.4.4 Subjective Norm
A subjective norm is the social pressure on a consumer to perform or not to perform certain action or behaviour. It is based on normative beliefs and is often referred to as norms (Ajzen, 1991).

1.4.5 Perceived Behavioural Control
Perceived behavioural control is the amount of control consumers believe they possesses when planning or performing a certain action or behaviour (Ajzen, 2002).

1.4.6 Intention
According to Ajzen (1991) intentions are the motivational factors that influence an action or behaviour and the higher the intention the more likely the behaviour is to take place.

1.4.7 Behaviour
The definition for behaviour is an action that can be observed, for example purchasing groceries online (Ajzen & Fishbein, 1977).

1.4.8 Online Grocery Shopping
Within this research online grocery shopping is referred to the act of purchasing single items of groceries just as one would in a physical store, however this is done online. An example of this type of service is www.Mathem.se and www.Handla24.se.

1.5 Delimitations
This research intends to focus on the positive attitudes and its influence on consumer intention within e-commerce when purchasing groceries online. In this research one has to keep in mind that there are certain delimitations present:

- The research does not focus on negative attitudes and its influence on consumer intention.
- The empirical study is conducted through an online survey; the control of who the respondents are is therefore lost.
- The sampling will be limited to consumers living in Sweden. It is of importance to take into consideration that the findings from this research might not applicable to other countries, as they might have other values and shopping habits.

### 1.6 Contributions

Applying and testing the Theory of Planned Behaviour within the field of online grocery shopping in Sweden is the academic contribution of this research. The findings will be of importance for practitioners in the effort of effectively creating an e-commerce model with high consumer value and usefulness. Insights from this research will aid in understanding consumer attitudes towards online grocery shopping and the influence that these attitudes have on intentions.

The aim of this research is to fill the knowledge gap that has been found concerning positive attitudes and if they influence the intention within in online grocery shopping. Through the different aspects of this research it will contribute by advancing current research of the attitude-intention relationship within e-commerce and online grocery shopping.

### 1.7 Disposition

![Figure 1.1 Figure of the disposition of the research](image-url)
2 Theoretical Framework

The theoretical framework includes a literature review with relevant theories within the topics e-commerce, Theory of Planned Behaviour, consumer involvement and consumer barriers. The section will be concluded by the development of hypotheses, which is based on Theory of Planned Behaviour.

![Figure 2.1 Figure of the outline of the theoretical framework](image)

2.1 E-commerce

E-commerce is a broad term that specifies electronically mediated financial transactions between two parties such as individuals or organisations. The focus for this research will be on business-to-consumer e-commerce, also referred to as B2C e-commerce, which are the transactions between retail suppliers and the end-consumer. Within B2C e-commerce there are four main types of websites: brand-building website, services-oriented relationship-building website, portal or media site and lastly transactional e-commerce site (Ellis-Chadwick, 2011).

Online grocery shopping is classified as transactional e-commerce site because it takes place in a commercial website and the main purpose of purchasing of online products and services (Ellis-Chadwick, 2011). The process of buying groceries online is very straightforward and follows three main steps: It starts with the consumer browsing around a range of groceries and choosing products. The next step is selecting time of delivery and the last step is payment, which can be done with regular cards such as VISA and MasterCard (Handla24.se, 2015).

E-commerce has become a very popular medium for shopping within the EU, since the consumers appreciate the convenience of shopping anytime and anywhere. The consumers state that they get better access to information online and that a broader selection of products is presented. Another benefit with purchasing groceries online according to consumers is that it is easier to compare prices or find alternatives based on other what other consumers have purchased. In 2012 Sweden was one of the leading e-commerce markets within EU. Sweden was then ranked as the third largest e-commerce market with
77% of its population making their shopping online (Seybert, 2012). According to Svensk Digital Handel’s report “Digital Mathandel” (2014), the current e-commerce market in Sweden is steadily growing, with an increase of 17% from year 2013 to 2014.

When the main actors of the market first introduced the online grocery service in the late 1990's, the customers was not yet ready for it and the business model was not fully developed. By lacking sufficient profit marginal to cover up the costs of logistics, packaging and time management, the market stagnated and still waits for a profitable model to break through in a larger scale. The challenge is to find a sustainable and profitable model, in which the customers slowly start to appreciate the comfort (GS1 Sweden & HUI Research, 2012).

Within the online grocery industry, there is a growth of 38% from 2013-2014. However, in comparison with the total grocery industry, the online grocery commerce represents barely 1%. In 2013 the turnover of the total grocery industry was 265 billion SEK, whereas the online grocery commerce had a turnover of 2.2 billion SEK (Svensk Digital mathandel, 2014). Furthermore, in comparison to the overall e-commerce, which is accounted for 6% (approximately 37 billion SEK) of the in Swedish total commerce. Hence, one can see a difference in market share of the two markets and the potential of the online grocery market according to the growth rate of the industry.

2.1.1 Online Consumer Behaviour

Online consumer behaviour differs slightly from traditional, offline consumer behaviour. According to Ba and Pavlou (2002) trust is one of the major concerns for consumers when purchasing items online. The trust issue in a buyer-selling relationship is based on information asymmetry, which is explained as a relationship where one party, usually the seller, possess more information than the buyer about the product or service quality (Ba & Pavlou, 2002). It can also be seen that technology acceptance and adoption is an important aspect regarding consumer e-commerce behaviour (Pavlou, 2003).

There are several aspects and motives to consumers’ adoption of e-commerce; according to Tauber (1972) these motives are primarily personal (self-gratification, physical activity and sensory stimulation) and social (communication with others, peer group attraction and status/authority). Personal and social needs are both related to the hedonic aspect of purchasing items, the shopping enjoyment. The market research conducted by Svensk Digital Mathandel (2014) presents an increased use of online grocery shopping and that the consumers tend to continue to purchase their groceries online after trying it.

2.2 Theory of Planned Behaviour

The Theory of Planned Behaviour aims at describing the influences and mechanisms behind actions performed deliberately and are an extension of the Theory of Reasoned Action (TRA) by Fishbein and Ajzen. The Theory of Planned Behaviour has been described as one of the most influential and popular frameworks for the study of human action (Ajzen, 2002).

As mentioned above, two assumptions provide the foundation of the Theory of Planned Behaviour. The first is the assumption that individuals are given enough resources to make a rational choice and evaluate the best behavioural alternative. The second assumption involves the importance of intention. Intention represents the decision for one chosen alternative and the will to perform just that special behaviour (Ajzen, 1991). According to
the theory, the intention to perform certain behaviour is influenced by three main components (see Figure 2.2):

The **attitude** towards an action, the attitude is defined as the sum of all accessible beliefs about the action performed (Ajzen, 1991).

The expectations of other people - the social influence on the decision to perform an action, measured as **subjective norms** it can also be described as normative beliefs resulting in social pressure (Ajzen, 2002).

**Perceived behavioural control**, which is referred to as the amount of control people believe to have over their actions (Ajzen, 1991). It is also described as the ease or difficulty of performing a certain action or behaviour (Ajzen, 2002).

![Figure 2.2 Figure of the Theory of Planned Behaviour (Fishbein & Ajzen, 1975)](image)

The main components of Theory of Planned Behaviour are attitude, subjective norm, perceived behavioural control, intention and behaviour. What the five variables include and how they influence each other will be described in-depth below.

### 2.2.1 Attitude

Attitudes are a learned tendency to evaluate objects in a certain way and it is often stated that attitudes facilitate adaptation to the environment (Ajzen, 2001). Fishbein and Ajzen (1975) refer to an attitude as a person’s location on a bipolar evaluative or affective dimension with respect to an object, action or event. They argue that an attitude represents a person’s general feeling of favourableness or unfavourableness towards some stimulus objects.

**Attitude Development**

There are several strategies that suggest different approaches to which an attitude is formed. One of the most recognized theories is the Fishbein model by Fishbein and Ajzen (1975), which suggest that an attitude forms strictly in a cognitive process, meaning that it origins from solely analytical, deliberative evaluative categorization. The Fishbein model describes the formation of attitudes as a deliberative or rule-based approach emerging from cognitive beliefs that are previously stored in explicit memory (Fishbein & Ajzen, 1975). A cognitive belief is referred to the sub processes or mechanisms that is connected to the
consumers information processing and reactions of external stimuli, taking place in the mind of the consumer (Klöckner, 2011a).

Attitude objects can be divided into two types of categories: products and services. Products and services both consist of functional properties, it is here the attitudes towards the attributes within the product or service are developed. Their affect, utility and value which refers to the hedonic consequences, gets the consumer to evaluate and develop attitudes against what value the product or service has. Different brand attributes such as package design of the product, advertisements in print and digital form and what manufacturer it is, connects to the symbolic and social representations of the product or service, this refers to the external stimuli that the consumer is exposed to. Researchers and managers within marketing rely heavily on attitudinal surveys to estimate people’s preferential responses to objects and items such as brands, products, websites etc. Therefore it is very important to understand how an attitude is formed in the mind of the consumer as well as how intentions and behaviour is influenced by attitudes (Argyriou & Melewar, 2011).

Attitudes are often used to find and measure attitudinal differences between different segments of the population (Ajzen & Fishbein, 1980). In order to assess a person’s attitude towards a specific behaviour one can use scaling models. An attitude towards behaviour in this research implies that it is a person's judgement whether the behaviour is positive or negative (Ajzen & Fishbein, 1980). It is important to keep in mind that this measuring approach can also be implemented when measuring intentions of behaviour, which is the purpose of this research.

**Positive Attitude**

An attitude is described as a learned tendency to evaluate an object, which would indicate that a positive attitude is a learned tendency that evaluates an object as being favourable. Positive attitudes are described as consumer positive evaluations of an object attributes based on beliefs. If a consumer believes that a certain attribute is favourable it is easier to develop positive attitudes towards a product, which possesses this certain attribute (Fishbein & Ajzen 1975). According to Shavitt (1990) a stimulus needs to emphasize the appropriate attitude functions in order to evoke a positive attitude. Shavitt (1990) also states that objects such as products and brand emphasize different functions in order to create a positive attitude. By logic it is said that a person with positive attitudes towards an item will perform positive behavioural actions and tasks. On the contrary if a person has negative attitudes towards an item the likelihood of positive actions and behaviour decreases (Peabody, 1967). Even if it is often said that positive attitudes leads to a positive consumer intentions and consumer behaviour, it is difficult to prove since the measure of attitudes and their impact on intention and behaviour is complex to measure and compare since they are intangible (Fishbein & Ajzen 1975).

**2.2.2 Subjective Norm**

Subjective norm can also be referred to as social pressure, or social norm, is presented as the “rules and standards that are understood by members of a group and that guide and/or constrain human behaviour without the force of laws” (Cialdini & Trost, 1998, p.152). Further, it has been shown that normative social beliefs influence behaviour as long as the behaviour is public, not when it is private and the person conducting the behaviour is no longer under surveillance by others (Prislin & Wood, 2005).
As mentioned in section 2.2, a subjective norm is one of the factors influencing intentions. A subjective norm can be seen as the social pressure from a referent to perform or not to perform certain action. They are based on normative beliefs, which along with behavioural- and control beliefs constitute the salient beliefs determining a person’s intentions and actions (Ajzen, 1991). The normative belief is a belief about another person and his/her behaviour and it is the perception that is of essence – whether the person in question believes that a referent thinks that he or she should, or should not, perform the behaviour. However it must be acknowledged that not all referents’ opinions about behaviour are of importance: only the salient referents will affect the subjective norm. In order to assess a person’s subjective norm, the general motivation to comply with relevant referents must be determined since this enables an assessment of referents and their individual weight of importance on a person’s behaviour (Ajzen & Fishbein, 1980). Cialdini, Kallgren & Reno (1991) divided normative beliefs into descriptive and injunctive norms. Furthermore a person’s injunctive norms concern the beliefs of other referents – if other people in the group approve or disapprove. A descriptive norm is the perception of how it is “normal” or common to behave in a certain situation.

The discussion and research conducted by Trafimow and Finlay (1996) concerning the subjective norms and attitudes is quite extensive and debates whether attitudes or subjective norms predict behavioural intention more strongly. While attitudes normally influence behavioural intentions to a greater extent than subjective norms, it has also been proposed that this may differ since people’s subjective norms can be categorised into either attitudinal or normative controlled. Whether a person is classified as normative controlled is determined based on whether the reasons to perform a certain behaviour is attitudinal or normative (Trafimow & Finlay, 1996).

### 2.2.3 Perceived Behavioural Control

Perceived behavioural control is the amount of control consumers believes they possess over a certain action. Perceived behavioural control was added into the Theory of Reasoned Action model in an attempt to deal with situations where consumers might lack control of the behavioural interest. When the consumer possesses a strong control over the behaviour they are expected to take action based on their intention whenever the next opportunity arises. The main purpose of measuring perceived behavioural control is the ability to predict the actual behaviour in question. Perceived behavioural control is measured by asking direct questions about the consumers’ actual ability to take action towards certain behaviour or to deal with factors that might constrain or enable the action in question.

The perceived behavioural control depends on the presence of several internal or external factors that either aid or prohibits the behaviour. The perceived behavioural control consists of two main groups of control; self-efficiency and controllability (Ajzen, 2002). The actual behaviour has a direct link to perceived behavioural control mainly due to two assumptions: (1) it has been concluded that a successful outcome of the behaviour is more likely to increase with perceived behavioural control and (2) the perceived behavioural control can be substitute for a measure of actual control, however this is determined by the accuracy of the perceptions (Ajzen, 1991).

### 2.2.4 Intention

Ajzen (1991) explains intentions as the motivational factors that influence behaviour, more specifically “they are indications of how hard people are willing to try, of how much of an
effort they are planning to exert in order to perform the behaviour” (Ajzen, 1991, p181). In order to be able to predict that an intention leads to behaviour the measurement of intention must correspond to the measure of behaviour (Ajzen & Fishbein, 1980). Further, it is concluded that the stronger the intention, the more likely is a person to perform this behaviour (Ajzen, 1991).

Fishbein and Ajzen (1975) further emphasises that intention is the best predictor of someone’s behaviour, however if the behaviour needs to be understood the factors behind these intentions are of essence. Based on Theory of Planned Behaviour the underlying factors behind an intention are attitudes, subjective norms and perceived behavioural control. For the intention to predict behaviour, two conditions must be met: (1) the measure of an intention must be made right before the behaviour, since intentions can change over time, (2) the behaviour must be of volitional control, which means that the person in question made a conscious choice or decision to perform this act (Ajzen, 1985), much like making a decision to purchase groceries online instead of in-store. According to Ajzen (2002) intentions are perceived as being correlated to the immediate behaviour. It is said that a consumer often intends to perform a behaviour if the beliefs about the action is evaluated positively and if people in their surroundings thinks that the action should be done. This indicates that positive attitudes and strong subjective norms have a positive influence on consumer intention of performing a behaviour (Ajzen & Fishbein, 1980).

2.2.5 Behaviour

Behaviour is described as an action in a form that can be observed - for example attending a meeting or buying a certain product in a store (Ajzen & Fishbein, 1977). Ajzen and Fishbein (1977) suggest that attitudes are held and behaviours are performed in respect to certain entities, in other words, it all depends on the situation of the item and person. Entities are influenced by different or several elements such as the action, the target, the context and time (Ajzen & Fishbein, 1977). Here the action is the behaviour, the target is at which direction the action is directed, the context in which the action is performed and the time is when the action is performed. It is also important to separate behaviour and outcome. For example success on exams is not a criteria that can be used for measuring behaviour since this might as well be an outcome of several actions such as studying hard, attending lectures or even copying someone else’s test answers (Ajzen, 1991).

Human behaviour is a very complex area to study (Ajzen, 1991) and the amount of behavioural categories is vast - a behavioural category can range from narrow categories such as raising funds for a political candidate to broader categories such as health maintenance. The behaviour theory within the Theory of Planned Behaviour suggests that there are two types of behaviour, positive and negative. A positive behaviour is when the certain action is performed and a negative behaviour is thus when the behaviour is not performed (Ajzen & Fishbein, 1980).

2.3 Consumer Involvement

Product involvement is defined by Zaichkowski (1985) as the extent to which the consumer perceives a product to be important. This reflects the consumer’s internal motivational state and the interest and drive caused by the product class (Bloch, 1981). The degree of product involvement affects the decision-making process and is therefore seen as an important aspect influencing purchase decisions (Richins & Bloch, 1986).
Purchasing groceries is regarded as a low involvement activity, which is recognised by a very small amount of information search (Beharrell & Denison, 1995). This is known as habitual buying behaviour, where the purchase has little involvement for the consumer and the decision-making is made easier by making the purchases based on previous purchases (Littler, 2015).

### 2.3.1 Habits

While the explanation and definition of habits varies heavily depending on the author and context, Verplanken and Aarts (1999) developed a suitable explanation for the phenomena. They state that habits are sequences of behaviour or acts that was learned and has become automatic responses to certain cues. Furthermore it is explained that these automatic responses are functional in the aim of specific end-states or goals. In other words, habits are behaviours that in a consistent context are repeated and eventually performed with little or non-existent thought process (Biel, 2011). This is emphasised in the research conducted by Wood, Quinn & Kashy (2002), where the findings showed that when a behaviour had become a habit, the participants were less likely to think and question their behaviour.

When an individual have strong habits, this will result in little search for new information and therefore little to no attention is directed to finding alternative courses of action. Based on the low involvement in information search and search for alternative options, Verplanken and Aarts (1999) argue that it is only when habits are non-existent or fairly weak that models such as Theory of Reasoned Action can be applied.

In the research conducted by Liao, Palvia and Lin (2006) concerning the roles of habits and web quality in e-commerce, habits are important to consider in e-commerce consumer behaviour due to the high impact on intentions. The link between direct continuance intention and habits proves that the past behaviour will have a large impact on the consumer’s assessment to continue with the behaviour or not (Liao et al., 2006). Purchasing groceries in a physical store is a habitual behaviour since it is repeated regularly in a consistent context (Biel, 2011). According to the Theory of Planned Behaviour (Fishbein & Ajzen, 2012), for a change in behaviour to occur - a change in habits - positive attitudes and intentions must be present.

### 2.4 Consumer Barriers

Previous market research has stated that consumers primary obstacle for using online grocery shopping is the fact that the ability to feel, touch and evaluate the products the same way is gone before taking the decision to purchase (Svensk Handel, 2014). This is also stated in the qualitative research made by Ramus and Nielsen (2005) where they investigated the Theory of Planned Behaviour regarding online grocery shopping and found that consumers expressed a concern for the inability to sense and select products by touching and feeling the products of interest. This was a major concern especially for perishable goods such as fruits, meat and vegetables. The consumers perceived risk increased concerning giving up the control of the selection of product, packaging and delivery to the retailer. Since the quality and of the goods and the safety of the transportation cannot be supervised by the consumer, the risk of getting damaged goods or the wrong goods delivered were perceived as negative for the service (Ramus & Nielsen, 2005). Another perceived barrier by the consumers within online grocery shopping is the fact that there is no ability to interact with store personnel (Agwu, 2013).
2.4.1 Resistance to Change

According to Ram, Jagdish and Sheth (1989) consumers’ resistance can be the final cause for market failure for an innovation. Consumer resistance is, according to Cambridge Dictionaries Online “the fact that people are being unwilling to buy a particular service or product” (2015). The resistance of the consumer is correlated to what kind of adopter he or she is (Ram, et al., 1989). The tendency to adopt an innovation is different between individuals, which has been categorized into five types of adopters are ranging on a scale, referring to the timing of adoption: innovators, early adopters, early majority, late majority and laggards (Littler, 2015).

The consumer’s resistance of innovation is affecting the timing of adoption (Ram et al., 1989). An innovation is defined as an idea or invention that is being processed into a good or service and it is new to the market. It must be replicable at an economical cost and satisfy a specified need (Businessdictionary.com, 2015) Consumers that decides whether or not to purchase an innovation are depending on different factors in their personal identity and behaviour; their age, cultural preferences, income level, how easy it is to learn the usage, the innovation’s usefulness and the value it brings to the consumer to use the innovation (Aguila-Obra & Padilla-Melendez, 2006).

To encounter the resistance from customers, one has to consider barriers of functional and psychological nature. In Agwu’s (2013) research concerning reluctance and resistance and adoption to a specific e-commerce service in the United Kingdom, the functional and psychological barriers of consumer resistance were stated to be reasons for low adoption in the case of e-commerce services. The psychological barriers are barriers of tradition and image, which are often caused by triggering a questioning of the consumer’s prior beliefs and values. The more the deviation from what is considered and has been established as an important tradition, is needed to adopt an innovation, the greater is the resistance. Considering the image barrier, innovations include a certain identity and associations. It is clear that the image barrier is perceptually bounded and derives from stereotyped thinking, which makes it hard for an innovation to break through if the associations are unfavourable (Ram et al., 1989).

The functional barriers consist of three different types; product usage, product value and risks associated. The usage barrier has incentives that require changes in the routine of the consumers, which depend on relatively longer development to gain consumer acceptance (Ram et al., 1989). Since innovations requires great or technical changes in the consumer’s routines, is the usage barrier known to be the primary reason for resistance of innovation and therefore demands a long process to adjust and accept the usage of it (Lee, 2009). The value barrier explains that the incentives favouring the innovation must be stronger than a substitute. By comparing the performance to price with a similar product or service, the customer will evaluate the value of the innovation (Ram et al., 1989). The risk barrier is important since all innovation represent uncertainty to some extent. As there are different types of risk to consider, such as physical, economic, functional and social risks, the customers postpone the adoption of innovations until they know more about the risks. Physical risks are harm that can be done to persons or property, economic risk are the cost of investing in the innovation, functional risk relates to the performance of the innovation and social risks are the resistance customers feel as they may face social exclusion if they adopt to the innovation (Ram et al., 1989).
2.5 Relevance of Theories

In order to understand and measure the relationship between attitude and consumer intention, which is the purpose of this research, several central theories about behaviour is of great significance. The Theory of Planned Behaviour establishes the connection between attitudes and intention. It also includes subjective norms, perceived behavioural control, which is believed to influence intentions as well. The Theory of Planned Behaviour has previously shown to be of great significance when measuring and predicting consumer adoption towards online grocery shopping (Grandón et al., 2011). The results gained by investigating the Theory of Planned Behaviour with positive attitudes will enable the researchers to fill the gap in the existing research.

By investigating theories that describes different factors connected to consumer involvement and barriers, additional dimension to analyse the empirical findings is gained. Online grocery shopping is part of the e-commerce industry and thus e-commerce as a market and online consumer behaviour is elaborated upon. Based on the difference between traditional consumer behaviour and online consumer behaviour, involvement and barriers for changing routines and purchasing groceries online is included. Aspects of consumer adoption are added, since online grocery shopping is classified as an innovation and thus it might cause attitudes and intentions to differ from regular consumer behaviour. Grocery shopping is a behavioural category that differs from other behavioural categories because of the habitual nature of the purchasing process. Therefore the aspect habit is included and will be of essence when analysing the different factors of Theory of Planned Behaviour with regards to the intention of purchasing groceries online.

2.6 Hypothesis Development

Based on the review of relevant theories previously presented and in connection to the research question, hypotheses have been developed accordingly. According to Saunders, Lewis & Thornhill (2012) a hypothesis is a proposition that measure a significant difference or a relationship between two or more variables. There is also an alternative hypothesis, which states the opposite of the original hypothesis.

2.6.1 Hypotheses

According to Grandón et al. (2011) there is a significant gap in the field of positive attitudes and their influence on consumer intentions within e-commerce, based on the Theory of Planned Behaviour. In connection to the promising online grocery market situation in Sweden and the Theory of Planned Behaviour, the hypotheses for this research have been developed accordingly. The Theory of Planned Behaviour claim to show a relationship between the model’s first three concepts of; attitudes subjective norm, perceived behavioural control and the following step of concepts in the model; intentions and behaviour. However behaviour according to the Theory of Planned Behaviour is in the future, as a follow-up for the initial investigation, therefore the Behaviour is not tested within this research. These hypotheses are testing if each of the first concepts is influencing positive intentions (see fig 2.3).
Hypothesis 1 (H1)

\( H_0 = \text{Positive attitudes does not influence intentions within online grocery shopping to be positive} \)

\( H_1 = \text{Positive attitudes influence intentions within online grocery shopping to be positive} \)

Hypothesis 2 (H2)

\( H_0 = \text{Strong subjective norms does not influence intentions within online grocery shopping to be positive} \)

\( H_1 = \text{Strong subjective norms influence intentions within online grocery shopping to be positive} \)

Hypothesis 3 (H3)

\( H_0 = \text{High perceived behavioural control does not influence intentions within online grocery to be positive.} \)

\( H_1 = \text{High perceived behavioural control influence intentions within online grocery shopping to be positive.} \)

Figure 2.3 Figure of the hypotheses derived from Theory of Planned Behaviour
3 Methodology & Method

In this section, the methodology of this research will be explained, including the research strategy, philosophy and approach. Furthermore, the method will be outlined with secondary and primary data. The section will be concluded with specifics about the primary data collection and data analysis.

3.1 Methodology

According to Saunders et al. (2012) a research is something that is undertaken to find the answer of an issue in a systematic way in order to increase knowledge. Thus this is regarded as a research since the aim is to increase knowledge about the attitude-intention relationship within the online grocery market in Sweden. In a research it is important to know the difference between method and methodology in order to explain the research and how it will be conducted. Methodology refers to the set of theory of how the research will be undertaken; this includes research strategy, philosophy, approach and technique. Method is the set techniques and procedures in which the research will be conducted, in other words it describes how data will be collected (Saunders et al., 2012). This research will use a quantitative method when conducting primary data. However, in order to fully understand the choice of method, the concepts concerning methodology will be further elaborated below.

3.1.1 Research Strategy

A research strategy is the plan of action implemented to achieve a goal that is set for a research. An explanatory research strategy aims to explain how one phenomenon is related to another (Saunders et al., 2012). Considering the research question; “Does consumers’ positive attitudes influence the decision of purchasing groceries online?” and the testing of the Theory of Planned Behaviour, an explanatory strategy is chosen for this research. An explanatory research strategy aids in explaining and investigates the relationships of the variables of the Theory of Planned Behaviour within the online grocery market and gives an explanation that later on can be generalized in theory (Saunders et al., 2012).

3.1.2 Research Philosophy

In order to conduct a research in an appropriate manner aligned with the purpose and research strategy, knowledge regarding the appropriate research philosophy is vital. For this research a realism philosophy is chosen. It is said to be the most cohesive philosophy for an explanatory and quantitative research in order to achieve a generalizing result. Realism is a philosophical position associated with scientific research because of its objectiveness in how the world is perceived. It claims that the reality is quite independent of the human thoughts and beliefs (Saunders et al., 2012). Furthermore, this research is suitable for a realism philosophy since the measures are numerical in nature.

In realism, knowledge is perceived to be obtained through an observable phenomena and real facts from credible data. The quantitative method in this research enables a large amount of data to be collected and thus gives the possibility to obtain observability of a phenomena (Saunders et al., 2012). Additionally, the realism philosophy suggests the explanation in the data collection should be conducted within a context. To implement this, the survey used in this research will contain statements, which explains for the respondent in which context they are to base their judgements on. Within this research all statements will be in context of online grocery shopping and e-commerce.
According to realism, the valuation of the results is expected to be distorted since the researchers are biased by their cultural experiences and preference (Saunders et al., 2012). Therefore it is important to consider the distortion when analysing the collected data, in order to give an as explanatory perspective as possible in this issue. This is further elaborated upon in section 3.5 along with other limitations of the method.

3.1.3 Research Approach

Deductive

A deductive approach is chosen for this research since the area of research already contains existing theories that have to be taken into consideration and therefore also used as theoretical framework. A deductive research approach develops a theoretical framework before collecting primary data explicit for the cause of the research (Saunders et al., 2012). The aim of a deductive approach is to state a set of premises based on theory that explains causal relationships between different variables and question them in an objective manner, which is implemented through the hypotheses within this research. The development of the hypotheses is based on the Theory of Planned Behaviour, which will be tested and analysed by the primary data collected. This is in order to compute statistical regularities into measurable variables and connect them to theories to enable an analysis of quantitative findings, which is in accordance with a deductive research approach (Saunders et al., 2012). How this will be implemented will be further explained in the method (section 3.2), which will describe the generalizing and operationalization of the theories more thoroughly.

Quantitative Method

In order to succeed with finding the relationship between attitudes and intentions within the online grocery market, a quantitative approach is chosen for collecting and analysing primary data. The method chosen for the empirical study will be done through a single data collection, also called a mono-method (Saunders et al., 2012). This means that the only primary data collection conducted in this research will be the quantitative study. This suits the aim of testing the attitude-intention relationship based on the Theory of Planned Behaviour within online grocery shopping. Using a quantitative approach enables statistically bounded results and is feasible within the time frame of this research. In comparison to a quantitative approach, a qualitative approach gives more profound, in depth and multifaceted results. These type of results could be more difficult to implement without the researcher losing the objectiveness, which is of importance in this research (Saunders et al., 2012).

A quantitative approach enables larger amount of data to be collected and provides the research with numerical data, which later can be statistically interpreted. In this research it enables the variables within the Theory of Planned Behaviour model to be measured in an accurate measure, this is of value since ability to measure the data is of importance (Curwin, Slater, 2007). Attitudes can be analysed through quantitative measurements by using a system of scale, for example the Likert Scale Approach (1932). This scale approach will be implemented within this research and the results will be interpreted through statistical analysis, further explained in the data analysis (section 3.3).

The research technique for this research is an online survey, which will enable the collection of the quantitative data needed in order to answer the research question. It is argued that an online survey is applicable in this research since it will facilitate the collection of larger amounts of standardised data from the selected sample. A survey is one of the most reliable and used strategies in business research concerning consumers’
investigations. Moreover, in this research it is suitable since it also enables a non-personal approach towards the respondents. It is therefore aligned with the objective perspective of the researcher, which as mentioned is of importance in this research. Additionally, the online survey technique is less time consuming than other techniques and does not have any budget constraints (Saunders et al., 2012).

3.2 Method

3.2.1 Data Collection

As previously mentioned this is a deductive research, which is based on existing theories, that aims to explain and investigate the relationships between the variables of the Theory of Planned Behaviour within the online grocery market. Both secondary and primary data is collected in order to fulfil the purpose of this research to the full extent (Saunders et al., 2012).

3.2.2 Secondary Data

Secondary data is collected in order to investigate what has already been stated within the research area and to enhance the outcome of the research question (Saunders et al., 2012). The secondary data in this research was collected from databases and literature found in connection to the Jönköping University Library. To gain knowledge on the process of collecting secondary data, a meeting was scheduled with the subject librarian. This meeting gave the researchers insight on several other databases available through the Jönköping University Library website. Examples of databases accessed were Sage Knowledge, Emerald and Springer Business and Management Journals. In addition to these databases, Google Scholar was used to some extent together with relevant subject books within the field of study.

When searching for articles and journals with relation to this research the following keywords was used: E-commerce, Development, Adaptation, Consumer Behaviour, Attitudes, Consumer resistance, Positive consumer attitudes, Online grocery shopping, Theory of Planned Behaviour, Sweden. In the beginning of the search process there was a lot of results found that unfortunately was found irrelevant for this research. This led the researchers to modify and limit the keywords to be more specific within the subject researched.

To ensure reliability of the articles used in the research, only peer-review articles was selected. To further ensure the reliability, the aim was to only include articles, which were highly cited since they are considered to be of a higher academic value. Articles regarding online consumer behaviour, e-commerce and online grocery shopping was aimed to be written after year 2011 since the development of these subjects moves rapidly and information prior to this year could be considered to be out-dated.

3.2.3 Primary Data

The approach of gathering primary data was conducted using the online survey tool Qualtrics and the respondents were reached through online communities frequently visited by the sample. The findings were processed using SPSS and analysed in accordance with the Theory of Planned Behaviour and other explaining theories. Moreover, the sampling, questionnaire design and data analysis will be further elaborated below.
3.2.4 Sampling

Non-probability Sampling

In every research it is more useful to collect data from a sample than an entire population. The use of collecting data from a sample is preferable since it is time and budget consuming as well as inefficient to conduct a survey on the entire population (Saunders et al., 2012).

When choosing sampling technique, one can consider two types of sampling techniques; probability (representative sampling) or non-probability (judgemental sampling). In a probability sampling approach, each case within the sample are being selected from the population by a predetermined pattern, which is often conducted in surveys and experimental research strategies. In a non-probability sampling the selection of cases is not known from the start. The probability sampling technique assumes the sampling will include every respondent’s answer. This is commonly not used in business research, since it is not possible to collect such complete data when doing market researches through surveys. Therefore non-probability sampling is used. This means that the individuals that are participating in the survey will be chosen randomly (Saunders et al., 2012).

The purpose of this research is as mentioned explanatory and therefore a self-selection sampling is the most suitable sampling technique. This enables the researchers to ask the possible respondent to take part and those who agree will partake. It also aids the researchers ability to remain objective since the interference of the researcher with the respondents is minimized and thus will the sampling minimize the risk of influencing the respondents (Saunders et al., 2012).

Sample Selection

The samples selected for this research are adults living as a family in Sweden. The decision to target this particular group is based on a report from SCB (2013), which clearly states that family households use the Internet to purchase items to a larger extent than non-family households. According to this report, groceries is one of the categories that makes a difference in this statistic, 11% of the family households purchased groceries online at one time, while only 5% of the non-family households purchased groceries online during the same period (SCB, 2013).

The collection of data will be conducted online and the respondents will be reached through online communities and blogs targeted towards families. Online forums (see Appendix 1 & 2) within these communities are considered a well suitable media of communication and discussion within families since they tend to engage people (Dowerah Baruah, 2012). The communities where the questionnaire will be published at are first and foremost vimedbarn.se, familjeliv.se, alltforaldrar.se and viforaldrar.se. The average amount of people visiting the communities is 35 000 individuals weekly (Viforaldrar.se, 2015). The members of these communities are either adults expecting children or have children in the ages of 0-12. Furthermore, it can also be seen that the average age for the adults with children around these ages are between 30-44 years (Statistikdatabasen, 2015). Therefore it is expected that the selected sample will be accessible through online communities, blogs and forums.

The sample selection should have a logical relationship with the purpose of the research. One should look at what kind of theory is supposed to be investigated, not the size of the population. The sample size should be based on the research question and it’s objectives, what needs to be answered in order to make it a credible result (Saunders et al., 2012).
There are a lot of different suggestions to how the relationship should look like. Since this research is using statements the theory of number of respondents to statements is applied. The lowest amount suggested is 5 respondents to 1 statement, others suggest 10 to 1 ratio as the lowest acceptable number of respondents (Pallant 2013). This is something that the researchers had in mind when designing the questionnaire and deciding of how many respondents was to be collected. Since there are 27 statements, the aim was to have at least 135 respondents, in order to have a 5 to 1 ratio sample. The amount of respondents will represent the selected sample accordingly and give comprehensive results of whether positive attitudes influence intentions of purchasing groceries online or not.

3.2.5 Questionnaire Design

The design of this questionnaire is based on the scale method called the Likert Scale Approach, which is a well-known approach for measuring attitudes (Brill, 2008). The main focus for this research is to find whether positive attitudes have an influence on consumer intention within online grocery shopping. There are several scale approaches which one can use to measure attitudes. The Likert Scale Approach implements a statement approach, which will be implemented in this research. This means that a statement will be expressed in the survey and the respondent will be asked to answer to what extent they agree to the statement (Brill, 2008).

Scale Approach and the Likert Scale Approach

There are several scale models developed in previous research, however the one that in most reassuring is the Scale Approach of Equal Appearing developed by Thurstone (1929) and Likert (1932). To fully comprehend the complexity of a scale approach one must first understand the underlying fundamentals of Thurstone’s scale approach framework.

The Scale Approach of Equal Appearing is based on three main steps. The first step within this approach is to collect as many possible beliefs that are related to the object in question, in this research it is the beliefs about online grocery service. The second step is to perform a quantitative study where a sample of representatives evaluates these beliefs in order to set the attributes that are most favourable or unfavourable (Thurstone, 1929). This process enables the researchers to refine the beliefs based on strong disagreements among the sample that should not be included in the research. This is called the criterion of ambiguity. The third step to decide whether a belief should be included is through the theory of irrelevance, which states that an item should be eliminated if it fails to discriminate between respondents with different attitudes. The scale is then ready to assess the attitudes of different individuals. Each person is then asked to answer statements, which he or she agrees or disagrees to (Thurstone, 1929). Due to the restricted amount of time and the applicability of the approach, the Likert Approach will be implemented in this research. The Likert Scale Approach is developed under the same academic circumstances however it is simplified and does not use the additional step to identify the attributes through an additional quantitative research (Likert, 1932).

The Likert Scale Approach consists of 5-7 scales, which could be formulated as following: Totally disagree - Disagree - Neither disagree nor agree - Agree - Totally agree. Each belief is then given a score between 1 and 5 where 1 is “totally disagree” and 5 is “totally agree” and 3 is given to the “neither disagree or agree” (Ajzen & Fishbein, 1980, & Likert, 1932). The scale used in this questionnaire is as follows; Strongly disagree (1) – Disagree (2) - Neither disagree nor agree (3) – Agree (4) - Strongly agree (5). The scales state a level of agreement and are a vital part of measuring attitudes (Bruner et al., 2001 and Sage e-dictionary, 2015). The attitude score is then obtained by computing the median and mode.
of each person's answer (Likert, 1932). The questionnaire for this research will be designed in Qualtrics, which enables researchers to find suitable tools in based on the applicable method, to test and find specific data.

Previous research and findings by Hansen, Jensen and Solgaard (2004) shows that the Theory of Planned Behaviour is the most appropriate model to use when measuring attitudes and its impact on behaviour within online grocery stores. Statements chosen for this research is the statements made by Hansen, Jensen and Solgaard’s research since it showed great success. Grandón et al. (2011) implemented the Theory of Planned Behaviour approach when measuring the adoption of e-commerce and showed a great example of how to formulate statements within the research to receive the best results. The statements are divided into four different sections as in the previous data findings: attitudes, subjective norm, perceived behavioural control and intention (Grandón et al., 2011 & Hansen et al., 2004). The different statements within all four sections are formulated in a reversed-wording approach, meaning they are both formulated in a positive and negative way (Grandón et al., 2011). This will enable the development of the results to become more accurate. This has been previously proven to be successful within research of the Theory of Planned Behaviour. It enables a switch of the results and gives the results a more specific and valid answer since the results of the positive and negative formulations can be compared against each other in order to see the real perception of the consumer (Grandón et al. 2011).

**Questionnaire Description**

The questionnaire will begin with a short introduction and explanation of the purpose of the research and the reason why they are selected to be apart of the research (see Appendix 3 & 4). The respondent will be informed of the anonymity of the survey and the time effort it will approximately take to finish the survey. The first two questions will get the respondent to answer if they previously have tried online grocery shopping and whether they use it today as a part of their family routines and if so how often. This information is important since it is of interest to measure attitudes from consumers to see if current behaviour influence results.

The first part of the questionnaire will measure the respondents’ intentions towards implementing online grocery shopping within the next year, intention of change and technology adoption. The second part of the questionnaire measures the respondents’ positive attitudes towards online grocery shopping implementation, change and technology implementation in general within their family routines. The following part regards the subjective norm, which measures the influence of the respondents’ friends and family thoughts towards online grocery shopping implementation, change and technology. The last part of the questionnaire measures the respondents’ perceived behavioural control of implementing online grocery shopping, change in behaviour and technology adaptation. All statements are influenced from previous data collection within this specific topic and the answers of the statements are based on the Likert Scale Approach (1932).

The second part of the questionnaire asks the respondent to provide their demographical information. This information will enable the respondents to be divided into several clusters and to find other underlying factors influencing the results. The first questions in part two focuses on gender and age. The following questions in the questionnaire are related to education, work situation and family situation this will enable the results to be generalized. This information is important thus it enables the target group for this research to be identified and selected easier when analysing data. The following questions gives
information about the weekly average amount of money the respondent spends on food and their average household income during a year. The last question asks the respondent to indicate their geographical location. The geographical location will enable an analysis of potential differences of the attitude-intention relationship between cities.

### 3.3 Data Analysis

Due to the quantitative Likert Scale Approach used when collecting the data, the data is ranked, which can also be called ordinal data. This type of data is along with the quantitative data is required to be processed and compiled before it is interpreted and analysed. The data processing started with importing the data from Qualtrics to SPSS. This is done so that the data is accessible and useful for its purpose (Saunders et al., 2012). The data processing and analysing program used for this research was IBM SPSS Statistics, which is a well-known program used to compile, process and analyse data collected for research (IBM SPSS Statistics, 2015).

The first step in the process of analysing the data would normally be to recode all variables measured, however due to the compatibility of Qualtrics and SPSS programs the values was already coded accordingly when importing the raw data. In order to analyse the demographic attributes of the respondents, a frequency analysis was conducted within SPSS. This computed the mean, median, mode and standard deviation of all responses, which enabled the researchers to see the things such as the average age, income and how large percentage of the respondents were male or female. Descriptive variables showed through nominal and ordinal questions such as gender and age was compiled in order to establish if the target group was reached successfully. This information is also useful when determining whether current behaviour vary depending on for example income or age.

In order to answer the research question and the hypothesis tested within this research several analytical steps needs to be conducted. A frequency count is the first analysis computed, factor analysis is the second method implemented, followed by a descriptive analysis which is later followed by a correlation analysis is conducted and thereafter a multi linear regression analysis is computed in order to provide statistical proof.

#### 3.3.1 Factor Analysis

The factor analysis is applicable within this research since it takes a larger set of variables and computes them into one new variable, in order to be able to do the multi linear regression analysis. It is also a great method used when interpreting and evaluating tests and scales, which is used in this research (Pallant, 2013).

The first step within the factor analysis is doing an assessment of the suitability of the analysis. This shows whether or not the particular data set is suitable for a factor analysis, this includes sample and the relationship strength among the variables. This is done through the Kaiser-Meyer-Olkin measure of sample adequacy. The process to do a comprehensive factor analysis was long and extensive since one has to carefully analyse the outputs and select the factors with most significance. Within the factor analysis a factor loading analysis was done in order to see if the statements tested can be used within the factor analysis. The factor loading analysis shows if the statements correlate to each other and if there is any statement that is not in correlation with any other statements. The factor loading analysis within this research is done with statements of attitude, subjective norm, perceived behavioural control and intention, since they all have several statements that have been measured (Pallant 2013).
The second step within the factor analysis after the factor loading is finalized, is to perform a factor extraction. This decides exactly the number of factors that is to be used within the interrelations of the variables. It led the researchers to select 3 variables each within attitudes, perceived behavioural control and intention. 4 variables were selected within subjective norm. The final step within the factor analysis is to do a factor rotation and an interpretation. The statements that were selected for the factor analysis were the statements based on the findings of Grandón et al. (2011). The findings enable the researchers to interpret the results of the factor analysis before computing a new variable (Pallant 2013). Automatically when the factor analysis is completed with the right number of statements (factors) new variables for attitude, subjective norm, perceived behavioural control and intention was computed.

Control variables was created and included in the independent variables, in order to see if any additional factors influence intentions within online grocery shopping. The control variables that was taken into account was all the demographic variables such as age, family situation, work situation, current behaviour and average spending. Some of the control variables had more than two values such as education which had three, therefore those variable values had to be recoded into two values before used in the regression analysis (see Appendix 5).

3.3.2 Descriptive Statistics
In order to further evaluate the results of the empirical findings within attitudes, subjective norms, perceived behavioural control and intentions the mean of the statements that was selected in the factor analysis SPSS. The descriptive analysis showed the average of each statement given by the respondents. This approach was done according to the Likert Scale Approach and implies to which level the respondents agrees or disagrees with the statements presented to them in the questionnaire (Likert, 1932). This method enabled the researchers to gain deeper understanding of the empirical findings.

3.3.3 Correlation Matrix
A correlation matrix was computed in order to see any relationship between the new variables computed within Theory of Planned Behaviour and the control variables. This provides a further explanation about influencing variables. A correlation matrix is used to show the strengths and direction of a linear relationship between two variables (Pallant, 2013).

3.3.4 Multi Linear Regression Analysis
When the factor analysis is completed the next step is to do a multi linear regression analysis, which shows if there is any relationship between two variables. The dependent variable tested is the new variable computed for intention and the independent variable tested is the new variable for attitude, subjective norm and perceived behavioural control and the control variables.

The values that was of importance and taken into consideration from the multi linear regression analysis was the level of significance, which shows if the variables are correlated, and the Beta-coefficient that shows whether the relationship is positive or negative. These values enabled the researchers to statistically see the relationship between the variables tested. In order for a variable to be significant within the regression the p-value should be lower than ,05 (p<,05). Based on the results obtained one can answer the research question and hypothesis with a 95% confidence interval (Pallant, 2013).
3.4 Quality of Research

According to Saunders et al. (2012) it is of importance that the research is of high validity and reliability. Reliability and validity is connected to transparency, meaning that other researchers should easily implement the method chosen. Validity within a research is connected to the right choice of method in order to find the appropriate results. Within this research, the validity is ensured through previous research findings, which indicate that the statement approach within the Theory of Planned Behaviour is suitable to measure attitudes of the consumer towards e-commerce and online grocery shopping (Grandón et al., 2011 & Hansen et al., 2004).

Further validity and reliability insurance within this research is the added response requirement on all questions within the questionnaire. This ensures that all respondents are required to answer all questions within the survey. The collected responses can therefore be evaluated of equal importance. The design of the questionnaire has been formed to be as transparent as possible in order to ensure that others can implement this research again. However since this questionnaire is sent out to respondents via forums online, the control of who answers the questionnaire is lost. This could impact the quality and validity of the result, since the people responding to the questionnaire might not feel the need to be as honest as if the questionnaire was done face to face.

3.5 Limitation

One limitation of the method outcome is the number of respondents collected in the empirical findings. The lack of respondents within the research needs to be taken into consideration when reading the results and analysis of this research. There are several suggestions of what is the lowest number of respondents for this type of research. The lowest suggestion of the relationship between the number of statements and respondents is 5 to 1 (Pallant 2013). This research with 13 used statements and 85 respondents end up at a 6 to 1 ratio, which is within suggested theory, however it is on the lower side, which is seen as a limitation.

An additional limitation of the method presented is the chosen scale approach. The Likert Scale Approach does not enable any additional steps in order to find attributes of an object worth tested within the sample. This is something that could not be done due to some time limitations, however it is suggested to implement when measuring attitudes.

The statistical background of the researchers was a challenge since the process and analysis of results require complex knowledge of SPSS and its functions. While this did not affect the end-result, it is still considered a limitation since it had a considerate impact on the time frame of the research.

3.6 Summary of Method

Due to the complex purpose of this research – to investigate if positive attitudes influence the intentions to purchase groceries online – it was found that an explanatory research strategy was the most suitable approach to this research. Through the research philosophy it was established that a deductive research was going to be used since it stated a set of premises that were based on earlier theories and questions variables as well as relationships between variables in an objective manner.

The method consisted of secondary as well as primary data with a quantitative approach. Secondary data gave a comprehensive view of current literature as well as a gap within the
research. It also fulfilled the purpose of establishing which theories and models that was to be the most suitable for this type of research. The primary data collection was done through an online questionnaire using a Likert Scale Approach. The structure of the questionnaires was based on Theory of Planned Behaviour, which examines the attitudes, subjective norms, perceived behavioural control and intention towards purchasing groceries online.

The data was imported and processed within the computer-program SPSS. The data was then analysed through several approaches. A frequency analysis was done on the descriptive variables, such as age, gender and income. The factor analysis and the multi linear regression analysis provided statistical proof of the correlation between the variables that will be presented in the following section. Further a descriptive analysis was computed in SPSS in order to find the means of each statement within the factor analysis. The descriptive empirical data analysis interpreted according to the Likert Scale Approach (1932). The descriptive analysis enabled the researchers to further analyse the empirical data found.
4 Results

This section will contain findings from the empirical study. The demographics of the respondents will be presented along with findings from the factor analysis, multi linear regression analysis and the descriptive results of the statements based on behaviour, attitudes, subjective norms, perceived behavioural control and intentions. The section will be concluded by answering the proposed hypotheses.

4.1 Demographics

The questionnaire collected 85 responses in total.

4.1.1 Gender

76 (89%) of the respondents were female and 9 (11%) were male.

![Figure 4.1 Figure of the gender distribution of respondents](image)

4.1.2 Age

The mean of the age variable of the respondents was 4.38, which translates to that the average age of the respondents is 30-35 years old; this age group had 26 respondents. The age group 25-30 had 15 respondents and there were 11 respondents between the ages of 35-40. This indicates that the majority, 62% of the respondents are between the ages of 25-40.
4.1.3 Level of Education and Household Income

68 respondents, which equal 80%, indicated that they have an education higher than upper secondary school such as college or university. 58% respondents indicated that their work situation is full time, after that comes student or part time with 19% of the respondents each. 66 respondents or 77% of the sample indicated that they either have children or has a child on the way. The largest group was married with children, which accounts for 40 respondents and 47% of the total sample.

The average annual income of the respondents households was 600.000-700.000SEK with 15% of the responses, however around 20% chose the alternative “I choose not to answer this question” therefore this indication from the data might be misleading.
4.1.4 Weekly Spending on Groceries

The mean of the average spending on groceries per week was 2.32, which translates to 1000-1500SEK per week. There were 42% of the respondents indicating this level of spending. However, 28% of the respondents indicated that they on average buy groceries for 500-1000 SEK per week. Therefore one can assume that the spending level of the respondents lies between 500-1500 per week for the majority of the respondents.

The data indicates that the average respondent has a family with children, he or she works full time and has a higher educational degree. The results show that the most common family situation within the respondents is married with children, or that they are expecting children. These factors presented above indicate that the target group previously described is well captured and represented.

4.1.5 Current Behaviour

The questions regarding current behaviour indicate whether the respondent has previously used an online service to buy groceries. 26 respondents are currently shopping groceries online and 59 respondents are not shopping for groceries online. Out of the 26 respondents shopping groceries online today 14 respondents, are shopping for groceries once a week.

4.1.6 Geographical Location

The geographical location question was aimed to be used as a comparing variable, however the results were scattered to far away, meaning that the respondents claimed to live in several different cities. This hindered the use of this variable in order to see differences between cities.
4.2 Factor Analysis

When first computing the factor analysis it was shown that all factors were loading within all statements, which is not a good thing. Therefore the decision to only use statements that has been used in previous research was taken. The factor analysis was then done with statements derived and previously proven by Grandón et al. (2011). This led statements in connection to technology and change to be eliminated from the factor analysis and research. The number of factors was set to be four, one for each components within the Theory of Planned Behaviour, intention, attitude, subjective norm and perceived behavioural control.

4.2.1 KMO and Bartlett’s Test

The Kaiser-Meyer-Olkin Measure of sampling adequacy is .811 which indicate on a strong sampling adequacy of all the statements selected in the factor analysis. The factor analysis made is also significant since \( p = .000 \).

<table>
<thead>
<tr>
<th>KMO and Bartlett's Test</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Kaiser-Meyer-Olkin Measure of Sampling</td>
<td>.811</td>
</tr>
<tr>
<td>Adequacy</td>
<td></td>
</tr>
<tr>
<td>Bartlett's Test of Sphericity</td>
<td></td>
</tr>
<tr>
<td>Approx. Chi-Square</td>
<td>721,249</td>
</tr>
<tr>
<td>df</td>
<td>45</td>
</tr>
<tr>
<td>Sig.</td>
<td>.000</td>
</tr>
</tbody>
</table>

Table 4.1 KMO and Bartlett’s Test

As one can see in the factor-loading table some of the statements are loading within some or even all factors. This is usually something that is not preferred in a factor analysis, however due to the fact that the statements are derived from previous research and that the KMO is high together with a low significance this is overlooked in this research.

<table>
<thead>
<tr>
<th>Component</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
</tr>
</thead>
<tbody>
<tr>
<td>I do not intend to purchase my groceries online</td>
<td></td>
<td></td>
<td></td>
<td>.939</td>
</tr>
<tr>
<td>within the following year</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I do not have certain plans to purchase my</td>
<td></td>
<td></td>
<td></td>
<td>.950</td>
</tr>
<tr>
<td>groceries online</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Me and my family feel a strong commitment in</td>
<td></td>
<td></td>
<td></td>
<td>-.706</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
incorporating online grocery shopping into our weekly routine within the near future

I Incorporating online grocery shopping in my family routine would be harmful

Incorporating online grocery shopping in my family routine would be negative

Incorporating online grocery shopping in my family routine would be inefficient

Most people who are important to me and my family do not think that we should incorporate online grocery shopping to our everyday lives

Most friends who influence the behaviour of me and my family do not think that we should incorporate online grocery shopping

People whose opinions my family value would not prefer if my family incorporated online grocery shopping

Most families that are important to my family have incorporated online grocery shopping to their everyday lives

Incorporating online grocery shopping within my family routine would be difficult

Incorporating online grocery shopping within my family routine would not be under control

Incorporating online grocery shopping within my family routine would be difficult to arrange

Table 4.2   Factor Loading

<table>
<thead>
<tr>
<th>Description</th>
<th>Factor 1</th>
<th>Factor 2</th>
<th>Factor 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Incorporating online grocery shopping in my family routine would be harmful</td>
<td>0.768</td>
<td>0.406</td>
<td>0.176</td>
</tr>
<tr>
<td>Incorporating online grocery shopping in my family routine would be negative</td>
<td>0.814</td>
<td>0.334</td>
<td>0.238</td>
</tr>
<tr>
<td>Incorporating online grocery shopping in my family routine would be inefficient</td>
<td>0.818</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Most people who are important to me and my family do not think that we should incorporate online grocery shopping to our everyday lives</td>
<td>0.189</td>
<td>0.940</td>
<td></td>
</tr>
<tr>
<td>Most friends who influence the behaviour of me and my family do not think that we should incorporate online grocery shopping</td>
<td>0.240</td>
<td>0.931</td>
<td></td>
</tr>
<tr>
<td>People whose opinions my family value would not prefer if my family incorporated online grocery shopping</td>
<td>0.272</td>
<td>0.876</td>
<td></td>
</tr>
<tr>
<td>Most families that are important to my family have incorporated online grocery shopping to their everyday lives</td>
<td>-0.114</td>
<td>0.888</td>
<td></td>
</tr>
<tr>
<td>Incorporating online grocery shopping within my family routine would be difficult</td>
<td>0.789</td>
<td>0.133</td>
<td>-0.396</td>
</tr>
<tr>
<td>Incorporating online grocery shopping within my family routine would not be under control</td>
<td>0.693</td>
<td>0.341</td>
<td>-0.130</td>
</tr>
<tr>
<td>Incorporating online grocery shopping within my family routine would be difficult to arrange</td>
<td>0.817</td>
<td>0.189</td>
<td>-0.324</td>
</tr>
</tbody>
</table>

4.3 Descriptives

The results presented below are based on the statements tested within the factor analysis, which are based on the Theory of Planned Behaviour. The results are based on Likert Scale Approach computed means from the empirical findings. If the mean value is close to 1 it indicates that the majority of the respondents have not agreed to the statement. If the mean is closer to a value of 3 it means that the majority of the respondents neither agree or
disagree and if the mean value is higher and closer to 5 it indicates that the respondents have agreed to the statement presented to them. The statements are formulated in one of two ways, either it is a positive formulated statement or a negative formulated statement, therefore the results might be positive even if the mean is low, this would be the case if a statement is formulated in a negative way.

4.3.1 **Attitudes**

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Incorporating online grocery shopping in my family routine would be harmful</td>
<td>1.32</td>
</tr>
<tr>
<td>2. Incorporating online grocery shopping in my family routine would be negative</td>
<td>1.42</td>
</tr>
<tr>
<td>3. Incorporating online grocery shopping in my family routine would be inefficient</td>
<td>1.72</td>
</tr>
</tbody>
</table>

Table 4.3 Attitude statement means

These statements are negative formulated statements with a low means within which indicates that respondents in general have positive attitudes.

4.3.2 **Subjective Norm**

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Most people who are important to me and my family do not think that we should incorporate online grocery shopping to our everyday lives</td>
<td>1.96</td>
</tr>
<tr>
<td>2. Most friends who influence the behaviour of me and my family do not think that we should incorporate online grocery shopping</td>
<td>1.94</td>
</tr>
<tr>
<td>3. People whose opinions my family value would not prefer if my family incorporated online grocery shopping</td>
<td>1.94</td>
</tr>
<tr>
<td>4. Most families that are important to my family have incorporated online grocery shopping to their everyday lives</td>
<td>1.94</td>
</tr>
</tbody>
</table>

Table 4.4 Subjective norm statement means

Statements 1-3 are statements that are negative formulated and have low means, which indicates on a strong subjective norms. It can be seen that statement 4 is a positive statement with a slightly lower mean, which indicates on a slightly weaker subjective norm. However the subjective norms are perceived to be strong.
4.3.3 Perceived Behavioural Control

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Incorporating online grocery shopping within my family routine would be difficult</td>
<td>1.53</td>
</tr>
<tr>
<td>2. Incorporating online grocery shopping within my family routine would not be under control</td>
<td>1.71</td>
</tr>
<tr>
<td>3. Incorporating online grocery shopping within my family routine would be difficult to arrange</td>
<td>1.52</td>
</tr>
</tbody>
</table>

Table 4.5 Perceived behavioural control statement means

Statements 1-3 are statements formulated in a negative manner and the findings show that the mean for all statements is low which indicates on strong behavioural control.

4.3.4 Intention

<table>
<thead>
<tr>
<th>Statement</th>
<th>Mean</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I do not intend to purchase my groceries online within the following year</td>
<td>2.49</td>
</tr>
<tr>
<td>2. I do not have certain plans to purchase my groceries online</td>
<td>2.52</td>
</tr>
<tr>
<td>3. Me and my family feel a strong commitment in incorporating online grocery shopping into our weekly routine within the near future</td>
<td>2.87</td>
</tr>
</tbody>
</table>

Table 4.6 Intention statement means

The statements are negatively formulated statements, with low means, which indicates on strong intentions to purchase products in general online.

4.4 Correlation

A Pearson product-moment correlation coefficient was computed to assess the relationship between the intention factor and attitude, subjective norm and perceived behavioural control factors. The results can be seen below.
### Table 4.7: Correlation Matrix

<table>
<thead>
<tr>
<th></th>
<th>Attitude</th>
<th>PNI</th>
<th>PBC</th>
<th>Intention</th>
<th>Education</th>
<th>Work</th>
<th>Family</th>
<th>Age</th>
<th>Spending</th>
<th>Income</th>
<th>Har du tidigare handlat mha i nätet?</th>
<th>Handtar du i dag dina mahatar via nätet?</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Correlations</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Attitude</strong></td>
<td>Pearson Correlation</td>
<td>1</td>
<td>.000</td>
<td>.000</td>
<td>.558</td>
<td>.048</td>
<td>-.079</td>
<td>.063</td>
<td>-.043</td>
<td>.099</td>
<td>.236**</td>
<td>.084</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>1.000</td>
<td>1.000</td>
<td>1.000</td>
<td>.000</td>
<td>.000</td>
<td>.558</td>
<td>.558</td>
<td>.696</td>
<td>.314</td>
<td>.420</td>
<td>.029</td>
<td>.008</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>PNI</strong></td>
<td>Pearson Correlation</td>
<td>.000</td>
<td></td>
<td>.000</td>
<td>.071</td>
<td>-.209</td>
<td>.225</td>
<td>.116</td>
<td>.055</td>
<td>-.084</td>
<td>.362**</td>
<td>.088**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>1.000</td>
<td></td>
<td>1.000</td>
<td>.521</td>
<td>.039</td>
<td>.047</td>
<td>.333</td>
<td>.447</td>
<td>.002</td>
<td>.422</td>
<td>.150</td>
<td>.158</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>PBC</strong></td>
<td>Pearson Correlation</td>
<td>.000</td>
<td>1</td>
<td>.240</td>
<td>.111</td>
<td>-.127</td>
<td>-.228</td>
<td>.028</td>
<td>.006</td>
<td>-.108</td>
<td>-.200**</td>
<td>-.190**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>1.000</td>
<td>1.000</td>
<td>.027</td>
<td>.311</td>
<td>.247</td>
<td>.036</td>
<td>.942</td>
<td>.955</td>
<td>.012</td>
<td>.501</td>
<td>.067</td>
<td>.062</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Intention</strong></td>
<td>Pearson Correlation</td>
<td>.598</td>
<td>.571</td>
<td>.740</td>
<td>.038</td>
<td>.050</td>
<td>.340</td>
<td>.035</td>
<td>-.001</td>
<td>-.123</td>
<td>.007**</td>
<td>.584**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.730</td>
<td>.049</td>
<td>.027</td>
<td>.752</td>
<td>.995</td>
<td>.012</td>
<td>.510</td>
<td>.000</td>
<td>.000</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Education</strong></td>
<td>Pearson Correlation</td>
<td>.048</td>
<td>.509</td>
<td>.111</td>
<td>.036</td>
<td>.069</td>
<td>.556</td>
<td>.024</td>
<td>.049</td>
<td>.146</td>
<td>.006**</td>
<td>.077**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.730</td>
<td>.049</td>
<td>.027</td>
<td>.752</td>
<td>.995</td>
<td>.012</td>
<td>.510</td>
<td>.000</td>
<td>.000</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Work</strong></td>
<td>Pearson Correlation</td>
<td>.070</td>
<td>.225</td>
<td>.127</td>
<td>.060</td>
<td>.069</td>
<td>.308</td>
<td>-.271</td>
<td>.073</td>
<td>-.564</td>
<td>.072**</td>
<td>.007**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.730</td>
<td>.049</td>
<td>.027</td>
<td>.752</td>
<td>.995</td>
<td>.012</td>
<td>.510</td>
<td>.000</td>
<td>.000</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Family</strong></td>
<td>Pearson Correlation</td>
<td>.633</td>
<td>.516</td>
<td>.228</td>
<td>.240</td>
<td>.056</td>
<td>.366</td>
<td>1</td>
<td>-.199</td>
<td>-.150</td>
<td>.238**</td>
<td>.155**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.508</td>
<td>.001</td>
<td>.073</td>
<td>.112</td>
<td>.049</td>
<td>.155</td>
<td>.115</td>
<td>.000</td>
<td>.000</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Age</strong></td>
<td>Pearson Correlation</td>
<td>.043</td>
<td>.053</td>
<td>.008</td>
<td>.035</td>
<td>-.024</td>
<td>-.271</td>
<td>-.196</td>
<td>1</td>
<td>.131</td>
<td>.001**</td>
<td>.005**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.730</td>
<td>.049</td>
<td>.027</td>
<td>.752</td>
<td>.995</td>
<td>.012</td>
<td>.510</td>
<td>.000</td>
<td>.000</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Spending</strong></td>
<td>Pearson Correlation</td>
<td>.111</td>
<td>.984</td>
<td>.001</td>
<td>.049</td>
<td>.073</td>
<td>.150</td>
<td>.131</td>
<td>1</td>
<td>.159</td>
<td>.009**</td>
<td>.009**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.508</td>
<td>.001</td>
<td>.073</td>
<td>.150</td>
<td>.131</td>
<td>1</td>
<td>.159</td>
<td>.009</td>
<td>.009</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Income</strong></td>
<td>Pearson Correlation</td>
<td>.099</td>
<td>.302</td>
<td>.168</td>
<td>.122</td>
<td>.148</td>
<td>.564**</td>
<td>.230</td>
<td>.183</td>
<td>.193</td>
<td>.060**</td>
<td>.060**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.508</td>
<td>.001</td>
<td>.073</td>
<td>.150</td>
<td>.131</td>
<td>1</td>
<td>.159</td>
<td>.009**</td>
<td>.009**</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Har du tidigare handlat mha i nätet?</strong></td>
<td>Pearson Correlation</td>
<td>.236</td>
<td>.368</td>
<td>.200</td>
<td>.501**</td>
<td>.036</td>
<td>.072</td>
<td>.155</td>
<td>.031</td>
<td>.046</td>
<td>1</td>
<td>.593**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.508</td>
<td>.001</td>
<td>.073</td>
<td>.150</td>
<td>.131</td>
<td>1</td>
<td>.159</td>
<td>.009**</td>
<td>.009**</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
<tr>
<td><strong>Handtar du i dag dina mahatar via nätet?</strong></td>
<td>Pearson Correlation</td>
<td>.264</td>
<td>.159</td>
<td>.190</td>
<td>.594**</td>
<td>.077</td>
<td>.072</td>
<td>.172</td>
<td>.008</td>
<td>.073</td>
<td>.071**</td>
<td>.083**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>.000</td>
<td>.000</td>
<td>.027</td>
<td>.508</td>
<td>.001</td>
<td>.073</td>
<td>.150</td>
<td>.131</td>
<td>1</td>
<td>.159</td>
<td>.009**</td>
<td>.009**</td>
</tr>
<tr>
<td>N</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
<td>85</td>
</tr>
</tbody>
</table>

** Correlation is significant at the 0.01 level (2-tailed).
* Correlation is significant at the 0.05 level (2-tailed).
- There was a correlation between the attitude and intention variables \( r = .558^{**}, n = 85, p = .000 \)
- There was no correlation between the subjective norm and intention variables \( r = .071, n = 85, p = .521 \)
- There was a negative correlation between the perceived behavioural control and intention variables \( r = -.240, n = 85, p = .027 \)

A Pearson product-moment correlation was also computed with a number of control variables. The variables computed were age, gender, work situation, family situation, weekly grocery spending, annual income, if the respondent ever purchased groceries online and if the respondent currently purchases groceries online.

- There was a correlation between the attitude and if the respondent tried online grocery shopping before variables \( r = .236^*, n = 85, p = .029 \)
- There was a correlation between the attitude and if the respondent currently purchases groceries online variables \( r = .284^{**}, n = 85, p = .008 \)
- There was a correlation between the subjective norm and work variables \( r = .225^*, n = 85, p = .039 \)
- There was a correlation between the subjective norm and family variables \( r = .216^*, n = 85, p = .047 \)
- There was a negative correlation between the subjective norm and income variables \( r = -.362^{**}, n = 69, p = .002 \)
- There was a correlation between the perceived behavioural control and family situation variables \( r = -.228^*, n = 85, p = .036 \)
- There was a negative correlation between the intention and family situation variables \( r = -.240^*, n = 85, p = .027 \)
- There was a correlation between the intention and if the respondent tried online grocery shopping variables \( r = .507^{**}, n = 85, p = .000 \)
- There was a correlation between the intention and if the respondent currently purchases groceries online \( r = .584^{**}, n = 85, p = .000 \)

As table 4.7 presents, the rest of the control variables did not show any significance to any other variables.

### 4.5 Multi Linear Regression Analysis

<table>
<thead>
<tr>
<th>Model summary</th>
<th>R Square</th>
<th>Adjusted R Square</th>
<th>Sig. F Chance</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>.527</td>
<td>.464</td>
<td>.000</td>
</tr>
<tr>
<td>2</td>
<td>.670</td>
<td>.607</td>
<td>.000</td>
</tr>
</tbody>
</table>

Table 4.8 Multi Linear Regression Analysis Model Summary
The second multi linear regression analysis shows a stronger R square, which indicates that, the model gets stronger when including the attitude, subjective norm and perceived behavioural control variables. This is also seen in the adjusted R square. The significance of the model is very reliable since it p=,000 in both the second and first multi linear regression analysis.

<table>
<thead>
<tr>
<th>Model</th>
<th>Standardized Coefficients</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Beta</td>
<td>Sig.</td>
</tr>
<tr>
<td>1</td>
<td>(Constant)</td>
<td>,020</td>
</tr>
<tr>
<td></td>
<td>Education</td>
<td>,181</td>
</tr>
<tr>
<td></td>
<td>Work</td>
<td>-.320</td>
</tr>
<tr>
<td></td>
<td>Family</td>
<td>,080</td>
</tr>
<tr>
<td></td>
<td>Age</td>
<td>,076</td>
</tr>
<tr>
<td></td>
<td>Spending</td>
<td>,063</td>
</tr>
<tr>
<td></td>
<td>Income</td>
<td>-.268</td>
</tr>
<tr>
<td></td>
<td>Have you ever tried online grocery shopping?</td>
<td>,136</td>
</tr>
<tr>
<td></td>
<td>Current behaviour</td>
<td>,551</td>
</tr>
<tr>
<td>2</td>
<td>(Constant)</td>
<td>,036</td>
</tr>
<tr>
<td></td>
<td>Education</td>
<td>,148</td>
</tr>
<tr>
<td></td>
<td>Work</td>
<td>-.284</td>
</tr>
<tr>
<td></td>
<td>Family</td>
<td>,071</td>
</tr>
<tr>
<td></td>
<td>Age</td>
<td>,097</td>
</tr>
<tr>
<td></td>
<td>Spending</td>
<td>,067</td>
</tr>
</tbody>
</table>
Have you ever tried online grocery shopping?

<table>
<thead>
<tr>
<th></th>
<th>Beta</th>
<th>p</th>
</tr>
</thead>
<tbody>
<tr>
<td>Income</td>
<td>-0.272</td>
<td>0.010</td>
</tr>
<tr>
<td>Current Behaviour</td>
<td>0.408</td>
<td>0.000</td>
</tr>
<tr>
<td>Attitude</td>
<td>0.379</td>
<td>0.000</td>
</tr>
<tr>
<td>Subjective Norm</td>
<td>-0.017</td>
<td>0.842</td>
</tr>
<tr>
<td>Perceived Behavioural Control</td>
<td>-0.169</td>
<td>0.039</td>
</tr>
</tbody>
</table>

**Dependent variable: Intention**

Table 4.9 Multi Linear Regression Analysis

Attitudes are significant since p=.000 which is <.05. The Beta is ,379 and this indicates that the positive attitudes within the respondents have a positive influence on intentions.

Subjective norm does not show any significant correlation to intentions since p=,842>.05.

Perceived behavioural control shows significant correlation towards intentions since p=,039<.05. The Beta is ,169 which indicates that the perceived behavioural control has a negative influence on intentions.

The control variable “work situation” is significant in correlation to the intentions since p=,006<.05. The Beta is ,284 which indicate that the work situation has a negative influence on intentions.

The control variable Current Behaviour shows great significance in correlation to intentions since p=.000<.05. The Beta is ,408 which implies that the current behaviour influence intentions in a positive way.

The remaining variables; education, family, age, spending, income and whether the respondents have previously purchased groceries online are all insignificant since all have p-values that are higher than ,05, p>.05. The additional findings from the multi linear regression analysis can be found in Appendix 6.

### 4.6 Hypothesis Results

H1 hypothesize that positive attitudes influence intentions within online grocery shopping to be positive. Table 4.3 presents the means of attitudes and these indicate on positive attitudes towards online grocery shopping. The multi linear regression analysis is presented in table 4.9 and since p =.000 and the beta is ,379 this suggests that positive attitudes influence intentions to be positive and thus, the H1 null hypothesis is rejected.
H2 propose that strong subjective norms influences intentions within online grocery shopping to be positive. The means of subjective norms are presented in table 4.4 and presents overall strong subjective norms regarding online grocery shopping. Furthermore table 4.9 shows the multi linear regression analysis between subjective norms and intentions \([p = .842]\) and due to the high p-value it can be implied that subjective norms does not influence intentions. Therefore the researchers’ fail to reject the H2 null hypothesis.

H3 posits that high perceived behavioural control does not influence intentions within online grocery to be positive. While the means from table 4.5 indicates on a high perceived behavioural control, there is a significant correlation between perceived behavioural control \([p = .039]\) and intention but a negative beta of \(-.169\) as seen in table 4.9. This means that high perceived behavioural control does not influence intentions to be positive within online grocery shopping and thus the researchers fail to reject the H3 null hypothesis.

Figure 4.5 Figure of the hypotheses
5 Analysis

This section will establish a connection between the theory presented in the theoretical framework and findings from the empirical study. The analysis presented will elaborate on the hypotheses, which concern attitudes, subjective norms, perceived behavioural control and intentions in order to answer the research question.

5.1 Introduction

The purpose of this research is to investigate positive attitudes influence on intentions towards online grocery shopping. The research question “Does consumers positive attitudes influence the decision of purchasing groceries online?” is used as a guide throughout the research.

The analysis is preceded by the empirical results and hypotheses presented, which are formulated in accordance to the Theory of Planned Behaviour by Ajzen and Fishbein (1975). As presented earlier in the theoretical framework, this model suggests a correlation between attitudes and behaviour, as well as incorporating the other main components, subjective norms, perceived behavioural control and intentions and how these variables influence intentions and behaviour. While the research question and purpose mainly concern attitudes and their influence on intentions, the Theory of Planned Behaviour also takes subjective norms, perceived behavioural control into consideration in order to get a comprehensive understanding of intentions.

The Theory of Planned Behaviour is analysed through the correlation variables and multi linear regression analysis, these results present the correlation and significance of the main components in the model. The analysis will interpret the correlations and influences within the Theory of Planned Behaviour together with the demographic and descriptive variables included in the findings. Additionally, the findings and connections between the variables discussed in the analysis, are strengthened and exemplified by research and theories previously presented in the theoretical framework, this in order to explain the implication of the findings further.

Figure 5.1 Figure of H1, H2 & H3
5.2 Attitudes

$H_0$ = Positive attitudes does not influence intentions within online grocery shopping to be positive

$H_1$ = Positive attitudes influence intentions within online grocery shopping to be positive

The alternative hypothesis suggests that a positive attitude towards online grocery shopping influence intentions of using online grocery shopping to be positive. The aim of this hypothesis is therefore to measure positive attitudes influence on intention within online grocery shopping.

The correlation matrix shows that there is a high correlation between attitudes, current behaviour and the behaviour variable in which having tried online grocery shopping previously. The two correlations are both strong and positive, which indicate that if a respondent has tried online grocery shopping before the attitudes towards it becomes positive the same relationship occurs if the respondent is currently purchasing groceries online. When a respondent has tried purchasing groceries online the attitudes towards it becomes more positive which in turn later leads to a more positive intention to purchase groceries online. Therefore a significant finding to take away from this research is that if someone has tried online grocery shopping previously they are more likely to purchase groceries online again since their attitudes towards the action becomes more positive which influence intentions to be positive. This is also the finding when it comes to the positive relationship between the current behaviour and attitudes. The empirical result implies that the respondents currently purchasing their groceries online have more positive attitudes, which then leads to positive intentions to continue purchasing groceries. Svensk Digital Mathandel (2014) states that the consumers that have tried online grocery shopping once often tend to continue purchase their groceries online. This statement strengthens the findings within this research. Since this is correlation describes the relationship between attitudes, the behaviour variable of currently purchasing groceries online and the behaviour variable in which having tried online grocery shopping previously goes the other way around. One can therefore with certainty state that in order for consumers to try and adopt online grocery shopping, attitudes has to be positive.

As previously developed theory state, an attitude is a learned tendency to evaluate an object to be favourable or unfavourable. A favourable evaluation of an object is described as a positive attitude (Ajzen, 2001). The overall means of the statements within the factor analysis display overall positive attitude variable towards online grocery shopping. In connection to theory, one can therefore assume that the respondents possess positive beliefs about online consumer behaviour based on their positive attitudes (Fishbein & Ajzen, 1975). The main factors underlying the positive attitudes can be explained by the functional, hedonic and symbolic properties of online grocery shopping which are the foundations of attitude development (Argyriou & Melewar, 2011). One can thus assume that the respondents have strong beliefs that the functions within online shopping are beneficial for them. This assumption is strengthened by Seybert (2012) which states that consumers purchase groceries online since it enables them to easier compare prices and find alternative product based on what others before them have purchased. Another assumption in connected to this theory is that the hedonic value for the respondents to use online grocery shopping is perceived to be high, since the attitudes are positive. This is connected to the strong correlation between attitudes and current behaviour and the variable ”respondents that currently purchases groceries online”. Such correlation suggests that using online grocery shopping has a positive influence on attitudes. It can therefore be
interpreted that usage of the service strengthens the functional, hedonic and symbolic beliefs about online grocery shopping.

According to the multi linear regression analysis it can be seen that the connection between attitude and intention is of high significance in the model since the significance level presented is ,000. Furthermore the beta from the multi linear regression analysis is ,379, which is one of the highest beta values of all presented variables analysed in the process. This implies that the positive attitudes have a positive influence on intentions within online grocery shopping. This relationship is in line with the underlying theory for Theory of Planned Behaviour, since it states that positive attitudes has a positive influence on consumer intention (Ajzen & Fishbein, 1980). The results from this analysis provide statistical proof that positive attitudes influence intentions within online grocery shopping to be positive. This leads to a rejected null hypothesis.

5.3 Subjective Norm

\[ H_0 = \text{Strong subjective norms does not influence intentions within online grocery shopping to be positive} \]

\[ H_1 = \text{Strong subjective norms influence intentions within online grocery shopping to be positive} \]

Subjective norms refer to the social pressure that is put on an individual to perform a certain behaviour. The hypothesis tests whether strong subjective norms have a positive influence on intentions within online grocery shopping. A strong subjective norm is recognised by positive external social influence. The empirical findings show that subjective norms are perceived to be positive based on the means collected from the statements within the factor analysis.

Within the correlation matrix it is shown that the work, family and income variables are correlated towards the subjective norm since all p-levels are below ,05. The work variable has a positive correlation towards subjective norm, which indicates that subjective norms could origin from the work environment of the respondents. The income correlation with subjective norm is negative, which means that when the income variable becomes lower the subjective norm becomes higher. This is a variable that makes the consumer decide whether or not they should purchase their groceries online or not. This is strengthened by the theory by (Aguila-Obra et al., 2006) which suggest income level as a factor of influence when it comes to adopting new innovations, such as online grocery shopping. The family variable is positively correlated, which means the subjective norms related to family environment are positive towards online grocery shopping, however the significance level is relatively high therefore this correlation is not as significant as the two other variables.

The finding within the multi linear regression analysis is that p=,842 which indicates that the positive subjective norms does not influence intentions since p>,05. Therefore the researchers fail to reject the null hypothesis. Furthermore it can be stated within a 95% confidence interval that the subjective norms towards online grocery shopping does not influence intentions of purchasing groceries online. This result does not support the Theory of Planned Behaviour since it states that strong subjective norms should influence intentions to be positive.

The insignificance of the subjective norm within online grocery shopping can be explained in connection to previously presented theory. Theories have prior to this research questioned the subjective norms ability to influence intentions within certain behaviours that are not performed in public. The switch from offline towards online grocery shopping is something that is taking the behaviour of purchasing groceries from the physical store to
the homes of the consumers. Since the behaviour of purchasing groceries online is performed in the privacy of a home it is a behaviour that is no longer performed in public. And in accordance to Prislin and Wood (2005) this is an factor influencing the subjective norms ability to influence intentions. This is therefore an underlying factor that explains the insignificant result of the subjective norm and why it does not influence intentions towards online grocery shopping.

5.4 Perceived Behavioural Control

\( H_0 = \) High perceived behavioural control does not influence intentions within online grocery shopping to be positive.

\( H_1 = \) High perceived behavioural control influence intentions within online grocery shopping to be positive.

The hypothesis measures the amount of perceived behavioural control the respondents believe to possess towards purchasing groceries online. The aim of this hypothesis is to examine if high perceived behavioural control influence consumer intentions towards purchasing groceries online to be positive.

The variable within the correlation matrix that showed significance towards perceived behavioural control was the family situation of the respondents. The significance was not as low as one would hope but it is still significant. The correlation was shown to be negative which indicates that the higher the variable in the family situation the weaker perceived behavioural control gets. This shows that the family situation has a meaningful role when it comes to perceived behavioural control towards purchasing groceries online. Furthermore the findings imply that the family situation hinders the perceived behavioural control to be positive within online grocery shopping.

Based on the results from the multi linear regression analysis one can see that there is a relationship between perceived behavioural control and intentions within online grocery shopping. The significance level of this relationship is \(,039\), which is \(>,05\), however it does not show great significance. The Beta coefficient is \(-,169\) which indicates that the relationship between perceived behavioural control and intentions is negative. This indicates that the higher the perceived behavioural control the weaker the intention becomes. This is not inline with the Theory of Planned Behaviour, however there is possible explanations based on theory present.

One explanation of the negative relationship between perceived behavioural control and intention based on theory is that the perceived behavioural control is negative. The more negative the perceived behavioural control gets the weaker the intention get. In other words the overall results of the perceived behavioural control should therefore be negative within the respondents. However it is shown that the means of the empirical findings within perceived behavioural control are overall positive. Therefore this explanation is rejected. According to Theory of Planned Behaviour, the main purpose of measuring perceived behavioural control is to predict actual behaviour. perceived behavioural control is has a direct influential factor of both consumer intention and behaviour. Therefore the explanation of the negative relationship is that when perceived behavioural control is high enough consumers are more likely to go straight to action without passing the intentions (Ajzen, 2002). It is therefore assumed that the positive perceived behavioural control leads the respondents to go direct to action within online grocery shopping. However this relationship cannot be measured since the future behaviour is not included as a variable measured within this research.
These results lead the researchers to fail to reject the null hypothesis. Positive perceived behavioural control does not have a positive influence on intentions within online grocery shopping.

5.5 Intention and Behaviour

Intentions are described as being motivational factors that influence behaviour (Ajzen, 1991). The mean of the intention statements is found to be positive, meaning that the intentions of purchasing groceries online within the respondents are positive. This would, based on theory, indicate that a future behaviour would be positive as well (Fishbein & Ajzen, 1975). However, this assumption is something that cannot be stated with any statistical certainty, since future behaviour is not measured within this research.

Additional findings are found when analysing the different variables within the multi linear regression analysis, where one can see that some of the control variables influence intentions within online grocery shopping. This is in addition to the Theory of Planned Behaviour and deepens the understanding of the factors influencing intentions within this topic. The control variables that are significant from this analysis are work (p = 0.006 < 0.05) and current behaviour (p = 0.000 < 0.05). It is seen that the work variable has a negative influence on intention, meaning that if the value of the work variable increases the intention variable decreases. When the work variable increases it indicates that the respondents is not working, in other words the respondent is either a student, unemployed or retired. Therefore individuals with a full- or part time-job have higher intentions towards purchasing groceries online.

The current behaviour has a strong and positive influence and correlation to intention, based on the significance level, beta coefficient and r. This indicates that the stronger the current behaviour, the stronger the intentions of the respondents. Thus if the current behaviour of the respondent is purchasing groceries online the intentions of continuing purchasing groceries online of that respondent is therefore higher, than if the current behaviour is not purchasing groceries online. As mentioned in the theoretical framework, habitual and low involvement behaviour is hard to change since the search for new information and other alternatives are often very low and perhaps even non-existent (Biel, 2011). An assumption as to why this influence and correlation exists based on theory is that individuals who today purchase groceries online have low psychological barriers for shifting the habitual behaviour of purchasing groceries in a physical store to online. This would imply that these respondents have little or no concern in deviating from established traditions and deeply rooted habits such as offline grocery shopping. It also implies that the respondents that does not purchase groceries online today, does not have strong intentions to purchase groceries online in the near future.

Online grocery shopping is still seen as an innovation since it is still partly in the initiation process because it has not yet reached the mass market. The willingness to purchase or adapt a certain behaviour depends on what type of consumer you are. Therefore one could argue that the respondents that are currently purchasing their groceries online can be identified as innovators, early adopters or early majority of the market of online grocery shopping (Littler, 2015). Functional barriers such as risk is said to be an influencing factor towards attitudes within e-commerce (Ram et al., 1989). One can, based on the current behaviour and attitude relationship argue that the functional barrier of risk within the respondents are low. Furthermore trust, which also is a determining variable within attitudes, is presumed to be high since the attitudes are positive (Ba & Pavlou, 2002).
5.6 Overall Results

The Theory of Planned Behaviour states that if attitudes, subjective norms and perceived
behavioural control are in general positive their influence on intentions should be positive
as well (Ajzen & Fishbein, 1980). However, the empirical findings are not all consistent
with this assumption, since the perceived behavioural control is influencing intentions
negative and subjective norms are insignificant and therefore not influencing intentions
within online grocery shopping.

The inconsistency can be explained to be derived from two implicating factors. A deeper
analysis of these explanations was chosen for this analysis. The first approach involves
questioning the model, Theory of Planned Behaviour and how well it fits with testing a
habitual behaviour such as grocery shopping. This argument is presented by Verplanken
and Aarts (1999); they argue that since habitual behaviour involves little or no thought
process and information search, the theoretical framework created by Ajzen and Fishbein is
weak and have large flaws in predicting behaviour. However this is still under discussion
since other research states that the model is highly suited for testing and predicting the
intentions to purchase groceries online (Hansen et al., 2004, & Grandón et al., 2011).

The second explanation for the empirical outcome, which is also the one suggested by this
research, is in connection to theory, which argues that attitude is the strongest and most
influential factor of the Theory of Planned Behaviour (Trafimow et al., 1996). This can be
explained in the results since attitudes have the most significant result within the multi
linear regression analysis of the three variables. Perceived behavioural control is significant,
however not as significant as the attitude variable. Also, since the perceived behavioural
control shows a negative influence it is not in line with the Theory of Planned Behaviour.
The subjective norm is insignificant within this research since the behaviour of purchasing
groceries online is performed in private and consequently not an explanatory label of
intentions. This strengthens the assumption that attitudes are the most significant factor
that influences intentions to be positive. It is therefore found that attitudes are the most
important factor to consider when measuring consumer intention within online grocery
shopping. Furthermore it is found that positive attitudes are needed in order to get the
consumer to try and adopt online grocery shopping. Since attitudes are by far the most
influential factor within intentions of online grocery shopping one can with certainty say
that the respondents are attitudinal in their reason to decide whether or not to purchase
groceries online. To conclude and to answer the research question of this research it can be
stated that positive attitudes does have a positive influence on intentions within online
grocery shopping.
The purpose of this research was to investigate if positive attitudes influence intentions towards purchasing groceries online. The process was guided by the research question “Does consumers positive attitudes influence the decision of purchasing groceries online?”. By analysing data collected from secondary- as well as primary sources the research question was successfully answered and the purpose was achieved. Furthermore, the findings of the tested Theory of Planned Behaviour enabled additional conclusions to be observed within online grocery shopping.

Three proposed hypotheses were developed and investigated through testing the correlation and significance between these variables in accordance with the Theory of Planned Behaviour.

Hypothesis 1 investigated if positive attitudes have a positive influence on intention. It was acknowledged that positive attitudes have a strong positive influence on intentions within the context of online grocery shopping. One of the main findings within attitudes is that they have a positive correlation with current behaviour. This implies that current buyer behaviour is favourable when creating positive attitudes within online grocery shopping and vice versa.

Hypothesis 2 investigated if strong subjective norms have a positive influence on intention. It was found that the strong subjective norms did not have any significant influence on intentions when it comes to online grocery shopping. In accordance to theory it was found that the action of purchasing grocery online is a private action and therefore not applicable for measuring underlying factors of online consumer intentions.

Hypothesis 3 investigated if positive perceived behavioural control have a positive influence on intentions. It was found that there was a negative influence on intentions within online grocery shopping. This is explained by the fact that if a consumer possesses positive perceived behavioural control the likelihood of going straight to action is higher. An influential factor found in connection to perceived behavioural control within online grocery shopping was family.

These findings lead the researchers to acknowledge that positive attitudes are the most influential factor of the Theory of Planned Behaviour within online grocery shopping. The findings highlight the importance of positive attitudes in order to adopt online grocery shopping as a habit. The research shows that when positive attitudes exists the functional and psychological barriers are lower, which in turn will lead to easier adoption of online grocery shopping. Therefore the research contributes and strengthens the positive attitude and intention research within the field of online grocery shopping.
7 Discussion

This section will include a discussion based on the researchers’ own thoughts about the process of writing this research. Contributions and limitations will be discussed, along with suggestions for further research and implications of the research findings.

Writing this research has been a long and educative process. To conduct a research of this proportion is a demanding project and our first learning was to create a suitable project plan. A large project needs to be organised and structured, that became even more evident as the project proceeded. Along with this, it also became clear that communication between group members was of essence, as well as transparency within the methods used. The aim was to give the reader a clear view of every step that was conducted in the research, therefore transparency was an important aspect to consider throughout the writing process. When facing obstacles through the process, the value of asking practitioners for guidance was recognised since they already possess the knowledge needed. In addition to the learnings connected to the process of writing a research paper a lot of knowledge and understanding of consumer intentions and attitudes, as well as the e-commerce and grocery industry was gained.

Throughout the process all directional decisions have been thoroughly discussed and argued so that the strengths and weaknesses are recognised and properly evaluated. The main weaknesses are presented as a number of limitations and in order to assess the quality and reliability of the research as a whole these are discussed further.

7.1 Limitations and Strengths

It is observed that a mixed method of both quantitative and qualitative approach would have provided for deeper understanding of the issue presented and correlation that was found between the variables. However this was not feasible due to the given time frame for this research and in connection to previous research a quantitative research was implemented. This is believed to be a limitation since the underlying factors of the results presented in this research are assumed instead of proved with a qualitative approach.

Another limitation of the research that requires recognition is the application of Theory of Planned Behaviour. Attitude, subjective norm, perceived behavioural control and intention are variables tested, however behaviour is a variable that is not tested. Therefore the correlation between intention and behaviour, which is described in the theory, is not further researched. Instead assumptions based on previous research that positive intentions impact behaviour to be positive as well is made within the analysis. By not testing the intentions influence on future behaviour and only using secondary data to draw conclusions, important insight could therefore lead to a misleading results. The reason for this is that intentions may change over time. Therefore the measure of an intention must be made right before the behaviour take place in order to make a justified prediction of the behaviour (Ajzen, 1985).

Furthermore, as the methodology of this research emphasizes the importance of objectiveness, possible distortion of the results must be considered. Even if the statistical findings and theories have been assembled in accordance with the chosen method, some interference of individual beliefs and values must be considered to have influenced the result of this research.
One of the main strengths of this research is the Theory of Planned Behaviour since it is a well-known and heavily researched model. This facilitated the collection of secondary data, as well as the outline of method due to the vast amount of research conducted on the model, which further ensures the fit for this specific purpose.

Another strength within this research is the clear gap that is found within consumer attitudes and the influence on intention of online grocery shopping, which further clarifies the purpose and emphasise the academic contribution of the research. This is perceived as a strength since this research is believed to be of importance within the theoretical framework in connection to e-commerce and online grocery shopping. The results found show that positive attitudes influence intentions within online grocery shopping in Sweden, which has not been tested previously to this research.

Additionally a strength within the research is the statistical processing of the results, which provides reliability to the findings. However the sample size is regarded as a limitation to the statistical measurement since the number of respondents is few. Even if the results found are in line with the theory tested, the statistical proof could be questioned due to the number of respondents (Saunders et al., 2012).

### 7.2 Contributions

Academically, this research is meaningful since it tests and adds new knowledge within Theory of Planned Behaviour, which as earlier mentioned, is one of the most researched models explaining consumer attitudes and intention relationship. Academic research within positive attitudes within e-commerce is lacking, therefore this research fills this gap and the aim is to generate further research in this field. Furthermore this research suggests that positive attitudes have an positive influence on intentions, which in turn are assumed to influence behaviour within online grocery shopping. The established relationship between positive attitudes and intentions will add to previous literature within the field and thereby contribute with useful knowledge that can be applied in practice as well. In practice this will empower participants within the field of online grocery shopping to generate a more efficient business model that might make the process of consumer adoption faster.

### 7.3 Implementation

Reframing the online grocery market towards a more adaptable model for consumers is something that practitioners in the online grocery field should strive for and we believe that the market should be reframed through insight and recognition about attitude theory and the connection to intention of behaviour. This belief is based on the correlation found between positive attitudes and current behaviour. In order for current behaviour to exist, positive attitudes are of importance. Therefore grocers and practitioners within the online grocery market should focus on creating positive attitudes within the minds of the consumers in order to trigger intentions and thereafter behaviour. A practical example of this is how marketers can modify the marketing communication of online grocery shopping services towards shifting the behaviour through changing attitudes to become more positive. This will be beneficial for the grocers since more consumers would use the service and this could facilitate economy of scale. This would lower costs and lead to a more profitable business model, this would thereafter expand the online grocery market and e-commerce market in Sweden in general.
7.4 Suggestions for Further Research

Based on the learnings, limitations and contributions of this research, suggestions for further research are recognised. The method within this research was influenced and based on previous findings within the topic. It is acknowledged that in order to go further into the topic of Theory of Planned Behaviour, the suggestion is to conduct a qualitative approach instead of the quantitative approach. A qualitative approach within online grocery shopping is believed to provide further depth to the online grocery market in Sweden and contribute to more knowledge within the underlying factors of consumer attitudes. The knowledge generated through a qualitative method would be of a more exploratory nature since it could investigate why and how attitudes develop towards online grocery shopping. Interviews and focus groups are two methods that are further recommended in order to examine possible reasons and causes towards the connection between current behaviour, attitudes, intentions and future behaviour within online grocery shopping in Sweden.

Furthermore a suggestion based on the Theory of Planned Behaviour, is to follow up and measure the future behaviour of the respondents. This implies a research with a focus on measuring the future actual behaviour within online grocery shopping in Sweden. This enables research to go one step further and to see if the positive attitude and intention relationship really influence the behaviour of the consumers to be positive as well.

Another suggestion of future research is to see if the Theory of Planned Behaviour within different segments of the market in connection to online grocery shopping would give different outcomes. Do demographics such as age, gender, city, education or average weekly spending on groceries have a large influence when deciding whether to purchase groceries online or not? Even if some of these demographic variables showed significance within this research the sample size was limited. Thus in order to measure this in a fair and correct manner of the Swedish market the sample of the future study has to be larger than it was within this research. We believe that a larger time frame would be beneficial and enable the collection of a larger sample.

Additionally it is of essence to recognise that this research was done within the market of online grocery shopping. Consumers are, when shopping for groceries influenced by habits and deeply rooted traditional behaviour (Biel, 2011). A suggestion for further research based on this would be to investigate other markets that are now on the verge of moving from offline towards a more online market. A suggestion of a market eligible for this study could be the pharmaceutical industry that is now starting to offer online services. Another suggestion is to research attitudes towards online shopping when it comes to high involvement products, an example could be home electronics such as a television. This would investigate the Theory of Planned Behaviour further with connection to several markets that are moving from offline to online and be of great future value since the e-commerce development is moving and growing rapidly. This would provide knowledge on eventual differences between attitudes and intention relationships within markets of online shopping.
List of references


Appendix

Appendix 1 - Forums and Blogs visited

Forums

Retrieved 2015-04-09

- Vimedbarn.se
- Familjeliv.se
- Alltforforaldrar.se
- Viforaldrar.se
- Minbebis.com
- Amelia forum
- Dadslife.se

Blogs

Blogs with family-lifestyle, commented with our presentation text, linked to the survey. 2015-04-09

- http://blogg.mama.nu/bakverkochfikastunder
- http://blogg.mama.nu/fridafahrman
- http://blogg.mama.nu/hormonerhemorjder
- http://blogg.mama.nu/elaineeksvard
- http://blogg.mama.nu/carindasilva
- http://blogg.mama.nu/cissiwallin
- http://blogg.mama.nu/knivlisa
- http://blogg.mama.nu/annikaleone
- http://blogg.mama.nu/nisseochmanne
- http://blogg.veckorevyn.com/josefinknave
- http://blogg.loppi.se/anithaschulman/
- http://blogg.loppi.se/tvillingmorsan/
- http://blogg.loppi.se/familjenannorlunda
- blondinbella.se
- http://blogg.loppi.se/trettonbarnsmamman
- http://blogg.loppi.se/ninaetc/
- http://theoddway.colin.se
- http://www.familjeliv.se/blogg/malinwollin/
- Facebook
Translation:

“Hi!
We are three girls that are writing our bachelor thesis at Jönköping University. We are examining the attitudes towards purchasing groceries online from Swedish families perspectives’. If you have a moment to spare, we would be happy and grateful if you would answer our survey which you will find here (link).

Thank you and please spread this link to your friends and family.”
Appendix 3 - The questionnaire in English

Hello!

Thank you for assisting us by filling out this questionnaire.

It is important for us to receive your opinion, we are very grateful for your participation! The purpose of this survey is to measure the attitude among Swedish consumers towards e-commerce and online grocery shopping. You will be asked to answer a number of questions and it is important that you provide as honest answers as possible. The questionnaire does not take more than 5 minutes.

Have you previously purchased groceries online?

YES [ ] NO [ ]

Do you today purchase your groceries online?

YES [ ] NO [ ]

How often do you purchase groceries online?

Once a day [ ]
2-3 times a week [ ]
Once a week [ ]
Once a month [ ]
More seldom [ ]

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly disagree</th>
<th>Disagree</th>
<th>Neither disagree nor agree</th>
<th>Agree</th>
<th>Strongly agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>I.1 I do not intend to purchase products via the internet within the following year</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.2 I do not intend to purchase my groceries online within the following year</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.3 I do not have certain plans to purchase my groceries online</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.4 Me and my family feel a strong commitment in incorporating online grocery shopping into our weekly routine within the near future</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td>I.5 I intend to change my use of online grocery shopping</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.6 I intend to incorporate technology into my daily routine</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.1 Incorporating online grocery shopping in my family routine would be harmful</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.2 Incorporating online grocery shopping in my family routine would be negative</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.3 Incorporating online grocery shopping in my family routine would be inefficient</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.4 Shopping groceries through the internet is attractive to me and my family’s’ daily life</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.5 Purchasing groceries online is well suited to the way me and my family normally tends to shop groceries</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.6 In general me and my family feels that change in routines is complicated</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>A.7 Me and my family feels that incorporating technology in our everyday lives is a good thing</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SN.1 Most people who are important to me and my family do not think that we should incorporate online grocery shopping to our everyday lives</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SN.2 Most friends who influence the behaviour of me and my family do not think that we should</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>incorporate online grocery shopping</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>--------------------------------------</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SN.3 People whose opinions my family value would not prefer if my family incorporated online grocery shopping</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SN.4 Most families that are important to my family have incorporated online grocery shopping to their everyday lives</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SN.5 People that influence me and my family would feel positive if routines in my everyday life would be changed</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>SN.6 My friends think that technology in general is harmful towards my family</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.1 Incorporating online grocery shopping within my family routine would be difficult</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.2 Incorporating online grocery shopping within my family routine would not be under control</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.3 Incorporating online grocery shopping within my family routine would be difficult to arrange</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.4 It is difficult to receive groceries purchased via the internet and to have them delivered to my home</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.5 In general electronic shopping is easy</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.6 It is easy to find the</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>products I need through online shopping</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>----------------------------------------</td>
<td>---</td>
<td>---</td>
<td>---</td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.7 I perceive change in my everyday routine to be harmful to me and my family</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PCB.8 I perceive incorporating technology to the routine of me and my family to be difficult and harmful</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Demographics**

I am
Female [ ]
Male[ ]
My age is
-18 [ ]
18-25 [ ]
25-30 [ ]
30-35 [ ]
35-40 [ ]
40-45 [ ]
50-55 [ ]
55+ [ ]
Please indicate your level of education
Elementary school [ ]
Upper secondary school [ ]
University/College [ ]
Please state your work situation
Full time [ ]
Part time [ ]
Student [ ]
Unemployed [ ]
Retired [ ]
Please indicate your family situation
Single no kids [ ]
Single with kids [ ]
Married with kids [ ]
Married no kids [ ]
Partner no kids [ ]
Partner kids [ ]
I have _____number of kids

The average amount of money my family spends on food per week is:
500-1000SEK [ ]
1000-1500SEK [ ]
1500-2000SEK [ ]
2000-2500SEK [ ]
3000-3500SEK [ ]
3500SEK- [ ]

The average yearly of my household income
-400.000SEK [ ]
400.000-500.000SEK [ ]
500.000-600.000SEK [ ]
600.000-700.000SEK [ ]
800.000-900.000SEK [ ]
900.000SEK- [ ]
I choose not to provide this information [ ]
I live close to_____________
Thank you again for this participation!
**Appendix 4 - The questionnaire in Swedish**

Hej!


Har du tidigare handlat mat matvaror via nätet?

<table>
<thead>
<tr>
<th>JA [ ]</th>
<th>NEJ [ ]</th>
</tr>
</thead>
</table>

Handlar du idag dina matvaror via nätet?

<table>
<thead>
<tr>
<th>JA [ ]</th>
<th>NEJ [ ]</th>
</tr>
</thead>
</table>

Hur ofta handlar du dina matvaror via nätet?

| En gång om dagen [ ] |
| 2-3 gånger i veckan [ ] |
| 1 gång i veckan [ ] |
| 1 gång i månaden [ ] |
| Mer sällan [ ] |

<table>
<thead>
<tr>
<th>Statement</th>
<th>Häller inte med</th>
<th>Häller delvis inte med</th>
<th>Varken eller</th>
<th>Häller delvis med</th>
<th>Häller med</th>
</tr>
</thead>
<tbody>
<tr>
<td>I.1 Jag har inte som avsikt att handla produkter via nätet inom det närmaste året</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.2 Jag har inte som avsikt att handla mina matvaror via nätet inom det närmaste året</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.3 Jag har inga planer på att handla mina matvaror via nätet inom det närmaste året</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>I.4 Jag och min familj känner ett starkt engagemang till att rutinmässigt handla matvaror via nätet inom en snar framtid</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
I.5 Jag har som avsikt att förändra min användning av att handla matvaror via nätet

I.6 Jag har som avsikt att använda teknologi som hjälpmedel i mina inköp av matvaror

A.1 Att köpa matvaror via nätet skulle vara skadligt för mig och min familj

A.2 Att köpa matvaror via nätet skulle vara negativt för mig och min familj

A.3 Att köpa matvaror via nätet skulle vara ineffektivt för mig och min familj

A.4 Att handla matvaror via nätet är något som är attraktivt för mig och min familj

A.5 Att handla matvaror via nätet skulle passa in i det sätt som jag och min familj vanligtvis handlar matvaror

A.6 Generellt känner jag och min familj att förändringar i dagliga rutiner är komplicerade

A.7 Jag och min familj känner att användning av teknologi i vardagen är positivt

SN.1 De flesta personer som är viktiga för mig och min familj tycker inte att vi borde göra matvaruinköp via nätet

SN.2 De flesta av mina vänner som influerar mig och min familj tycker inte att vi borde göra matvaruinköp
| SN.3 Personer vars åsikt jag och min familj värdesätter skulle inte föredra att vi gjorde våra matvaruinköp via nätet |
| SN.4 De flesta familjevänner som är viktiga för mig och min familj gör sina matvaruinköp via nätet |
| SN.5 Människor som influerar mig och min familj skulle vara positivt inställda till en förändring i min familjs dagliga rutiner |
| SN.6 Mina vänner tycker generellt att användning av teknologi som hjälpmedel är skadligt för mig och min familj |
| PCB.1 Att göra matvaruinköp via nätet till en del av vardagen skulle vara svårt för mig och min familj |
| PCB.2 Att göra matvaruinköp via nätet till en del av vardagen skulle vara svårt att kontrollera för mig och min familj |
| PCB.3 Att göra matvaruinköp via nätet till en del av vardagen skulle vara svårt att anordna för mig och min familj |
| PCB.4 Det är svårt att få matvaror som jag handlar via nätet levererade till mitt hem |
| PCB.5 Att handla via nätet är lätt |
| PCB.6 Det är lätt att hitta de produkter jag behöver på nätet |
PCB.7 Jag anser att förändringar i min vardagliga rutin skulle vara skadligt för mig och min familj

PCB.8 Jag anser att användning av teknologi i min dagliga rutin skulle vara svårt och skadligt för mig och min familj

**Demografi**

Jag är

Kvinna [ ] Man [ ]

Min ålder är

-18 år [ ]
18-25 år [ ]
25-30 år [ ]
30-35 år [ ]
35-40 år [ ]
40-45 år [ ]
50-55 år [ ]
55+ år [ ]

Vad är din utbildningsnivå?

Grundskola [ ]
Gymnasium [ ]
Eftergymnasial utbildning [ ]

Hur ser din arbetssituation ut?

Jag jobbar heltid [ ]
Jag jobbar deltid [ ]
Jag är student [ ]
Jag är arbetslös [ ]
Jag är pensionerad [ ]

Hur ser din familjesituation ut?

Ensamstående utan barn [ ]
Ensamtstående med barn och/eller väntar barn []
Gift med barn och/eller väntar barn []
Gift utan barn []
Partner utan barn []
Partner med barn och/eller väntar barn []
Jag har ___ antal barn
Den genomsnittliga summan som mitt hushåll spenderar på mat per vecka är:
500-1000SEK []
1000-1500SEK []
1500-2000SEK []
2000-2500SEK []
3000-3500SEK []
3500SEK- []
Mitt hushålls årliga inkomst
-400.000SEK []
400.000-500.000SEK []
500.000-600.000SEK []
600.000-700.000SEK []
800.000-900.000SEK []
900.000SEK- []
Jag väljer att inte svara på denna fråga []
Jag bor nära__________
Tack så mycket för att du tog dig tid att hjälpa oss!
## Appendix 5 - Table of control variables

<table>
<thead>
<tr>
<th>Variable</th>
<th>Old value</th>
<th>New value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Education</td>
<td>Other</td>
<td>1, 2</td>
</tr>
<tr>
<td></td>
<td>University</td>
<td>3</td>
</tr>
<tr>
<td>Work</td>
<td>Work</td>
<td>1, 2</td>
</tr>
<tr>
<td></td>
<td>Does not work</td>
<td>3, 4, 5</td>
</tr>
<tr>
<td>Family</td>
<td>Children</td>
<td>2, 3, 5</td>
</tr>
<tr>
<td></td>
<td>Not Children</td>
<td>1, 4, 6</td>
</tr>
<tr>
<td>Spending</td>
<td>Low -500-2000</td>
<td>1, 2, 3</td>
</tr>
<tr>
<td></td>
<td>High 2000-</td>
<td>4, 5, 6</td>
</tr>
<tr>
<td>Income</td>
<td>Low - 600.000</td>
<td>1, 2, 3</td>
</tr>
<tr>
<td></td>
<td>High 600.000-</td>
<td>4, 5, 6</td>
</tr>
<tr>
<td>Age</td>
<td>-35</td>
<td>1, 2, 3, 4</td>
</tr>
<tr>
<td></td>
<td>40-</td>
<td>5, 6, 7, 8, 9</td>
</tr>
<tr>
<td>Current behaviour</td>
<td>Shop</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>Does not shop</td>
<td>.</td>
</tr>
</tbody>
</table>
## Appendix 6 - Multi Linear Regression Analysis

### Model Summary

<table>
<thead>
<tr>
<th>Model</th>
<th>R</th>
<th>R Square</th>
<th>Adjusted R Square</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>0.726</td>
<td>0.526</td>
<td>0.464</td>
</tr>
<tr>
<td>2</td>
<td>0.819</td>
<td>0.670</td>
<td>0.607</td>
</tr>
</tbody>
</table>

### Model Summary

<table>
<thead>
<tr>
<th>Model</th>
<th>Change Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>df1</td>
</tr>
<tr>
<td>1</td>
<td>8</td>
</tr>
<tr>
<td>2</td>
<td>3</td>
</tr>
</tbody>
</table>

### ANOVA

<table>
<thead>
<tr>
<th>Model</th>
<th>Sum of Squares</th>
<th>df</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Regression</td>
<td>38,608</td>
<td>8</td>
<td>4,826</td>
<td>8.346</td>
</tr>
<tr>
<td></td>
<td>Residual</td>
<td>34,697</td>
<td>60</td>
<td>0.578</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>73,305</td>
<td>68</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>Regression</td>
<td>49,139</td>
<td>11</td>
<td>4,467</td>
<td>10.536</td>
</tr>
<tr>
<td></td>
<td>Residual</td>
<td>24,166</td>
<td>57</td>
<td>0.424</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Total</td>
<td>73,305</td>
<td>68</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
### Coefficients

<table>
<thead>
<tr>
<th>Model</th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>t</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
<td></td>
</tr>
<tr>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>(Constant)</td>
<td>-2.158</td>
<td>.008</td>
<td>-2.369</td>
<td>.020</td>
</tr>
<tr>
<td>Education</td>
<td>.493</td>
<td>.263</td>
<td>.181</td>
<td>1.875</td>
</tr>
<tr>
<td>Work</td>
<td>-.767</td>
<td>.279</td>
<td>-.320</td>
<td>-2.747</td>
</tr>
<tr>
<td>Family</td>
<td>.199</td>
<td>.243</td>
<td>.080</td>
<td>.920</td>
</tr>
<tr>
<td>Age</td>
<td>.162</td>
<td>.201</td>
<td>.078</td>
<td>.803</td>
</tr>
<tr>
<td>Spending</td>
<td>.183</td>
<td>.274</td>
<td>.063</td>
<td>.669</td>
</tr>
<tr>
<td>Income</td>
<td>-.552</td>
<td>.237</td>
<td>-.269</td>
<td>-2.329</td>
</tr>
<tr>
<td>Har du tidigare handlat matvaror via nätet?</td>
<td>.203</td>
<td>.243</td>
<td>.136</td>
<td>1.166</td>
</tr>
<tr>
<td>Handlar du idag dina matvaror via nätet?</td>
<td>1.193</td>
<td>.257</td>
<td>.551</td>
<td>4.650</td>
</tr>
<tr>
<td>2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>(Constant)</td>
<td>-1.684</td>
<td>.783</td>
<td>-2.149</td>
<td>.036</td>
</tr>
<tr>
<td>Education</td>
<td>.404</td>
<td>.227</td>
<td>.148</td>
<td>1.775</td>
</tr>
<tr>
<td>Work</td>
<td>-.679</td>
<td>.240</td>
<td>-.284</td>
<td>-2.828</td>
</tr>
<tr>
<td>Family</td>
<td>.178</td>
<td>.214</td>
<td>.071</td>
<td>.829</td>
</tr>
<tr>
<td>Age</td>
<td>.205</td>
<td>.174</td>
<td>.097</td>
<td>1.180</td>
</tr>
<tr>
<td>Spending</td>
<td>.197</td>
<td>.237</td>
<td>.067</td>
<td>.833</td>
</tr>
<tr>
<td>Income</td>
<td>-.560</td>
<td>.211</td>
<td>-.272</td>
<td>-2.854</td>
</tr>
<tr>
<td>Har du tidigare handlat matvaror via nätet?</td>
<td>.315</td>
<td>.208</td>
<td>.161</td>
<td>1.512</td>
</tr>
<tr>
<td>Handlar du idag dina matvaror via nätet?</td>
<td>.883</td>
<td>.230</td>
<td>.408</td>
<td>3.833</td>
</tr>
<tr>
<td>Attitude</td>
<td>.371</td>
<td>.080</td>
<td>.379</td>
<td>4.625</td>
</tr>
<tr>
<td>SN</td>
<td>-.018</td>
<td>.088</td>
<td>-.017</td>
<td>-2.00</td>
</tr>
<tr>
<td>PBC</td>
<td>-.180</td>
<td>.085</td>
<td>-.169</td>
<td>-2.111</td>
</tr>
</tbody>
</table>

a. Dependent Variable: Intention