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What's bugging Sweden?

A qualitative study on the market formation for edible insects in Sweden

Abstract

Previous research urges the need to reconnect marketing to markets, and more specifically highlights the lack of studies on new markets. This thesis aims at filling this research gap by increasing the understanding of how new markets are formed. This is done through a qualitative case study of the market for edible insects in Sweden, where the main data has been collected through interviews. Insects are currently not classified as food by Swedish authorities and are therefore illegal to sell for human consumption. Nevertheless, activities to form a market are taking place. Since this market has not previously been studied, we further aim to make an empirical contribution by consolidating information about historical and current events happening on this market.

By using a market-as-practice perspective, this study identifies what activities within the normalizing, representational and exchange practices contribute to the market formation. Our findings show that two opposed ideas currently compete on the forming market. One views insect as edible and the other as non-edible. The idea that insects are non-edible is strongly performative in the normalizing practice through a salesban on edible insects. It successfully excludes insect based products from the food market and slows down the market formation. On the other hand, opposing activities are driving the formation of the market and, through the process of legitimation, trying to get insects accepted as edible. The two opposed views about insects are not equally performative throughout all practices which results in multiple versions of the market co-existing. The different activities are then shaping the market in opposite directions, creating instability on the new market.

Keywords: Market formation, Edible insects, Entopreneurs, Performativity, Legitimation

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The idea of this thesis derives from a profound interest in sustainability, product innovation and food. When choosing topic, we agreed upon writing about something that hopefully contributes to a positive impact on the world as we know it. By writing this thesis, we aim to raise awareness of the issue with our current consumption habits by elaborating on alternative ways to eat. Additionally, we found it very fascinating to see how our own perceptions of insects have changed during these months, raising reflections of our own subjective truths and that what is considered "normal" is closely connected to culture.

Whether you love or hate the idea of including insects into your diet, we hope that our thesis will create interesting discussions around the dinner tables, in regards to what will be the food of the future.

Many people have contributed to our thesis. Big thanks to:

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Definitions

Edible Insect Enthusiasts	We define an "edible insect enthusiast" as a person in who is in favor of eating insects and proactively supports it.
Entomophagy	Technical term for human consumption of insects. (Entomophagy, 2017)
Entopreneur	Entrepreneurs working on a start-up that aims to sell insects for human consumption or as animal feed. However, in this thesis we focus on insects for human consumption.
Food market	The "market" where food that has been classified as edible by the National Food Agency in Sweden is exchanged.
Insect & Edible Insect	An insect is "any of a class (insecta) of arthropods (such as bugs or bees) with well-defined head, thorax, and abdomen, only three pairs of legs, and typically one or two pairs of wings." (Merriam Webster, 2017) We define edible insects as insects for human consumption.
Livsmedelsverket	The National Food Agency in Sweden. Expert and central control authority for food. The National Food Agency is, on behalf of the Swedish government, working towards establishing, "healthy diet habits, safe food and fair practices in the food trade." (Livsmedelsverket, 2017a)
Market	"On-going socio-material enactments that organize economized exchanges" (Nenonen et al., 2014, p 3)
Miljöförvaltningen	A Swedish authority on municipality level that manages environmental aspects, including management of foods in Sweden. In the context of edible insects, Miljöförvaltningen is a decentralized decision-making unit who reports to Livsmedelsverket, and are in charge of conducting food control inspections.
Novel Food	"Novel Food is defined as food that has not been consumed to a significant degree by humans in the EU prior to 1997, when the first Regulation on novel food came into force." (European Commission, 2017a)
Vinnova	The Innovation Agency of Sweden. Their mission is "to promote sustainable growth by improving the conditions for innovation, as well as funding needs-driven research." (Vinnova, 2017a) In the context of this study, Vinnova has funded several research and development projects associated with edible insect products.

1. Introduction

This study explores the market formation process of edible insects in Sweden. This choice of subject is derived from a fascination of how new markets are formed, combined with a profound interest in sustainable products. In the subsequent sections, we will briefly introduce the subject of study. This will be followed by a presentation of the research gap we aim to fill as well as our research question, delimitations and an outline of the thesis.

1.1. The world calls for new protein sources

The protein shift is a central concept worldwide, promoting the replacement of meat in our everyday lives to more healthy and sustainable options (Forbes, 2015a). Documentaries like Cowspiracy (2014) urges us to become more aware of the negative environmental impact of the meat industry, advocating the need to find other alternatives in order to not exploit all the resources of our planet. Additionally, health and wellness consumers are becoming increasingly influential in regards to redefining the food culture, pushing fun and nutritional alternatives with high quality (Forbes, 2015b). Many companies have realized the business opportunities created by this shift, resulting in new products such as "oomph" (based on soybean protein), "mifú" (based on milk protein) and "quorn" (based on fungi). Moreover, research of new alternative proteins is booming, within for instance of cultured meat, algae, and lupine seeds (Future of Food 2050, 2015).

Highly discussed new protein sources are edible insects. Today, at least two billion people eat insects regularly, and there are more than 1900 insect species used as food (FAO, 2013). Insect consumption occurs worldwide, however it is much more common in tropical areas (ibid.). In order to feed the almost ten billion people expected to live on our planet in 2050 (United Nations, 2015), insects are suggested to be a great alternative protein source, thus "a way to improve nutrition, reduce greenhouse-gas emissions and create jobs in insect production" (United Nations, cited in New York Times, 2015).

In the US, crickets are now identified as the "gateway bug", presented by hipsters on the Brooklyn startup scene (Future of Food, 2016). Companies offering cricket bars and cricket powder are booming in the US, with an edible insect market worth $33 million in 2015 (Global Market Insights, 2015). Insects have also reached fine dining restaurants around the globe. One example is the Danish Michelin Restaurant Noma, where the founder further is co-initiator to the Nordic Food Lab, an open-source organization who "investigates food diversity and

deliciousness". Edible insects constitute a big part of their research, where they try to "create a gastronomic argument that will make insects an acceptable food in the Western world". (Nordic Food Lab, 2017)

Looking at Europe, the market is "subject to a patchwork of regulation" (Europe Newsweek, 2015). Insects are generally prohibited due to the regulation of novel foods (EC No 258/97), where an approved application proving insects to be safe and nutritional food is required (European Commission, 2017a). However, some countries such as Belgium, Netherlands and the UK are tolerating edible insects to some extent, such as specific products or species (Bugsfeed, 2016). Despite the legislative restrictions, the insect food industry in Europe is expected to reach over $360 million until 2020 (New Nutrition Business, cited in Europe Newsweek, 2015).

In Sweden, it is illegal to sell edible insects today. Yet retailers are keeping an eye on the topic; entopreneurs[1] are emerging; a lobby group is organized; business relations are negotiated and products are developed – all due to the common belief that insects will be classified as food in the near future. In other words, activities among entopreneurs continue despite the current prohibition. Drawing upon this notion, several questions arise: Why start businesses if the products developed are illegal to sell, and what are the consequences for the current entopreneurs positioned in the Swedish market? And more generally, building on the circumstance that eating insect is usually regarded with disgust in Western societies (FAO, 2013), how is a market formed for a product that is not necessarily aligned with the common norm?

Bearing these questions in mind, our main purpose of this thesis is to understand how a new market is formed, in the context of a radically new and norm-breaking product. Hence, our general research question is: *How is the market for edible insects in Sweden being formed?*

[1] See "Definitions" p. 3

1.2 Sales prohibition of insects in Sweden

In 2015, edible insects were a hot topic in Sweden. Entopreneurs were exposed in several media channels such as on national TV (tv4.se, 2015), on tasting venues (Jnytt.se, 2014), and newspapers (Svenska Dagbladet, 2015). Two Swedish startups were on the rise, with the aim of bringing insects onto people's dinner plates: Qvicket with its cricket flour and Hakuna Mat as a retailer of different insect snacks. In mid 2015, both companies were fully committed to their business ideas and had ongoing online shops. Then, the announcement came: the County Administration of Food Safety (Miljöförvaltningen) put a sales prohibition on both businesses. As a consequence, neither Hakuna Mat nor Qvicket were permitted to sell or market their products. Why, one may wonder? The answer is the regulation of novel foods; a EU regulation for new foods, meaning foods "that has not been consumed to a significant degree by humans in the EU prior to 1997" (European Commission, 2017a). The legislation was not new, however the interpretation of whether insects should be included or not had not been clear. Therefore, the notion of the novel foods regulation became more prominent in Sweden after the sales ban of Hakuna Mat and Qvicket in 2015, increasing the awareness of the prohibition of selling, marketing and conducting tastings of insects in Sweden.

The knowledge of the sales ban of Qvicket and Hakuna Mat spread, which changed the landscape for other actors by forcing them to acknowledge a regulation that many were previously unaware of. One might think a regulation classifying insect products as illegal, would stop the development of a market of edible insects in Sweden. Yet, an opposing observation is found: Up until March 2017, we have identified four startups entering the scene after the sales ban of Hakuna Mat and Qvicket - how could that be?

Through our observations, we have noted that Swedish entopreneurs are choosing different ways to overcome the sales prohibition. Two distinct solutions occur in Sweden during this period (between fall 2015 to spring 2017): entopreneurs either move into another market systems in order to recreate economic exchange, or find ways to adapt on the Swedish regulated market, while awaiting a deregulation.

An example of a company conducting the former is Qvicket, which moved its business to the Belgium in January 2016. According to the freedoms of the internal market of EU, the free movement of goods enables Qvicket to sell its products for private use to all countries within the EU, including to Swedish customers (up to 2 kilograms annually per person) (Jordbruksverket.se, 2016). Similarly, the cricket crisp bread startup Eat:em is currently in the process of establishing a

business in Denmark. As Martin Strid, CEO of Eat:em, describes it : "We've planned to only do product development until it would get legal to sell. However, now so many people are asking for our products, which is why we've chosen to meet that demand and launch faster by moving the business to Denmark."

Other startups have chosen to adapt to the Swedish market instead of moving to another geographical market. One example is the startup Nutrient, which is currently producing insects for research purposes while awaiting the deregulation. According to the CEO Adam Engström, this enables them to set up structures and develop their production processes even if they cannot sell anything today. Some startups are also working only with product development, in order to be ready to hit the market with an attractive product once insects will be legal in Sweden.

At the time of writing, there are many loose ends and unanswered question in regards to the edible insect market (both in Sweden but also on European level) in terms of nutritional value, consumption use and production processes to name a few areas (Jansson & Berggren, 2015). Additionally, the current EU regulation has been interpreted differently in different countries, resulting in confusion and intense debates regarding how insects should be depicted. In Sweden many forces are, according to "insect enthusiasts", working against activities in creating a market. Drawing on our interest and knowledge within the field of business and marketing we find this very interesting and will therefore focus on this matter more in detail.

1.3 Problematization & Research Gap

Research about entomophagy, the practice of eating insects, is surprisingly scarce which is why researchers stress the need to fill knowledge gaps within almost every aspect of the field (Jansson & Berggren, 2015). Studies have mainly focused on exploring consumer acceptance towards the product (Dicke et al, 2014; Rozin et al., 2014; Tan et al., 2014). Moreover, there have been studies about the nutritional benefits of insects (Rumpold and Schlüter, 2013; van Broekhoven et al., 2015), taste (Deroy et al., 2015; Evans et al., 2015) and environmental impact in production (Oonincx et al, 2010). No research has been found in regards to studying insects from a market perspective. Hence, our study aims at contribute to the research field of entomophagy by going beyond the consumer attitude's role in forming a market for edible insects, to what specific activities that are influencing the market formation of edible insects.

Additionally, we will use a market-as-practice perspective, which will be further explained in our theoretical framework (section 2.2). This field of research is still relatively new and unexplored, and has been encouraged as a proposed research opportunity by many as a mean to "reconnect marketing to markets" (Arajou et al., 2008; Kjellberg & Helgesson, 2007; Storbacka & Nenonen, 2011). Previous studies of market practices have mainly covered mature markets, thus lacking research in how new markets are created (Kjellberg et al., 2012; Storbacka & Nenonen, 2011).

Further on, no previous attempts to study this market and thereby consolidate information about the market for edible insects has, to our knowledge, been done. We therefor wish to contribute empirically by present information about historical and current events on this market.

To conclude we observe that both research within the market-as-practice perspective and the research on entomophagy are relatively limited. We have thereby identified three research gaps, which we aim to fill by first adding a market perspective on research within entomophagy, and secondly, to investigate how a *new* market is formed from a market-as-practice perspective. Additionally, a third aim of this study is the empirical contribution through the data collection and consolidation of information of this previously unstudied market.

1.4 Purpose & Research Question

The purpose of our thesis is to develop the understanding in how new markets are formed, by focusing on the formation process for the market of edible insects in Sweden. More specifically we seek to demonstrate how a new market is *formed* through *market practices*, hence describing the ongoing processes constituting the market formation. As a result of this, our main research question is: *How is the market for edible insects in Sweden being formed?*

This question will be realized by the division into two sub-questions:

a) What practices are forming the market edible insects in Sweden?
b) How are the practices forming the market for edible insects in Sweden?

Building on previous research on market shaping, we define *a market* as "on-going socio-material enactments that organize economized exchanges" (Nenonen et al., 2014, p 3). Further, we define *practices* as "all activities that contribute to constitute markets" (Kjellberg & Helgesson 2007, p. 141). Lastly, we define *market forming* as an early stage of a market shaping process (i.e. when a new market is being shaped).

1.5 Delimitations

This study has three delimitations in terms of scale and scope. Firstly, the focus for this study is on insects for human consumption. However, several research projects cover both research on insects for human and animal consumption, as synergies can be found between the two. Additionally, members of the Swedish insect lobby are both entopreneurs working with insects for food and feed. Due to the close connection between the two markets we aware of the difficulty in studying one without the other. However, due to time restrictions we needed to narrow our scope and therefore chose to exclude the "feed market" in this study.

Secondly, this study covers the market formation for edible insects in Sweden. Other markets naturally influence the Swedish market, which is something we have chosen to acknowledge, in terms of for instance the EU regulation of novel foods. Nevertheless, our main focus is on the Swedish market and Swedish actors.

Lastly, our study investigates practices forming the market for edible insects in Sweden. This includes practices working proactively to form a market as well as those potentially slowing down the formation. For the scope of this study we have chosen to direct our main focus on those activities working in favor of a market formation for edible insects (which will be categories as exchange, representational and normalizing practices). However, we have chosen to delimit the activities working "against" a market formation to only study the normalizing practice constituted by the Novel Food Act.

1.6 Thesis Outline

This thesis consists of seven chapters. Chapter 1 introduces the thesis, by presenting a brief background to the subject and present the purpose and research areas. Chapter 2 presents a review on literature relevant for our study, followed by a thorough description of our theoretical framework. In Chapter 3, we present and elaborate on the methods used in our study. Chapter 4 introduces an empirical background to our analysis, including a timeline of important events for the market-formation of edible insects in Sweden. In Chapter 5, we present our main findings combined with a parallel analysis. In Chapter 6, we conclude our findings by referring back to our purpose and answer the research questions. Lastly, in Chapter 7 we elaborate further on our findings and discuss additional interesting topics that came to mind as a result of this case study. This chapter further includes suggestions to future research, managerial implications, and limitations of our study.

2. Theoretical approach to market formation

The following sections will present the theoretical approach used as a basis for our analysis. Referring back to our main purpose, we want to increase the understanding of the market formation process for edible insects in Sweden. We have therefore chosen to build our analysis on the concept of markets-as-practice, meaning that we do not take market structures as given but instead study markets as ever-changing processes (Arajou et al., 2008). As mentioned briefly in section 1.3 (Problematization), this is a relatively new approach, which is why we find it necessary to explain it more in detail. This will be achieved by first briefly reviewing the background of the market-as-practice perspective, hence what disciplines it has evolved from. This is followed by a presentation of market-as-practice approach, where our main motives behind the choice of theoretical perspective will be presented. Lastly, a heuristic model of market-as-practices will be introduced. This model is created by Kjellberg and Helgesson (2007), and is chosen as the main framework for our analysis. In the end of this chapter, the key theoretical concepts are presented.

2.1 Review on studying markets with a practice approach

The markets as practice approach builds on theories of social practice and actor-network theory, emphasizing that markets are ongoing processes, and "continuous results of market practices" Kjellberg et al. 2012, p. 220). In order to set the chosen perspective into a context, we will briefly describe the study of social practices and the actors-network theory, followed by the presentation of the practice approach applied on markets and marketing.

2.1.1 Social practices and actor-network theory

Social practice theory has been applied within several disciplines such as strategy research (Whittington 2006), neuroscience (Lizardo, 2007), sociology (Bourdieu, 1977; Giddens, 1984) and studies of science and technology (STS) (Latour, 1987; Pickering, 1993; Callon, 1998). In general, the approach urges the need to take on a practical perspective on science, instead of only theorizing about it. Reckwitz defines a practice as "a routinized type of behavior which consists of several elements, interconnected to one another: forms of bodily activities, forms of mental activities, "things" and their use, a background knowledge in the form of understanding, know-how, states of emotion and motivational knowledge" (2002, p. 250). Within the social practices perspective, an agent is a "carrier of practice" meaning that all actors in a social network contribute to practices (ibid.).

Here, the need to include both human and non-humans (also referred to as "things") as actors are emphasized - an acknowledgement that was further developed within the actor-network theory.

An approach to social theory is actor-network theory (ANT), which evolved through Science and Technology Studies (STS). ANT focuses on exploring and understanding how the actors within a network are connected to each other (Latour, 2005). According to ANT, society should be seen as being "performed rather than given" which brings up the notion of performativity – a central element within ANT emphasizing that economic ideas also contributes to shape markets, thus "how theory influences practice" (Callon, 1998; Mattson, 2003 p2). According to two of the founders of the concept, Callon and Latour, an actor is an "element, which bends space around itself, makes other elements depend upon it and translates their will into a language of its own" (1981, p. 286). The concept of translations is essential within ANT, meaning that an actor through its practices try to align the other actors' interests with the aim to reach stability among different actors' associations (Latour, 1986; Callon & Latour, 1981). ANT stresses the incorporation of objects into social networks and therefore stating the agency of non-humans (Latour, 2005).[2]

2.1.2 Introducing the market-as-practice perspective

The market-as-practice perspective commenced in the late 1990's (Arajou et al., 2008). It developed from ANT, and could be understood as ANT applied on markets. The practice-based approach to markets evolved from discussions within marketing theory, where several scholars have commented on the need to increase the understanding, and attention paid to, the role of markets in marketing (Arajou et al., 2010; Kjellberg et al., 2012; Vargo 2007). Similar to ANT, the research emphasis is on "studying markets in the making, rather than markets as ready-made" (Kjellberg & Helgesson 2007, p. 141). Building on social practice and actor-network theory, theorists of market-as-practice agree that all actors, both human and non-human, are "carriers of practice" (Hagberg & Kjellberg, 2010; Reckwitz 2002). In our case, we interpret this perspective by acknowledging for example the object "insect" as an actor within the network we have investigated. From this perspective, the insect in itself is part of shaping the practices, which it is involved in (Hagberg 2016). Further, the concept of performativity is central also within the markets as practice perspective (Kjellberg & Helgesson 2006), stressing the need for

[2] Recognizing the growing literature of Actor Network Theory, the approach has also been subjected to critique, which should be acknowledged. One point of criticism is that ANT claims all actors within a network to be equally important. Connected to this is also the critique that ANT lacks the notion of power relations within a network, claiming that ANT is entirely descriptive.

studying the "performativity of market theories, or how ideas about markets (but also marketing tools) take part in shaping markets" (Callon, cited in Kjellberg & Helgesson 2007).

We argue that a market-as-practice perspective is suitable for our study due to several reasons.[3] Firstly, this view suggests that markets are shaped by actors through market practices (Arajou et al., 2008), whereby the focus lies on the *activities* that actually occur. We agree with this notion and believe that actual actions in relation to intended plans are more important to focus on in the formation of a market, as intended plans might never be executed. Connected to activities, this perspective further perceives markets as being subjects to constant change instead of being viewed as static entities (Arajou et al, 2008). We consider this notion especially prominent in our study, since the market is enacting at an early stage, where analyzing the market as a static entity would be difficult since new developments are emerging in a rapid pace, changing the market landscape. As we are interested in a market formation process, we argue that this perspective will help us get a deeper understanding of these processes. Moreover, this perspective is very new and stresses the need for more research within markets as practices (Arajou et al, 2008). As we agree with the theoretical stands mentioned above we are further thrilled to contribute with new research on a field that is very new.

Noteworthy is, that the market-as-practice perspective is not one single theory that explains "why", but should instead be used as an approach to understand "what" and "how" (Kjellberg & Helgesson, 2007). Hence, it should be used as a perspective that can be applied on describing the shaping of a market.[4] Market-as-practice will be further elaborated upon in the subsequent chapter, when we go deeper into the approach by introducing a framework: The heuristic model of markets as practices by Kjellberg and Helgesson (2007).

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[3] Other frameworks were considered before the choice of the market as practice approach. The authors discussed both conducting an industry and stakeholder analysis, including exploring the power relations between actors, and also a business model analysis between actors on the new market. However, due to the reasons mentioned above on p. 12, the market as practice approach was identified the most suitable for this study.

[4] This has been subject to critique, see footnote 2.

2.2 Our chosen theoretical framework

In this section, the model of Kjellberg and Helgesson (2007) is presented and elaborated upon. "Market practices" is the most central concept in this model, defined as "all activities that contribute to constitute markets" (Kjellberg & Helgesson 2007, p. 141). According to the authors themselves, this definition is intentionally broad, as they do not want to exclude any practice constituting the market. The practices have been further divided into three types of practices that are interlinked with each other: Exchange practices, normalizing practices and representational practices.

2.2.1 Introducing the model

Exchange practices are considered all activities related to accomplishing individual economic exchanges, such as marketing activities (e.g. pricing, distributions, and advertising). *Representational practices* cover activities that contribute to depicting how markets work, and produce images of the markets (e.g. reports depicting market shares, and annual reports). *Normalizing practices* comprise activities made in order to establish normative objectives, or guidelines, of how markets should work. These could be both formal and informal processes (e.g. political processes of establishing regulations, voluntary standards and institutions within a market).

In this framework, one practice produces inputs to the other practices through chains of *translations*. These translations differ between the different practice categories, and enable them to become interlinked with one another. Kjellberg and Helgesson (2006) explains the concept as "a basic social process by which something – such as a token, rule, product, technique, truth, or idea – spreads across time and space" (p 843). Important to note is that these "somethings", such as a rule, will not be translated from one practice to another unless "no one picks it up" (ibid. p 843). Taking the rule as an example, if it does not result in any actions, hence that no other actors are affected or change due to it, it will not lead to any affect in the market shaping process. An illustration of the practices and its interlinked translations is found below, and will be further described on the next page (*see figure 1*).

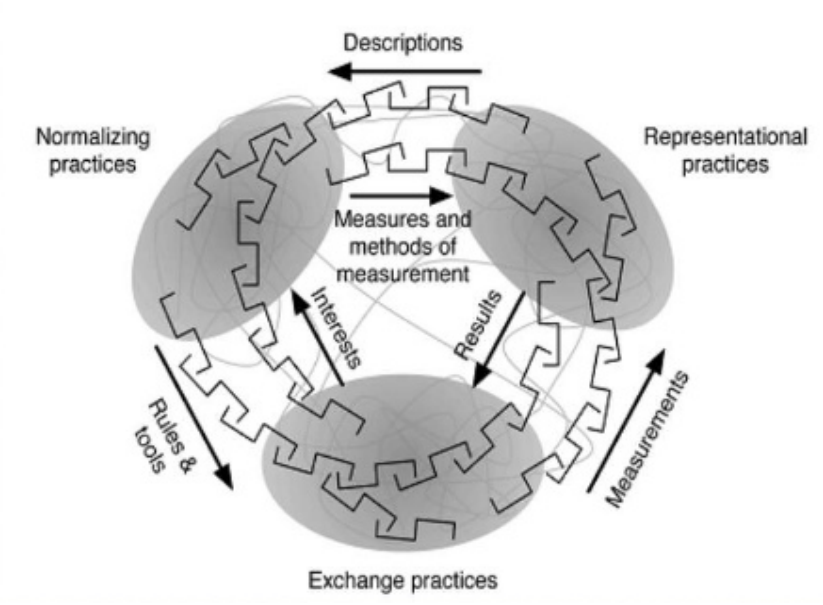

Figure 1. A conceptual model of market-as-practice. (Kjellberg & Helgesson 2007) The model consists of three practices (exchange, normalizing and representational) that are all interlinked through translations. Together, these practices constitute markets.

Exchange practices are translated into normalizing practices through *interests* (for example through lobbying). Additionally, these practices are translated to representational practices through *measurements*, which in turn will "generate market images" (Kjellberg & Olsson 2016, p 5). Normalizing practices are translated into exchange practices through *rules and tools* guiding how the exchange practices should work. Normalizing practices are translated into representational practices through *measures and methods of measurements,* which influence what market indicators that will be used. Representational practices are translated into: exchange practices through *results*, including "feedback on previous exchange activities as well as input to future ones" (Kjellberg & Olsson 2016, p 5), and into normalizing practices through *descriptions* of the market.

2.2.2 Looking at the sales ban through the lens of our framework

Previously, we have briefly described the prohibition of selling edible insects in Sweden (section 1.2). In order to illustrate how to apply the model described above, we will use the sales prohibition of Hakuna Mat as an example. First, we will give a short description of the activities that took place associated with the event, followed by inserting the different practices into the framework. *See figure 2.*

Hakuna Mat sent in an application to the County Administration of Food Safety (Miljöförvaltningen), which is a decentralized decision-making unit of the Swedish Food Administration, with the request of becoming classified as a food company. Before this, they had sold edible insect products online and had taste venues at trade shows and other events. However, in order to be able to scale the business, Hakuna Mat needed a confirmation that what they did was within the legal frame. The application was rejected, with referral to the Novel Foods regulation. According to Hakuna Mat, the application was the catalyzer for the following sales prohibitions and tighter restrictions of other entopreneurs and restaurants (Emma Aspholmer & Ellen Gellerbrant, Hakuna Mat).

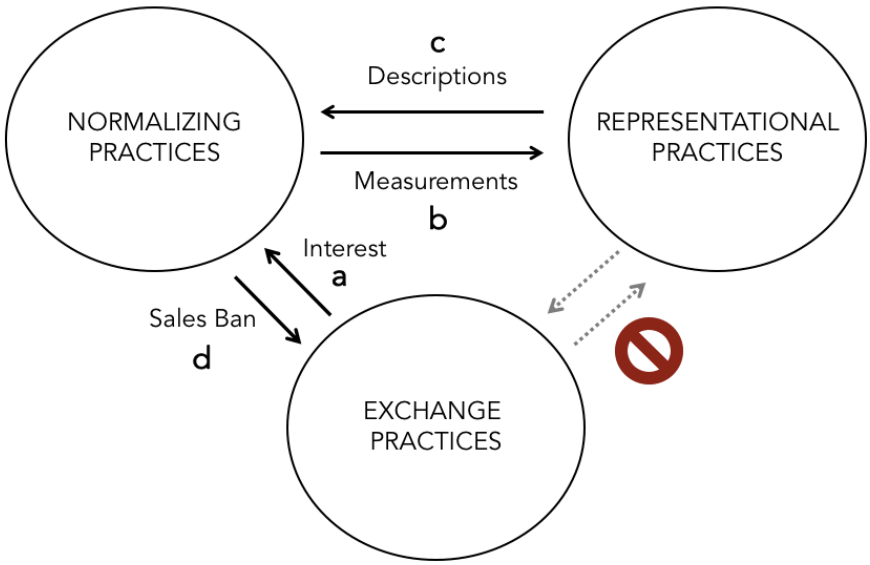

Figure 2: Model illustrating how the sales prohibition of Hakuna Mat stops economic exchange, hence hindering translations between exchange and representational practices. Interpreted from Kjellberg & Helgesson (2007).

Hakuna Mat's application to become a food business was translated from exchange practices to normalizing practices, through the *interest* of being classified as a food business (a). In this case, "Miljöförvaltningen" defined the insect-based products Hakuna Mat wanted to sell as non-edible, as it did not live up to the regulatory classifications of "food". Through the results of the *measurements and methods* (b) in how to cover the requirements to get their request approved, the representational practices got translated back to normalizing practices in the form of a *description* (c) of Hakuna Mat not qualifying as a food company. Further on, this event illustrates how normalizing practices got translated back to Hakuna Mat through *rules and tools* (d) into exchange practices, resulting in a stopped commerce of edible insects, thus changing the prerequisites for the market. More specifically it meant that it was now clear that selling and marketing insect products for human consumption was illegal, which had not been as clearly communicated

previously. With no economic exchanges, there are no sales figures to *measure* and turn into representations such as depiction of market shares or annual reports, resulting in a stop of translations between exchange and representational practices.

2.2.3 Performativity: How ideas shape action

As previously mentioned, a central element within the practice approach is "performativity". For the sake of simplicity, we have chosen to present and exemplify our conceptual model before introducing this third dimension further. Performativity "is seen as a process through which shared ideas shape the world by shaping actions" (Kjellberg & Helgesson 2006, p 845). Viewing markets from a practice perspective, the notion of performativity helps explain the relationship between "practices appearing as ideas to practice appearing as a world out there" (ibid. p 845), as ideas become performative through translation into "actions". These translations, from ideas to actions, "can thus be thought of as taking place orthogonally in relation to the three interlinked categories of market practice, providing a third dimension to the model" (ibid, p 845). *(See figure 3)*. We argue that performativity is central in our case, as it explains how the ideas of whether insects are edible or not contribute to the formation of this particular market. Moreover, ideas can be performative "in all three categories of market practice." (ibid, p. 845).

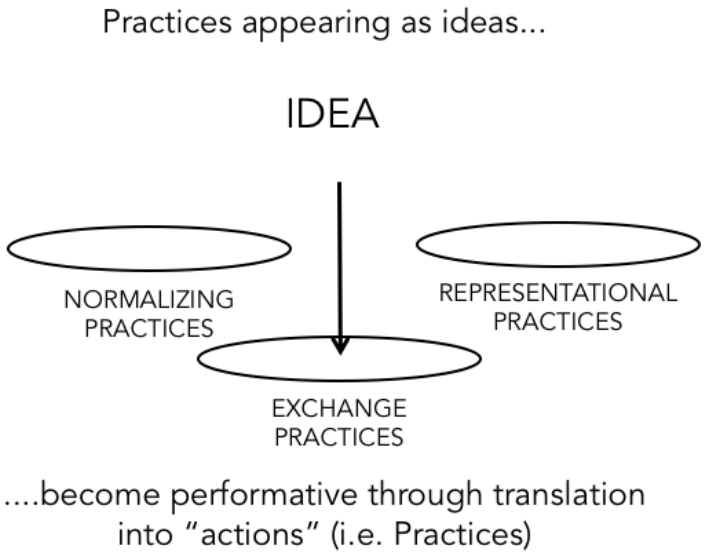

Figure 3. Illustration of how an idea gets performative in exchange practices through the translation into actions. Own illustration.

Even though ideas can be performative throughout all three categories of practices, they are not always equally performative in all three practices (Kjellberg & Helgesson, 2006). To illustrate this, further, Kjellberg & Helgesson (2006) presents two different types of performativity: Austinian and generic performativity. These are illustrated in in *figure 4*.

Austinian performativity occurs in "a situation where a strong link has been forged between a clearly explicated theory and a resulting market" (Kjellberg & Helgesson 2006, p. 846). More specifically, this means that all market practices are shaped by the same idea, "down to the details of the individual exchange situations" (ibid. p. 846) However, this rarely reflects observed real-life situations. Generic performativity, on the other hand, describes situations where there are different levels of performativity within the three different categories of market practices (Ibid). One example is when there is strong performativity in only one of the practices, hence the "performativity would be 'contained' in one category of market practice, affecting only the outcomes of those practices." Additionally, there can be controverting ideas working against each other within each practice (ibid, p. 846).

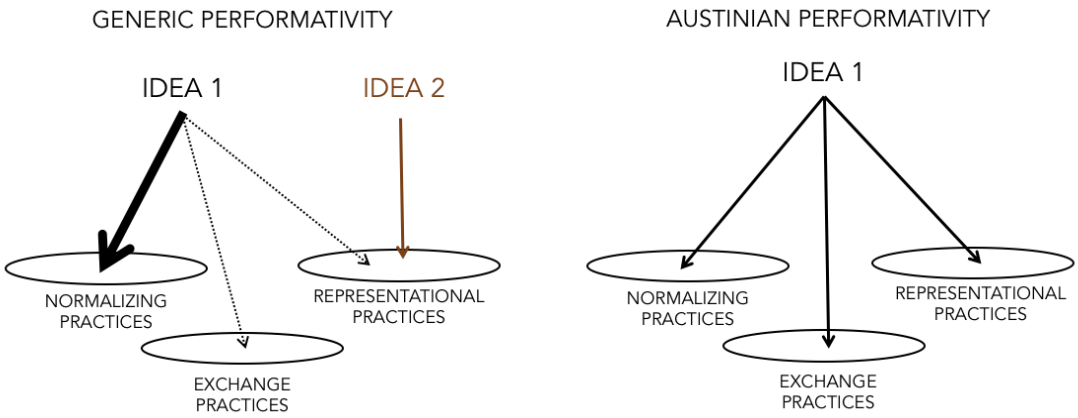

Figure 4. Illustrations of generic and austinian performativity. Own illustration.

2.2.4 Examples where our framework has been applied

Bearing in mind that the practice approach to markets is a new field, there have been studies on markets using the practice approach in a similar way that we are. These studies have served as inspiration of how to apply the model to a case study. Additionally, we have brought their findings with us when studying the creation of the market for edible insects in Sweden. Below, we will present two empirical case studies where the framework of Kjellberg and Helgesson (2007) has been used.

The first one is a study by Kjellberg (2010), which highlights the translation process between representational and normalizing practices applied on the market for air travel in Sweden. Here, he identifies different perceived market versions between the airline operator SAS and the Swedish Competition Authority (SCA) as main reasons behind a lawsuit of SAS's frequent flyer program. The article questioned the idealized picture of how markets are shaped through, for instance economic institutions, and illustrated that markets are ongoing processes where both regulatory efforts and marketing play important roles in shaping markets. These findings fit our case study, since we are also exploring a regulated market where marketing efforts are made even though there are regulations prohibiting the market to evolve.

Another study conducted by Kjellberg and Olson (2016), explores the effects of a deregulation of cannabis in the USA, and the qualification of the product, showing that the market creation of cannabis was shaped through the interaction and interrelations with other surrounding markets, including how the black cannabis market affected the white market after the deregulation. We take inspiration from this article by developing the concept of qualification of products and the fact that we also are studying a market creation of a regulated market. However, one distinct difference is that our study focuses on the market shaping before the deregulation, hence our "time scope" is much narrower and the observations are made at an earlier stage in the market formation process. Moreover, we study one isolated market instead of the interrelation between different markets.

2.2.5 List of key theoretical concepts

By using this framework and the market-as-practice perspective, there are some concepts that are of importance to understand. Therefore, we have conducted a list of the key theoretical concepts of our study together with how we define them.

CONCEPT	DEFINITION
Exchange practices	”Concrete activities related to the consummation of individual economic exchanges” (Kjellberg & Helgesson 2007, p. 142) Examples: Price negotiations, advertising and product testing.
Market practices	“All activities that contribute to constitute markets” (Kjellberg & Helgesson 2007, p. 141)
Normalizing practices	“Activities that contribute to establish guidelines for how a market should be (re)shaped or work according to some (group of) actor(s). That is, it refers to the establishment of normative objectives” (Kjellberg & Helgesson 2007, p. 143). Examples: strategic planning, establishment of objectives and specifying general rules of competition.
Performativity	”A process through which shared ideas shape the world by shaping actions.” (Kjellberg & Helgesson 2006, p. 845)
Representational practices	“Activities that contribute to depict markets and/or how they work” (Kjellberg & Helgesson 2007, p. 143) Examples: Transforming sales data and processing market statistics into representations.
Translations	“A basic social process by which something – such as a token, rule, product, technique, truth, or idea – spreads across time and space” (Kjellberg & Helgesson 2006, p. 843).

3. Methodology

This chapter introduces the methodology used in this study. First, we will present our research strategy, where we argue for our choice of conducting a qualitative study to investigate the formation of the edible insect market in Sweden. This is followed by a presentation of the research design, where we explain the reasons behind choosing a case study format, and the choice of an abductive approach. In the third section we will present the data collection process, including elaboration of sampling of interviewees, interview design and data processing. Lastly, we will discuss the quality of this study through the criterions of validity and reliability.

3.1 Research Strategy

As stated by Flick (2014), the choice of research strategy used should be decided by the research question and the goal of the study. As the aim of this study is to get increased understanding about how new markets are formed, a qualitative research approach was chosen for several reasons. First of all, by studying a market formation from a market-as-practice perspective, we are investigating the processes that constitute this formation, which then makes a qualitative study suitable (Bryman & Bell, 2011). Additionally, due to our view on markets we are further interested in exploring the "interconnection between the actions of participants of social settings" (Bryman 2012, p. 408). Moreover, due to its novelty, little to no research has previously been done on the upcoming market for edible insects in Sweden. Hence, the previous knowledge and understanding about this market is too limited in order for us to test a hypothesis with fruitful results, which is why a quantitative method with deductive approach was discarded (Flick, 2014). Instead we want to understand the market from an actor subjective point of view, which further makes the qualitative method more suitable (Flick, 2014).

3.2 Research Design

3.2.1 Study Design: A case study

Several study designs were discussed and elaborated upon before the final choice of conducting a case study. As the aim of this study is to get a deeper understanding of the activities present in the market formation, a case study was chosen for four main reasons. First of all, the study design allows us to "capture the process under study in a very detailed and exact way" (Flick 2009, p.134). Hence, we can further analyze this particular market and fully understand the dynamics of the market formation. By using for example a comparative study instead, the study could have become limited due to an "intended comparability" between two cases (Flick, 2014).

Additionally, as this market is not yet established, sending out a survey to the market actors would have been challenging since no mapping of the upcoming market has been made previously. Therefore, a case study is deemed most suitable. (Flick, 2014) Further on, the method allows us to more fully explore the different perspectives of the actors in this market-making process (Flick, 2014). As the market formation includes different forces that work in sometimes opposite directions, the study design allows us to explore the opposing views more closely.

3.2.2 An abductive approach

As the aim of this thesis is to get further understanding of how new markets are formed, through the lens of a market-as-practice-perspective, the focus lies on the development of this concept rather than development of new concepts/theories from empirical data (induction) or the testing of existing concepts/theories (deduction) (Dubois & Gadde, 2002). Hence, an abductive approach similar to what Dubois and Gadde refers to as "systematic combining" is used as they stress its usefulness in the development of theories/concepts. This approach allows us to go back and forth between theory and empirical data and is described as a "process where theoretical framework, empirical fieldwork, and case analysis evolve simultaneously" (ibid., 2002 p. 554).

3.3 Data collection

The main data was collected through semi-structured interviews with, by us identified, relevant actors on the upcoming market for edible insects in Sweden. The collection of verbal data is further widely used within qualitative research, supporting our choice of data collection given our research strategy (Flick, 2014). This data was supported and/or validated through additional secondary data, to the extent it was possible.

3.3.1 Interview sample

The interview sample consists of 16 interviews with duration of 40-70 minutes. The interviews were held face-to-face, via the video-call service Skype or conducted over the telephone. The interviewees were chosen based on their presence on the upcoming market for edible insects in Sweden, hence sampling was purposive (Flick, 2014). Due to the novelty of our subject we started out with a web-based market scanning searching for blogs, news and facts about edible insects, in order to localize potential participants for our study. Our first samples of entopreneurs were found through the blog "Bug Burger" by Anders Engström. Before the interview phase started, we initiated a meeting with Anders Engström where we got additional

information about the upcoming market and contact information to relevant actors. During each interview, we asked questions about the interviewee's network on the "edible insect market" in order to get an overview of the actors. When interviewing the entopreneurs we used the "snowballing technique" (Flick, 2014), meaning that we asked the interviewees for contact details to other entopreneurs. This technique was very useful for us as the market has not yet, been mapped out before, hence actors are difficult to localize and get in contact with (Bryman, 2012).

Our aim has been to cover all relevant actors that are currently working with edible insects in Sweden, or could potentially play an important role in the future (eg. The Food Retailers). However, some actors have declined participation (see Appendix 9.1.2) and some actors have not been interviewed due to either the time limitation of this study or due to that they came to our knowledge too late in the process.

3.3.2 List of interviewees

In this section, an overview of our interviewees is presented (Table 1). The different actors have been categorized into different actor groups depending on their position on the market of study. A more detailed presentation of the interviewees can be found in Appendix 9.1.1

Actor Group	Organization	Representative	Role	Interview Date
Entopreneurs	Hakuna Mat	Ellen Gellerbrant & Emma Aspholmer	Co-founders	07-02-2017
	Eat:em	Martin Strid	Co-founder, CEO	10-02-2017
	Nutrient	Adam Engström	Founder, CEO	13-02-2017
	Tebrito	Nils Österström	Co-founder, CEO	07-02-2017
	Ento	Erik Stenberg	Co-founder	01-03-2017
	Kafkah	Alberto Corti	Co-founder	20-03-2017
Institutions	Vinnova	Lena Eckerdal Rimsten	Program Manager, Section: Health, Department: Life science	16-02-2017
	Livsmedelsverket	Astrid Walles-Granberg	Advisor, Support Department, Inspection Division	06-03-2017
Food Retailers	ICA	Louise Nilsson	Team Manager Product Development Innovation	01-03-2017
	Coop	Jonathan Tullberg	Head of Private Label	21-03-2017
	Axfood	Mikaela Reijbrandt* & Theodore Lindberg**	Director, Price & Market analysis / Category Business Developer*, Procurement Analyst**	03-03-2017
Research /Academia	Sveriges Lantbruksuniversitet, SLU	Åsa Berggren	Professor, Department of Ecology	16-03-2017
	Örebro Universitet, Grythyttan	Ola Albrektsson	Student & Chef	10-03-2017
	Research Institutes of Sweden,RISE	Johan Berg	Researcher, Built Environment / Energy and Circular Economy	03-05-2017
Media	"Bug Burger"	Anders Engström	Blogger & Insect eating advocate	10-03-2017
	"Anki Sundin"	Anki Sundin	Nutritionist (M.Sc. Nutrition), SSE MBA	17-02-2017

Table 1. List of Interviewees.

3.3.3 Secondary sources

Data from secondary sources such as news articles, blogs, social media, webpages, annual reports, reports from institutions and research reports has been used in this study to validate information from interviewees or act as an additional source to the study.

3.3.4 Interview Design

For the collection of the verbal data, semi-structured interviews were used. This sort of interview design guides the interviews with help from a prepared set of open-ended questions (Flick, 2014). Hence, an interview guide was used to direct the conversation into covering different themes, yet the method gave us the flexibility to ask follow-up questions and allow the interviewee to elaborate further if interesting topics were brought up (Flick, 2014). This method fits very well with our abductive research approach as it allows us to investigate topics previously unknown to us throughout the interviews (Flick, 2014). *For interview guide, see Appendix 9.2.*

As our samples were collected to represent different actors on the market each individual interviewee was also categorized into its actor group (eg. Hakuna Mat belongs to the group "Entopreneurs" and ICA belongs to "Food Retailers"). Different interview guides were made for the different actor categories, as we believe their point of view based on their market position to be very relevant for the study. However, the same interview guide was used for the same actor group in order to increase comparability of the answers (Flick, 2014). Each interview guide was prepared, tested and evaluated before the interview.

During the interviews an approach similar to what Rubin and Rubin (2012) refers to as "responsive interview" was used. This means that we tried to be flexible in the questioning in order to get a deeper picture of the interviewees' point of view (ibid.). Additionally, we tried to be friendly, gentle and build trust between us and the interviewees (ibid.). For example, we assured our interviewees that we would have a neutral approach and not share sensitive information between interviewees (eg. information about business development). Additionally, every person interviewed had the choice of being anonymous, yet this was never requested. Every interview was, with the permission of the interviewees, recorded. One of the authors was conducting the interview while the other one was actively listening and taking notes in case the recording would not work. After the interview the authors took some time to reflect on the interview and wrote down some summarizing comments as a complement to the interview.

After the interview sessions, the interviews were transcribed within 48 hours. The transcription used as data for this thesis has been shared and approved by the interviewees. These were sent out in the language the interview was conducted in (15 Swedish, 1 English). Further on, citations used have been shared and approved by the interviewees, both in the Swedish version and with the English translation.

3.3.5 Data processing

The transcribed interviews were analyzed during the processes of interviewing as we constantly looked for insights and common themes as our data was expanded. This is somewhat similar to what is referred to as "open coding" used within grounded theory coding (Flick, 2014). When all our interviews were done, our analysis and coding became more structured, more similar to what is described as "thematic analysis" (Braun & Clarke, cited in Flick, 2014). In this phase, we grouped the data per actor in order to find common themes for actor group, similar to an "inductive thematic analysis" (ibid.) (see Appendix 9.3 for a list of identified themes). Lastly, we coded and analyzed the whole data set in relation to our main framework, Kjellberg & Helgesson model (2007), a process very similar to "theoretical thematic analysis" (Braun & Clarke, cited in Flick, 2014). More specifically, we identified activities within the three practice categories from our framework. This analysis has naturally gotten the largest emphasis in this thesis, since we have chosen to adopt a market-as-practice perspective to further understand the market formation for edible insects, as well as contribute to the development of this theoretical perspective.

3.4 Quality of study

The quality criteria for qualitative studies have been widely debated (Flick, 2014). For this study, we have chosen to use the classical criteria of "reliability" and "validity", adapted for qualitative research, to assess the quality of our thesis. Lastly, the criteria "objectivity" will be discussed.

3.4.1 Reliability

Internal reliability refers to "whether or not, when there is more than one observer, members of the research team agree on what they see and hear" (LeCompte & Goetz cited in Bryman, 2014, p. 390). In order to increase the internal reliability both of us have been present at all the interviews. Additionally, ongoing discussions regarding our empirical finding have let potential contradicting interpretations rise and thereby a common view of our results has been secured (LeCompte & Goetz, 1982). Further on, all interviews have been recorded and transcribed,

which allowed us to go back and fact-check the information collected through the interviews (Le Compte & Goetz, 1982). The transcriptions have, as mentioned earlier, been shared and approved by all the interviewees. Further on, interview training is suggested by Flick (2014) as a way to increase reliability of the study. As our interview guides were prepared we also test-ran the interview guides on each other, both with the aim of improving the guide but also our interview skills. After the first interviews, we also made sure to give each other feedback on how we performed as interviewers in order to improve for the coming interviews, which is also suggested by Flick (2014).

The external reliability refers to "the degree to which the study can be replicated" (LeCompte & Goetz cited Bryman 2014, p. 390). Due to the nature of the study a replication of this exact phenomenon would be difficult as "it is impossible to "freeze" social settings and the circumstances of an initial study" (LeCompte & Goetz cited in Bryman 2014, p. 390). However, the study can indeed be replicable in terms of process and method. To increase the external reliability of this study the method has been thoroughly explained and documented in this thesis (Flick, 2009). Additionally, the project plan, contact details, transcriptions and interview guidelines have been documented.

3.4.2 Validity

Internal validity refers to "whether or not there is a good match between researcher's observations and the theoretical ideas they develop" (LeCompte & Goetz cited in Bryman, 2014, p. 390). First of all, in order to reduce the risk of misinterpretations all interviews, except for one, were held in Swedish (our native language and that of our interviewees). The one exception was held in English. Our assessment is that both the interviewees' and the researchers' level of English is at such a good level that the risk of misinterpretations due to language barriers is rather low, for the interview held in English. Additionally, in case of apparent misunderstanding during the interview we made sure ask clarifying questions in order to reduce misunderstanding hence incorrect data. To further increase the validity, the transcripts from the interviews have been sent, in the language in which the interview was conducted, to all the interviewees for validation of the information (Flick, 2009). Moreover, all citations from the interviewees used in this thesis were sent for approval, both in Swedish and with the English translation, in order to minimize the risk of nuances getting lost in translation.

Lastly, in order to strengthen both the validity (and the reliability) of the study, the method of triangulating data was used (Flick, 2009). This means that we have used secondary data sources to validate, for instance, information given by our interviewees.

External validity refers to the degree to which "findings can be generalized across social settings" (LeCompte & Goetz cited in Bryman 2014, p. 390). Given that a case study design has been chosen for this thesis a direct limitation is the generalizability of the results (Yin, 1994 cited in Flick, 2014). This method per se, lowers the external validity of this report. Nevertheless, we argue that a qualitative case study has the best possible methodological fit for our purpose. Moreover, the case study approach has been used previously in studies previous studies within the field of market-as-practice, which we suggest confirm our choice (e.g. Kjellberg & Helgesson, 2007; Kjellberg 2010; Kjellberg & Olson, 2016). Hence, we argue the study to be useful for the development of this theoretical field.

3.4.3 Objectivity

When interviewing a dense group within a community there is a risk of the researchers "going native" and become subjective. Hence, the risk of becoming biased has been identified. In order to reduce this risk, deliberate actions preventing this has been made. Firstly, through the choice of framework, we are studying *processes*. By focusing on activities we can therefore confirm if our activities under study has happened or not and there will not be subject of discussion, which could have been the case if we for instance would have studied power relations between the actors where this data would be based on opinions of actors. Secondly, this thesis focuses on the market formation for edible insects, the "pro-side" has gotten the biggest focus, as these actors are the ones identified to drive the market formation at the time of writing. Hence, we are aware of the fact that the density lies on actors supporting edible insects. In order to cover actors both pro and against edible insects, we have explicitly searched for actors that are against it, without results. Worth noting however, is that we did identify skepticism and precaution among actors, such as the Swedish Food Administration and researchers.

4. Setting the context: The emergence of edible insects in Sweden

This chapter is aimed to review the background of events that we will cover further in the subsequent chapter (5). Therefore, we will first present at timeline including events that are considered important for the market formation, ranging from 1997 up until 2018, (*see figure 5).* This section is followed by a list entopreneurs working with edible insects in Sweden.

4.1 Timeline: The rising of edible insects in Sweden

Our timeline starts in 1997, when the first version of the Novel Foods Act was released (EG 258/1997). The regulation was established with the purpose of ensuring consumer health, and implies that novel foods must be evaluated and approved before released to the market. A novel food is described as "food not consumed to a significant degree in the European Union to 15 May 1997 and which falls under one of the categories listed in the Regulation" (European Commission, 2017a).

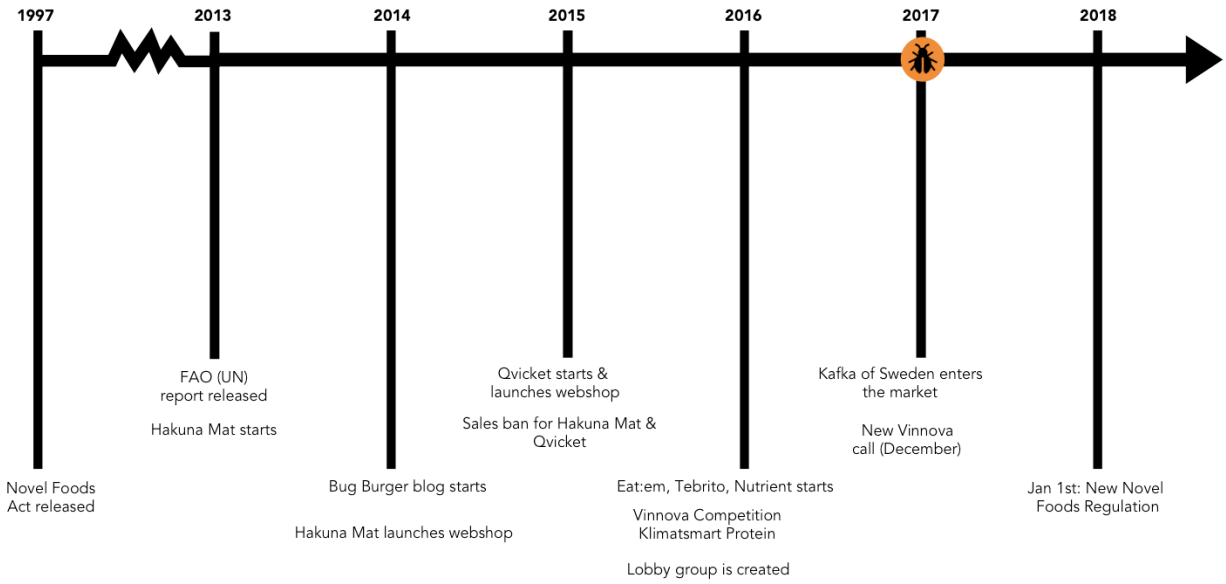

Figure 5. Timeline of events relevant for the market formation in Sweden.

In 2013, the Food and Agriculture Organization of the United Nations (FAO) released a report about the future of food, stressing the "need to find new ways of growing food" (p. ix). The report predicted edible insects to have a crucial role in feeding the world's population, promoted them as a sustainable and nutritional alternative to foremost protein. (FAO, 2013). The same year, Hakuna Mat was established. In 2014, Anders Engström came across the report and started a blog called Bug Burger, as a way to write about edible insects in Sweden. At the same time,

Hakuna Mat launched a web shop on their website where one could buy dried edible insects from Thailand. Qvicket, another Swedish startup, started right after and launched their web shop in 2015. In June the same year, the County Administration of Foods ("Miljöförvaltningen") in Gothenburg proclaimed a sales prohibition for Hakuna Mat referring to the EU regulation about Novel Foods (EG 258/1997) (Göteborgsposten, 2016). Miljöförvaltningen in Stockholm followed this example and put a sales prohibition on Qvicket in September (Stockholm Fria, 2015). The sales ban was the first clear action against selling insects in Sweden and set an example for other potential entopreneurs.

In February 2016, Sweden's Innovation Agency ("Vinnova") announced a call where companies competed in creating food products based on climate friendly protein. Since insects are a source of high levels of protein, this was an opportunity for entopreneurs to show their existence and promote their products. The competition went on for nine months, with a final tasting event in November 2016. Out of 19 contestants that got funding from Vinnova through this competition, three of the products presented had edible insects as a main ingredient, more specifically: mealworms. Hakuna Mat participated with a mince based on mealworms, Tebrito competed with a chocolate praline enriched with mealworm protein and the Research Institute of Sweden (RISE) presented their "Tenebrio sticks" based on mealworms (Vinnova, 2016a). During 2016, two additional companies had started outside of the Vinnova contest: Nutrient, with a production and research facility for producing insects (focus mealworms) and Eat:em, with a snack product of chocolate covered crisp breads enriched with cricket flour.

As a result of the gathering of future of food enthusiasts at the Vinnova competition, the blogger Anders Engström (aka Bug Burger), created a Facebook group called "Insektslobbyn" - the Insect Lobby. This created a platform where entopreneurs gathered with the common aim to share information about edible insects and support each other in the market formation.

In 2017, Hakuna Mat and Tebrito got additional funding from Vinnova in order to investigate the regulations for edible insects in Sweden (Vinnova 2017b; Vinnova, 2017c). At the same time, the startup Kafka of Sweden entered the market place with the aim to launch a pilot product, a crisp bread based on cricket flour, before summer 2017 (Kafka of Sweden, 2017). Additionally, entopreneurs are preparing for a new competition from Vinnova about the future of foods. The new competition has a budget of 20 million SEK and will be announced on December 12th 2017. In this competition, only constellations including minimum two parties are allowed to apply, where at least one of them must be an established producer of foods (Vinnova, 2017d),

stimulating the creation of new business relationships. However, neither entopreneurs nor the retailers we have been in contact with want to comment on these potential new partnerships. The 1st of January 2018 a new updated version of the Novel Food Act will come into force, which clarifies certain aspect regarding Novel Foods. This will be further described in section 5.1.

4.2 Mapping out the entopreneurs and insect blogs

In the table below, we have summarized a short description of the entopreneurs working with insects for human consumption identified on the Swedish market. Additionally, two prominent blogs promoting edible insects are presented.

ACTOR GROUP	ORGANIZATION	DESCRIPTION	FOUNDED IN
Entopreneurs (Human consumption)	Hakuna Mat	Develop a prototype of a "mince" based on mealworms and soy protein.	2013
	Eat:em	Snack product made of crisp bread enriched with cricket flour.	2016 *(Project started in 2015)*
	Nutrient	Develop production facility of mealworms, conducts research	2016
	Tebrito	Developed a process of extracting protein from mealworms.	2016 *(Project started in 2013)*
	Kafka of Sweden	Will launch Swedish crisp bread enriched with cricket flour	2017 (*Project started in 2016)*
	Qvicket	Online retailer of Cricket flour (based in Belgium)	2015
Media	"Bug Burger"	Blog covering events on the Swedish "insect market"	2014
	"Insects for starters"	Hakuna Mat's blog where they share recipes of dishes with insects as ingredients	2013

5. Analyzing the market formation for edible insects in Sweden

In this chapter, we will present and elaborate on our main findings. First, we would like to refer back to our main research question: *How is the market for edible insects in Sweden being formed?* This question will be answered by identifying what practices that are parts of forming this market, but also by linking the practices and analyze how they are contributing to the market formation.

We will start with explaining the main aspects of the novel foods regulation, which constitutes the basis of the Swedish sales prohibition (5.1). We argue that these practices are influenced by the idea that insects are *not food*. This is followed by an introduction of activities conducted by actors in favor of a market formation for edible insects (5.2). Hence, we argue that these practices are influences by the idea that insects *are food*. These activities are divided into the three practice categories following Kjellberg & Helgesson's model (2007) as described in the theory section 2.2. In the final section, we will merge the insights from each practice of section 5.1 and 5.2 and analyze them together in order to get a more holistic view of the market formation.

5.1. Activities prohibiting the sales of edible insects in Sweden

This section covers the regulation of edible insects in Sweden. Since this regulation is determined on EU level, we will include both the effects the regulation has on Sweden, but also touch upon effects on other member states. By connecting the novel foods regulation to the framework used for this study (Kjellberg & Helgesson, 2007), we identify that *normalizing practices* constitutes activities associated to the sales prohibition in the market formation of edible insects in Sweden.

5.1.1 Introducing the Novel Foods regulation

In order to understand the regulation of edible insects in Sweden, one needs to further recognize the Novel Foods regulation – the EU regulation that the Swedish Food Administration, Livsmedelsverket, refers to in this matter. A first version of the regulation was established in 1997 (EG 258/1997), which was revised and adopted in November 2015 (EU 2015/2283) (European Commission, 2017b). In the Novel Food Act from 1997 (EG 258/1997) it is not explicitly stated that insect should be classified as a Novel Food, resulting in intense debate between member states in the EU Commission of how to categories insects. The updated act from 2015 includes a clarification about insect, stating that the new "categories should cover whole insects and their parts" (European Commission, 2015) which leaves no room for interpretation of whether insects should be classified as novel foods or not. However, the updated version will come to effect first on January 1st 2018, which has resulted in an ambiguous

transition period where the current regulation is interpreted differently in different member states. Currently, most European countries have chosen to prohibit the sales of insect products, either fully or partially. The exceptions are the UK, the Netherlands and Belgium, which tolerate the sales and marketing of certain insect species (Bugsfeed, 2016). In Belgium for example, the Federal Agency for the Safety of the Food Chain (FASFC) will continue to tolerate ten different insect species until 1 January 2018, and recommends "operators to prepare the files for an application for approval for insects as soon as possible" (Federal Agency for the Safety of the Food Chain, 2016).

5.1.1.1 How the authorization process for Novel Food works today

In order for a novel food to be placed on the market it needs to be approved by the European Food Safety Authority (EFSA) and/or the competent authorities within the European countries (European Commission, 2017b). More specifically, this means that an application first needs to be sent to the competent authority within the country (i.e. Livsmedelsverket in Sweden), which in turn sends the application to the European Food Safety Authority (EFSA). Additionally, all member states have the right to assess and comment on the application. In the authorization process, scientific information and a safety assessment report of the ingredient needs to be submitted, proving that the ingredient "do not present a risk to public health, are not nutritionally disadvantageous" (European Commission, 2017b). Due to this, an application process is both time-consuming and resource intensive.

5.1.1.2 How it will work from January 1st 2018

One aim with the new regulation is to streamline the approval process of novel foods (Livsmedelsverket, 2015). One change in order to make the process more efficient is that the application process will now be centralized. This means that an application will be sent directly to European Food Safety Authority (EFSA) for risk assessment. Another change is that a new sort of application will be launched; where applicants can apply by presenting evidence of that the specific food is considered "traditional food from third countries". In the context of edible insects, this means that an insect product can get approved if applicants can present evidence that this product has been used outside of EU for at least 25 years (European Food Safety Authority, 2016). So far, no complete application to legalize edible insects has been sent in (European Parliament, 2016). Since the process will be facilitated from January 2018, many companies and organizations are now waiting for the new regulation to be applied. Once an application is submitted and approved, the specific insect species will be allowed to sell in all the EU.

5.1.1.3 How it works in Sweden

In Sweden, Livsmedelsverket have chosen not to tolerate the placement of edible insects on the food market nor tastings of edible insects. They argue that since none of the EU countries have been able to prove that certain insect species are safe for consumers nor nutritionally advantageous, it should not be placed on the food market. Risks such as allergies or toxins need to be eliminated first (Livsmedelsverket, 2017b). In the context of insects, for instance, there are concerns regarding that people who are allergic to shellfish could also be allergic to insects (ibid.) Furthermore, insects for human consumption have to be produced at a EU-approved plant (ibid.).

Livsmedelsverket is the central control authority for food in Sweden. However, the Country Food Authority is responsible to execute inspections regarding for instance food safety in each municipality. Therefore, these control units are responsible for the placement of the sales ban on individual companies selling insects. However, overall, the sales prohibition of insects is on national level due to the EU regulation, which is why it is illegal to sell edible insects in Sweden today.

5.1.2 Creating inclusion by excluding insects from the food market

Through the section above, we understand that strong forces lie behind the sales prohibition for insects in Sweden. We identify the Novel Foods regulation as a very strong normalizing practice influencing the formation of the market for edible insects negatively, by stopping translations between exchange and representational practices trough the sales ban. Connected to our framework and how ideas shape actions, we argue that the idea of insects being *non-edible* is strongly performative in the *normalizing practice* through the novel foods regulation. We further see that this normalizing practice successfully excludes insects from the food market. Elaborating further on this exclusion, we suggest that the mere fact that insects are formally classified as non-edible also acknowledges their existence as potentially "edible". Before the sales ban, exchange of goods took place, even if at a very little scale, since the market was not yet clearly regulated. One can assume that it would not be in Livsmedelsverket's interest to regulate a market that did not even exist. Drawing on the concept of "inclusive exclusion" by Mitchell (2007), arguing "what is declared to be outside the market already plays a role within it, through the declaration of exclusion and the continuous battle over its inclusion" (Mitchell 2007, p. 254).

Returning to our findings, one could therefore argue that the existence of the "edible insect market" actually becomes more prominent after the sales prohibition by the inclusive exclusion of insects from the food market. Through this exclusion, the market boundary for the food market is emphasized, a boundary that insect enthusiasts are working proactively to redraw.

5.2 Activities in favor of edible insects in Sweden

The former section covered activities associated to the sales prohibition of edible insects in Sweden. In this section, we will shift the perspective by instead focus on activities aiming at incorporating insects into the food market in Sweden. Hence, actors considering insects as *edible*. Insect products for human consumption are, even if common in other parts of the world, not considered a part of the Swedish food culture (Jansson & Berggren, 2015). Our findings show how actors are proactively working towards normalizing insects for human consumption today. These activities will be described in three sections, through the practices of exchange (5.2.1), normalization (5.2.2) and representation (5.2.3), derived from the conceptual model by Kjellberg and Helgesson (2007). An illustration summarizing the identified ongoing activities within each practice is presented in figure 6 below.

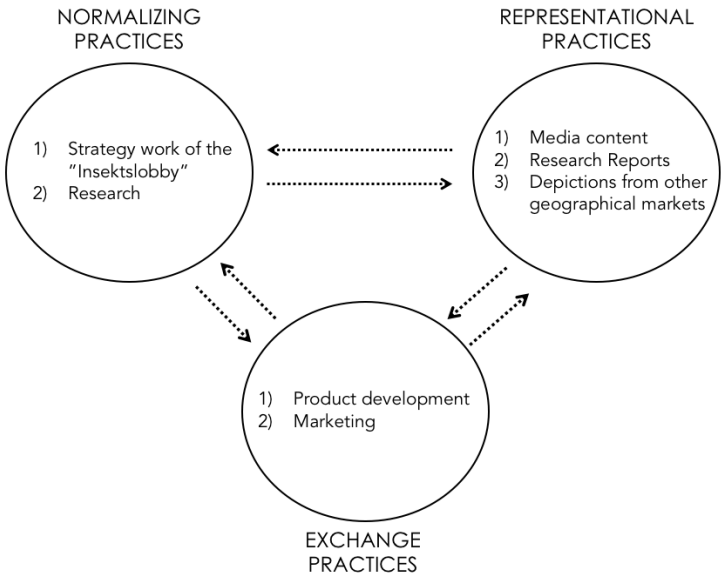

Figure 6. A summary of the identified activities within the three practices categories in Kjellberg and Helgesson's heuristic model of market-as-practice (2007). Own illustration.

5.2.1 Exchange practices: product development & branding

According to Kjellberg and Helgesson (2007), exchange practices concern ”concrete activities related to the consummation of individual economic exchanges” (Kjellberg & Helgesson 2007, p. 142). Companies with intentions to sell and/or produce insect products for the Swedish market are establishing with strong business ideas and ambitious plans to become prominent market players in the future. We therefore argue that ongoing practices are taking place with the aim to contribute to future economic exchange. This section covers the identified key exchange practices, where the emphases lie on developing and categorizing products.

5.2.1.1 Characteristics of insects: Taste & Texture

Taste, smell and texture are recurrently mentioned as important factors under the product development process. Currently, none of the entopreneurs develop products consisting of whole insects, but instead have chosen to focus on processed insects in different ways. Examples are oil, and flour or protein powder where the flour is either planned to be sold as it is or used in a bar, hard bread, smoothie or mince. Combining this with the fact that the taste and smell often is covered up by other tastes (Eat:em) or made to be taste-free (Tebrito), it all seem to have to do with lowering the entry barrier for future consumers. As Martin Strid, CEO of Eat:em explains:

> ”The product has to feel fresh. Freshness is key. That’s why we chose to start with hard bread, because it has a crispy texture.”[5]

Ola Albrektsson, chef and student at Örebro University, conducts research on insects with the aim to develop a “sensory profiling” of edible insects. Profiling is, according to Albrektsson, a word describing a sensory experience. In Albrektsson’s study, a test panel tastes the insect samples, including different species and cooking procedures followed by describing the taste, feel, texture and scent. Starting off with hundreds of descriptive words after the first test panel session, he has boiled them down to a handful. The purpose is to facilitate the comparison between different insect species, through standardized measures of characteristics. Examples are "nutty", "grains", and "umami”. Albrektsson hopes that the profiling will help future consumers choose the right product in the grocery store, and also lower the acceptance threshold if consumers can visualize how it will taste by using familiar definitions.

[5] Swedish translation: ”Produkten måste kännas fräsch för att få människor att prova. Därför valde vi att gå åt det hållet och göra ett krispigt knäckebröd.”

The long-term goal is thus to increase the consumer acceptance for edible insects in Sweden. As he describes it himself:

> "Insects are great in many perspectives, such as from environmental and economic aspects. Yet, if the goal is to reach a significant and sustainable level of consumption, it has to be delicious too. And in order to make it taste good, we need to know how it tastes and how to combine insects with other foods in a nice dish."[6]

5.2.1.2 Branding and Product Categorization

The concepts of "sustainability" and "environmental friendly" are prominent when entopreneurs describe their products' selling points. All entopreneurs agree that their business idea came from the ambition to offer a sustainable alternative to protein, sharing the idea that eating insects is more sustainable than eating meats such as beef, pork and chicken. Several practices illustrate the ambition to use a holistic view on sustainability: production of insects using food waste and energy from nearby locations, looking for partnerships within Europe to find relatively local supply instead of ordering insects from Asia, developing insect farms, and planning a "sustainable and smart" packaging design.

The superior nutritional value of insects is also an argument used by entopreneurs. They argue that the high amount of protein is an important selling point. Eat:em describes their product on the webpage as containing "world class nutritional value" (Martin Strid, Eat:em). The benefit of developing products with focus on nutritional value, with high protein, seems to have two different consequences in the process of positioning the product on the market. Firstly, entopreneurs work actively with developing products and brands that will attract health conscious consumers, such as fitness enthusiasts. Secondly, Hakuna Mat takes it one step further, wanting "to create a product for the big mass, as an alternative to meat and other minced products"[7]. Another finding is connected to the categorization of products. It's expressed that entopreneurs choose to develop their product to look like products already existing in todays' grocery stores, in order to lower the threshold for consumer acceptance. For example, Cricket bars compete with other bars, minced insects should be competing with other mince, flour containing insect protein should compete with other flour or protein powders. Hence, all

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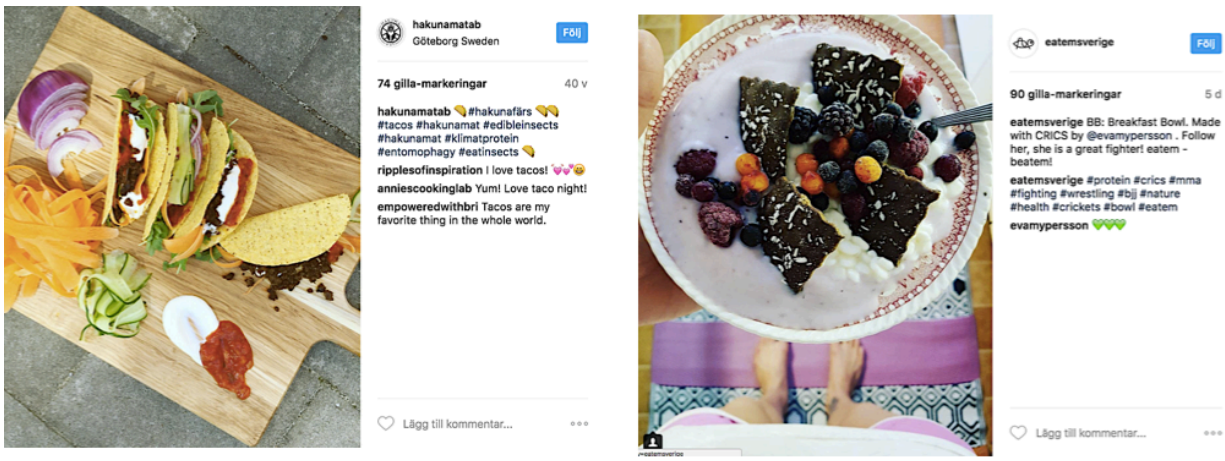
[6] Swedish translation: "Insekter är fantastiska ur flera perspektiv, till exempel ur miljömässiga eller ekonomiska aspekter. Men om målet är att få en signifikant och hållbar nivå av konsumtionen, så måste det smaka gott också. Och för att få det att smaka gott, måste vi veta hur det smakar och hur vi ska kombinera insekter med andra sorters ingredienser i en härlig rätt."

[7] Swedish translation: "Vi vill skapa en produkt för den stora massan, som ett alternativ till andra kött men också andra sorters färser."

entopreneurs consider their insect products to be part of other food categories. This is clearly shown in various social media channels (Facebook, Twitter and Instagram). Here, entopreneurs are promoting how and when to eat their products, associating them with specific consumptions situations which is a part of the current food norm in Sweden. Two examples are Crics, as a protein snack in conjunction with a luxurious breakfast, and Hakuna Färs showing inspiration in how to make the dish "tacos", one of the most common weekend meal in Sweden (Expressen, 2011), but made with their product. *See picture 1.*



Picture 1. Instagram posts from Eat:em and Hakuna Mat.
Source: EatemSverige (2017 and HakunaMatAB (2016).

Another way of differentiate a product is through price segmentation. Hakuna Mat is comparing their product price-wise with minced chicken and vegetable alternatives such as soya mince. Eat:em work with positioning their CRICS product as a premium product, comparing it with the price point of the Swedish brand René Voltaire. Additionally, the price-point between different geographical markets is compared concerning the purchase of raw material (i.e. the insect goods). For instance, the price difference of mealworms and crickets between Asian and European actors was brought up by several entopreneurs, where the former is cheaper today. This, together with the greater extent of assortment in Asia, has resulted in the purchase of Asian insects as a preliminary solution before a more substantial production is established in European countries.

An event facilitating practices contributing to future economic exchange, was the Vinnova Competition "Klimatsmart Protein" in 2016. In this competition, *taste* was one of the main focus for the contest (Vinnova, 2016a). Since public tastings were not allowed in Sweden for edible insects, the events and gatherings created a platform for comparison, inspiration and information sharing.

5.2.1.3 How are the exchange practices forming the market?

In our study, we see that the actors involved in the market formation process work actively with associating certain qualities to their new insect based products, mostly to that of already established products on the food market. Our findings show how entrepreneurs deliberately choose to develop their products in a way that facilitates the comparison of insect based food to "regular" food by consumers. This indicates that they aim to easily blend in in the already existing food market. Another alternative could have been to take a strong stand in the other direction, and positioning themselves as something very different to food as we know it today.

Our findings show that new insects products are shaping how the product development process occurs in terms of for instance shape, texture, taste and pricing. This approach therefore also postulates that insects in themselves should be considered as an important actor, suggesting that they are a "carrier of practice" by shaping the exchange practices (Reckwitz, 2002). Connected to the theory of qualification of products (Callon, 2002) entopreneurs are actively working towards singularizing their products from other insect product categories. They aim to distinguish themselves from competitors within the insect market, choosing different target groups or different product positioning. The products are developed and tested with the aim to attach consumers "by detaching them from the network built by rivals in the mainspring of competition" (ibid., p.205). For example, the Crics snacks are aimed at forcing consumers "requalify the different products offered to them" (ibid., p.205) by using the promotion of cricket flour as a mean to detach consumers from other snack products, and become attached to Crics instead. Considering this from a broader perspective, entopreneurs aim to make consumers requalify their consumption habits of proteins; hence, make consumers and other economic actors (such as food production companies) view insects as a valid alternative to other protein sources.

Referring back to our theoretical framework we have identified exchange practices in terms of product development, product testing, advertising and branding from the entopreneurs. In terms of translations associated with this practice category we have identified that most of the activities are translated within the practice category itself (e.g. product development). However, minor translations have been observed in terms of *interest* in the products created among potential consumers. One example is the likes on Instagram posts by Eat:em and Hakuna Mat showing their products. Nevertheless, we argue that we have not identified translations to a large extent between the different categories of practices.

5.2.2 Normalizing practices

According to Kjellberg and Helgesson (2007), normalizing practices are "devised to account for activities that contribute to establish guidelines for how a market should be (re)shaped or work according to some (group of) actor(s)" (p. 143). We have identified two main types of practices with the aim of creating normative objectives for the upcoming market for edible insects. The first category regards the work by the entopreneurs in creating and developing a lobby organization in Sweden. The second category concerns the ongoing research projects about insects for human consumption in Sweden. These projects aim to create guidelines and standards of which insects that should be produced and sold in Sweden and investigate how the production process should be designed, for instance.

5.2.2.1 Lobby groups in the process of creating business standards for edible insects

"New lobby associations are emerging"[8]

- Anders Engström, founder of Insektslobbyn and the blog Bug Burger

One type of practices are the ones connected to the lobbying activities of entopreneurs and "insect enthusiasts", with the aim to challenge the current norm of insects being viewed as non-edible. Business organizations advocating for consumption of insects by both humans and animals have emerged during the last few years. Three examples are the International Platform of Insects for Food and Feed (EU), the Woven Network (UK) and The Belgium Insect Industry Federation (Belgium).

As mentioned previously the Swedish lobby group, Insektslobbyn, was founded in October 2016. According to the founder Anders Engström (aka Bug Burger), the initiative was a result of entopreneurs meeting each other at a seminar about the Novel Foods regulations in connection to the competition "Klimatsmart protein" organized by Vinnova. Since the start, the number of members has increased from 9 to 19 (Anders Engström, Bug Burger), including people "from both the business and the research world". Insektslobbyn started as an "informal network" for information sharing and discussions but is becoming more formal, with the aim of establishing a "proper" organization (Anders Engström, Bug Burger). One example of the transition into a more formal group is a Google Forms document, through which an inventory of skills and interest of the members were conducted. This was a first step in creating an overview of the

[8] Swedish translation: "Det börjar växa fram nya intresseorganisationer."

different competences, but also product and service offers, that the members had. Another example is the first common meeting of the group, where all members met for the first time. The meeting was an initiative by Anders Engström and the CEO of Nutrient, Adam Engström, and took place in Stockholm, on April 28th 2017. The agenda was set to discuss "common action plan" for the future "while awaiting the approval of edible insects in Sweden" (Adam Engström, Nutrient). On the meeting, entopreneurs discussed the latest regulatory development, and guidelines in how to approach the upcoming months before the new regulation in 2018. The most prominent aim of the gathering was for entopreneurs to get to know each other in order to stimulate future collaboration.

Connected to the regulatory matters in Sweden is the work conducted by the startups Hakuna Mat and Tebrito, both members of the Swedish lobby group. As a result of the competition "Klimatsmart Protein" initiated by Vinnova in 2016, they both won a contribution of respectively 450 000 SEK and 360 804 SEK (Vinnova, 2016a). Moreover, they got additional funding in early 2017 (300 000 SEK to Hakuna Mat and 400 000 SEK to Tebrito) (ibid.). It was decided that the additional grant would go to research about the regulations of the Novel Foods in order to form a strategy for how to get their insect-based products approved by EU. In March 2017, Hakuna Mat went to Brussels to meet the European lobby group "International Platform of Insects for Food and Feed" (IPIFF). Hakuna Mat is the only Swedish insect company who is a member of IPIFF (ippif.org, 2017). Before the meeting, they had collected questions from the other Swedish entopreneurs (Anders Engström, Bug Burger), to bring with them to IPIFF.

5.2.2.2 Research projects working to legitimate edible insects

Another identified category of normalizing practices is activities within ongoing Swedish research projects about insects as food. These projects include a vast amount of different activities such as conducting lab experiments, extensive fieldwork, literature reviews, and prototyping. The results are mostly portrayed through research articles and reports.

The aim of the projects is to find common standards of production, evaluate how to meet the ethical criterion in the value chain, explore the taste and texture of different insect species and much more. Since the insect market in Sweden (and Europe) is in a very early stage, there is much work put into elaborating on the production processes and breed of insects. As a result of the relatively novel research field, many questions are yet to be answered.

As Åsa Berggren, professor in ecology at Swedish University of Agricultural Sciences (SLU), expresses:

"There are five times more insects than other animal species in the world, and what we know about them is only a drop in the ocean."[9]

The Swedish University of Agricultural Sciences (SLU), started a project in spring 2017, called "Eating crickets – an appetizing solution for today's global problems" (Sveriges Lantbruksuniversitet, 2017a). The project, which is financed by the Swedish research council Formas, will run over five years and has the purpose of "developing a new Swedish, appetizing, protein and mineral rich food based on Swedish cricket" (Forkningsrådet Formas, 2017). Research activities include the investigation of both the risks and the potential benefits of rearing crickets. To assess the former, an investigation down to every microorganism within the crickets and how these might develop into toxins when breeding crickets will be conducted. In order to cover a holistic view of the field, the project further has a reference group, where other researchers are included together with the chef Paul Svensson, a former pig farmer interested in breeding insects and the Swedish company Qvicket (Forskningsrådet Formas, 2017).

As a part of the Vinnova call "Challenge-Driven Innovation"[10], 2 out of 36 projects include research about edible insects. Connected to research of crickets for human consumption, the first project is called "Eating crickets – You're gonna love the way it tickles"[11]. It is coordinated by Örebro University and the aim is to refine/process avoidable food waste to consumer products, but also to produce "insects rich of protein" (Vinnova, 2017e). The project is a collaboration between Örebro University, the grocery chain ICA, the architecture firm Belatchew, and the municipality of Örebro (Örebro University, 2016). The second project focuses on investigating the opportunities mealworms as food can offer and is coordinated by the Research Institute of Sweden (RISE). More specifically it will cover three identified barriers for edible insects and feed; production and processing costs, regulatory concerns and consumer attitudes (Vinnova, 2016b).

[9] Swedish translation: "Det finns fem gånger så många insekter än alla andra arter djur, och det vi vet är bara en droppe i havet."

[10] Swedish translation: Utmaningsdriven innovation

[11] Swedish translation: Käka syrsor – Kittlar dödsskönt i kistan

5.2.2.3 How are the normalizing practices forming the market?

Together, the research projects work towards finding a solution on how insects should be managed in terms of production, breeding and processing, including ethical and sustainability aspects. We suggest that the practice of conducting research is a normalizing practice, since it includes establishing guidelines and standards of how to breed, process and consume insects. The research in itself could stimulate normative objectives both for entopreneurs and food businesses curious in entering the industry, but also in terms of lowering the thresholds of consumers, by legitimating edible insects.

In regards to the lobby organization in Sweden, Insektslobbyn, the normalizing practices are illustrated through their meeting and their information sharing. Additionally, we argue that the work concerning a common action plan in how to best manage their businesses in the context of the current regulation, is a further example of translations within the practice category. By establishing a lobby group, this might lead to a collaboration of a future novel foods application, and start negotiations with the legal authorities regulating edible insects in Sweden.

Referring back to our theoretical framework, we argue that most translations has so far taken place within the practice category itself. The work of the "Insekstlobby" is at such an early stage and we argue that no real effect of their work can be observed. We therefore argue that the translations taking place are still within the practice category (eg. discussions, meetings and informal information sharing). In regards to the research projects we have mostly described research projects that are ongoing, hence no results have been translated into reports. However, we do see that previous studies have been translated into representational practices. This will be elaborated more on in the next section.

5.2.3 Representations of insects as edible influence the Swedish market

We have now gone through the exchange and normalizing practices. The third practice is representational practices, which will be covered in this section. Referring to Kjellberg & Helgesson (2007), representational practices "include activities that contribute to depict markets and/or how they work" (p. 142). As described in the introduction (section 1.1) an increased awareness about the negative effects of our high animal protein consumption has led to a protein shift in Sweden (Macklean, 2016). Connected to the protein shift, there are activities that work towards creating representations of insects as an alternative protein source. The subsequent chapters will therefore address our identified ongoing activities that are creating representations of insects as edible.

These activities have been divided into three categories: 1) representations through media[12], 2) representations through reports and 3) representations through comparison with/inspiration from other geographical markets.

5.2.3.1 Representations through media

"Media is our biggest lobbyists right now. We get a lot of positive attention, always with a humoristic touch in the end" [13]

- Adam Engström, Nutrient

"It's quite easy for an insect company to get publicity. Each one of us [working with insects] has been invited at least once, some ten and twenty times, to get interviewed on TV or on the radio" [14]

- Anders Engström, Bug Burger

"We get a lot of attention wherever we go since we are one of the few working with insects. It's written in newspapers, and we have been interviewed on TV for instance. We have been spoiled with publicity and have not taken any own initiatives to get this attention" [15]

- Emma Gellerbrant, Hakuna Mat

As indicated by the citations above, the entopreneurs have gotten a lot of media attention. Media seems to be a good supporter of the entopreneurs' view of insects as edible. This has naturally been very welcomed by the entopreneurs in question because of the free publicity, which they hope spreads the word and creates awareness of edible insects in Sweden. Articles are usually written with a funny twist and with headlines alluding on for instance "The Jungle Book", or playing with words about eating insects (Adam Engström, Nutrient). Additionally, media depict insects as a new, healthy and sustainable source of protein. The nutritionist and columnist Anki Sundin, for instance, writes positively about insects as potential source of protein (Anki Sundin,

[12] In this thesis, we refer to "media" both as traditional media such as newspapers, TV and radio, but also to social media posts and blogs.
[13] Swedish translation: "Media är vår största lobbyist just nu. Vi får väldigt mycket positiv uppmärksamhet, alltid med en humoristisk släng i slutet."
[14] Swedish translation: "Det är ganska lätt för insektsföretagen att få publicitet. Alla vi som jobbar med insekter har blivit inbjudna minst en, en del 10 och 20 gånger, för att bli intervjuade i TV och Radio."
[15] Swedish translation: "Vi får väldigt mycket uppmärksamhet vart vi än åker eftersom vi är en av de få som jobbar med insekter. Det skrivs i tidningar och vi har blivit intervjuade i TV till exempel. Vi har varit bortskämda med publicitet och har inte tagit egna initiativ för att få uppmärksamheten."

2015), the Swedish health and fitness magazine iForm writes about crickets as a different, yet good source of protein (iForm, 2016) and the lifestyle magazine "Elle" presents, in a blog post insects as a new food trend (Elle, 2016).

Another example is the call from Vinnova, "Klimatsmart Protein", where insects were positioned as a future potential source of protein. Media coverage was an important part of this particular call, as this would give attention to both the matter of innovation within the food industry but also for the individual competing products. As Lena Eckerdal Rimsten, Program Manager at Vinnova, recalls:

> "In this particular case we wanted to get media attention /.../ It was absolutely a strategy to get publicity".[16]

One of the most prominent creators of "pro-insect" media content in Sweden is the insect enthusiast Anders Engström. Through his blog "Bug Burger", he reaches around 1500-2000 unique visitors and around 4000 page views per month (Anders Engström, Burg Burger). The blog aims at inform and update people of what is happening on the Swedish "scene" of edible insects including information about the regulation, interviews with insect enterprises, list of products and more. As a result, readers who are interested in edible insects (and insects as feed) contact Engström. For example, people who want to start a business within the field, students doing school projects and companies inviting him to give lectures about edible insects.

5.2.3.2 Representations through reports

Actors with expertise knowledge in the food industry, institutions and companies have labeled insects as a potential protein source for the future. The practice of conducting research has been stressed previously (see section 5.2.2). Here we will further describe how some of these findings have been communicated to the world in terms of representations of the edible insect market.

In regards to Swedish research, projects positioning edible insects further create representations of insects being edible through their findings. Such projects are for instance the two project concerning crickets for human consumption by SLU and Örebro University, as mentioned in section 5.2.2.2. The project by Örebro University was mentioned in a column of "Buffé", the magazine of ICA loyalty club with over 2.3 million readers (Buffé, 2017; ICA, 2014). Since the

[16] Swedish translation: "I just det här fallet ville vi få uppmärksamhet från media /…/ Det var absolut en strategi att få publicitet."

research society is international most papers are written in English, increasing the potential of reaching a global readership (Åsa Berggren, SLU). Moreover, the research team of SLU has started a blog, where information and updates on the findings will be posted along the way (Sveriges Lantbruksuniversitet, 2017b). To summarize, these findings show that research projects that have not been finished yet, still provide representations since they acknowledge insects as a potential future protein source for human consumption.

Connected to research, another representation of insects as the future of food is produced by actual reports that are spread to the public. As previously stated, a report from the Food and Agriculture Organization of the United Nations, has been mentioned as a catalyzer for Swedish entopreneurs to start their business. The report, named "Edible insects - Future prospects for food and feed security", is commonly referred to on platforms discussing the future of food. Through this report, information about edible insects has reached outside the "edible insect community", which suggest have reached new masses (BBC 2013; Forbes, 2013; New York Times, 2014). The report has also been written about in Swedish newspapers (Dagens Nyheter, 2013; Sydsvenskan, 2013; SVT, 2013).

In regards to Swedish research, Åsa Berggren and Anna Jansson from SLU released an extensive report from a finished project called "Insects – something for the future?" (2015), discussing what research has shown about insects as human consumption so far, and also highlighting the need for future research. As a result, a lot of people have shown interest in the field and have contacted the authors asking curious questions about the research, which according to Åsa Berggren is surprising. She emphasizes that the field of edible insects seem to be of prominent interest among people in Sweden, compared to other fields within ecology that she is researching (Åsa Berggren, SLU).

"I get calls almost every week from people wanting to grow insects for food at home, or someone who has a restaurant and would like to get my input regarding edible insects. So people are very "on to it" for various reasons but they think that it might be a good idea and want to know more" [17]

- Åsa Berggren, SLU

[17] Swedish translation: "Jag får samtal nästan varje vecka från personer som vill börja odla insekter hemma, eller någon som har en restaurang och vill ha lite inspel ang. insekter som mat. Så folk är väldigt "på" av alla möjliga anledningar men de tänker att de kan vara en bra idé och vill veta mer."

5.2.3.3 Representations from other geographical markets

" In Denmark, Belgium, Netherlands and UK, insect businesses are up and running. In Switzerland insects will be approved by the 1st of May. We'll fall behind here if no legislative change takes place soon." [18]

- Anders Engström, Bug Burger

"In many cases it's enough to look at London, because they are about two years ahead of us. If we want to be really sure we should look at LA too. It's especially in LA where "it happens" right now, if we do the same as them, we will succeed." [19]

- Louise Nilsson, ICA

Depictions from other geographical markets reach the Swedish market. First of all, the fact that insects are being sold in other countries (eg. The US, Belgium, Netherlands, UK and Thailand) creates representations of insects being edible on the Swedish market. Secondly, the access online media channels, media from other countries is suggested to create representations of edible insects, also for the Swedish market. Some examples are the Daily Mail, calling insect-eating "the latest culinary trend to hit the UK" (Daily Mail, 2015), and BBC, including insects as one of their "10 food trends for 2017" (BBC, 2017). Referring back to our interviews, examples from countries outside of Sweden perceiving edible insects seem to fuel entopreneurs willingness to establish businesses in Sweden. Furthermore, there are several examples of successful and big blogs within food, sustainability and health portraying edible insects, both in separate blog posts (Future of Food 2050, 2016; Wellness Mama, 2017; My Fitness Pal, 2017) but also blogs on the topic, made by insect enthusiasts comparable to Bug Burger in Sweden such as: Bugsfeed.com (Denmark), Tastebugs.net (Australia), and Entomove Project (France).

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[18] Swedish translation: "I Danmark, Belgien, Nederländerna och Storbritannien är insektskommersen i full gång. I Schweiz kommer insekter bli tillåtna från första maj. Vi kommer att halka efter om ingen ändring kring regleringen sker snart."

[19] Swedish translation: "I många fall räcker det att titta på London, för de är ungefär två år framför oss. Om vi verkligen vill vara säkra ska vi titta på LA också. Det är framförallt i LA som det händer just nu. Gör vi likadant som dem, då kommer vi 'vara hemma.'"

5.2.3.4 How are the representational practices forming the market?

Overall, we conclude that several practices are active and ongoing within the category of representations on a small scale, creating representations of insects as edible. However, we also see that some representations seem to have had effect on the market formation for edible insects in Sweden through for example blogs and newspapers. More specifically, we have identified two effects of the representational practices conducted, contributing to the market formation for edible insects. (Noticeably, there might be others that will affect the creation of the insect market in the future).

Firstly, representations generated about sales of edible insects on other markets seem to influence the entopreneurs. Our findings show that Swedish entopreneurs reach out for inspiration from other geographical markets as a way to generate input to their businesses. These depictions support their view about insects as edible, hence giving them real-life examples of economic exchanges of insect products. Moreover, the UN report (FAO, 2013) has been reported as a catalyzer for many of the entopreneurs in the sense that it partly got the entopreneurs to start a business based on the idea of insects as edible. Connecting to the model, these practices have worked as descriptions of the product "insect" as food, stimulating an increased interest in edible insects. We therefore argue that the representations of insects as edible, seems to have influenced the insect-market by creating supply of products through the entopreneurs.

The second result is that representations do seem to have, even if on a small scale, created new enthusiasts of insects, and thus also potential future customers. Two examples support this reasoning: Firstly, the fact that people reach out to Bug Burger for help and input, or inviting him as a lecturer, shows that his representational activities in writing blog posts have affected people. Connecting to the framework, we argue that Bug Burger's representational practices has been translated, thus becoming performative. Moreover, people are also contacting Anders asking for recommendation of where to buy, but also how to breed insects. Secondly, Åsa Berggren claimed that people are contacting here as well as a result of the research she has make, and the resulting media attention from it. We therefore argue that these representations have been performative and indicate interest and curiosity from people.

To conclude, we argue that the representations of insects as edible have been somewhat translated into normalizing practices. We see examples of where representations of edible insects have been performative and might have contributed to change the norm of insects being non-edible, as it creates interest in the products. We argue then that these representations seem to, on a very small scale, contribute to create producers and potential consumers on the upcoming market.

5.2.4 Putting all practices together into the model

In the previous chapters, we have identified several activities proceeding in favor of a market formation for edible insects in Sweden. These practices are working towards challenging the norm of insects being non-edible, which postulate a potential effect on the market formation. However, due to the novel (even to some considered as non-existing) market, there are relatively few translations between the different practices, which we argue is a result of the sales prohibition in Sweden. This will be elaborated on further in the next section.

5.3 Concluding analysis: How are the practices forming the market for edible insects in Sweden?

In the previous chapters, we have identified *what* practices that are forming the market for edible insects in Sweden and thereby answered part a) of our research question: *What practices are forming the market for edible insects in Sweden?* Further, we have touched upon the results of *how* these identified practices are forming the market, by analyzing activities within the three different practices categories (i.e. exchange, representational and normalizing). Hence, we have started to elaborate on part b) of our research question: *How are the practices forming the market for edible insects in Sweden?*

Referring back to the previous chapters 5.1 and 5.2, we have described two fundamentally different ways of contributing to a market formation of edible insects in Sweden. Drawing on the concept of ideas, and how ideas contribute to shape actions, we suggest that there are two prominent ideas shaping this market: one that considers insects as edible, and one that considers insects as non-edible. In 5.1, the background of the Swedish regulation prohibiting the sales of edible insects in Sweden was introduced. These activities were identified as normalizing practices hindering the market formation. In 5.2, activities promoting the view of insects being edible were presented. These activities have been described through the classification of practices by Kjellberg and Helgesson (2007).

As stated previously, these three practices are not isolated entities - in order to be properly understood they should be analyzed jointly, which is why this chapter will further elaborate on how these practices are working together in the market formation process. We will start by analyzing how practices in favor of insects being considered edible are contributing to market forming. This reasoning is followed by incorporating the Novel Foods regulation into to the discussion, which results in a reflection on how the two contradicting ideas (of insects being edible vs. non-edible) are forming the market together, through their different performative strengths.

5.3.1 Practices legitimating the insect products

We have found a common theme in regards to activities proactively working towards creating a market for edible insects in Sweden – they are all connected to legitimation of the market for edible insect products. Legitimation is defined as "the process of rendering a particular solution or practice congruent with current norms" (Suchman, cited in Kjellberg & Olson, 2016, p.3). Supporting our argumentation, previous research highlights the importance of legitimation, especially in "early stages of market formation" (ibid, p. 3). Moreover, legitimation becomes even more prominent in the market shaping for products with an uncertain function or if they are "subject to outright prohibition" (ibid, p. 3). Referring to our study, eating insects is not congruent with the current norm, insects as food are prohibited and the market formation process is at a very early stage. This further supports that the process of legitimation is a very important aspect in the market formation for edible insects in Sweden.

As explained in section 5.2.1, entopreneurs are developing their products to fit the food market. Connected to Callon et al.'s article about the economy of qualities (2002), entopreneurs and researchers are qualifying their goods in different ways in order to attract consumers. Examples are through packaging, marketing and taste. Interestingly, our results show how entopreneurs are comparing themselves not only to similar insect products in other geographical markets, but to brands in the food market sharing the same consumption purpose. They thereby take inspiration from characteristics of existing products on the food market such as bars, flour and minced meat. Connected to legitimation, we argue that they are trying to legitimate the product among consumers (and other actors) by creating products that fit with current consumer behaviors. According to Rosa et al. (1999), whether a new product that enters a market will make sense to producers and consumers or not, depends much upon the prevailed "market stories", which is strongly connected to the representations a product creates. We observe that market actors who

are in favor of insects being viewed as food create representations of insects being a sustainable and healthy alternative to other proteins. Through processes of advertisement, branding and communication, actors, mainly entopreneurs, are therefore trying to *align* their products to the current norm. The process of norm alignment in what a product "*is"* to consumers and producers, is referred to as "the enactment process". In other words, they are trying to *enact* the picture of insects being a healthy and sustainable protein, and thereby influence the market formation process.

Further, we argue that actors are trying to legitimate themselves as relevant players on the market through their activities. Our results show that entopreneurs, through how they communicate in their own channels, work towards being perceived as professional collaboration partners. Through establishing a lobby organization, we argue that actors selling and/or producing insects are increasing their legitimacy through signaling a professional and united voice calling for a regulatory change. Additionally, this group works towards establishing normative guidelines for the edible insect's markets, which could further legitimate the market. Moreover, we argue that researchers who communicate their findings to the public also create legitimacy, both in terms of the research they do to establish production and treatment guidelines (normalizing practices) as well as through depictions of insects as future of food (representational practices). Since more knowledge on insects is needed in order to develop new, reliable and safe insect products, we argue that research practices are contributing to the process of legitimating insect products as food in Sweden. Moreover, we would like to go as far as to label researchers, but also research reports and similar communication, as "carriers of legitimacy". As Åsa Berggren explained in her interview, researchers are driven by knowledge instead of profit, compared to businesses, whereby she thought that their findings get a lot of credibility and attention (Åsa Berggren, SLU).

Lastly, we suggest that external media coverage would in theory legitimate the consumption of edible insects. Previous research has shown that media has an essential function in legitimating new product categories (Schulz et al., 2014, p. 1). However, we suggest, that whether or not media actually do legitimate edible insects depends on the performativity of those representations, which at this stage is hard to assess. Insects are partially depicted as a new, healthy and sustainable source of protein appealing to the conscious consumers. However, edible insects are also depicted as "funny" and "strange", which might be due to the fact that edible insects are still far away from the norms about what food "is". By acknowledging the still present "disgust factor" of how insects are perceived (Jansson & Berggren, 2015), we suggest that it is unclear to what extent media's depiction of edible insects results in legitimation of the product.

To conclude, our findings show that legitimation processes constitute an essential part of the market formation in Sweden. Hence, the practices working in favor of edible insects are forming the market through their intent to legitimate the products. If edible insects get "legitimated", this would result in a wider acceptance towards the products, leading to an incorporation of the edible insect market into the Swedish food market.

5.3.2 Different ideas are shaping the practices

Our findings further show that the different performativity levels of the two opposing ideas of insects being "edible" or "non-edible" creates two different views of the market. The idea of insects being non-edible gets performative through the regulation, successfully excluding insects from the food market. Our findings have shown that the performativity of this idea is very strong, through its translation to a regulation strongly affecting the commerce of edible insect in Sweden. Further, the regulation has also led to a more prominent market boundary between the food market and the edible insect market.

Even if the regulation hinders exchanges on the edible insect market, our findings clearly show that exchange practices in terms of for example advertising and product development are much active. Additionally, representations of edible insects affect the market. Hence, these practices are suggested to not adhere to the idea of insects being non-edible. As a result, we argue that the different practices are not equally shaped by the same "idea". More specifically, we conclude that the Novel Foods regulation is extremely performative in the normalizing practice, but not equally strong in the two other practice categories on the edible insect market. Hence, we identify a strong, but partial performativity in the normalizing practice, which is an example of the concept "generic performativity" (Kjellberg & Helgesson, 2006). This is illustrated in figure 7 below. To illustrate a contrary example; if the idea of insects being non-edible would have been equally performative throughout all practices, the edible insect market would have ceased to exist. Referring back to Kjellberg and Helgesson (2006), this would be an example of "austinian performativity".

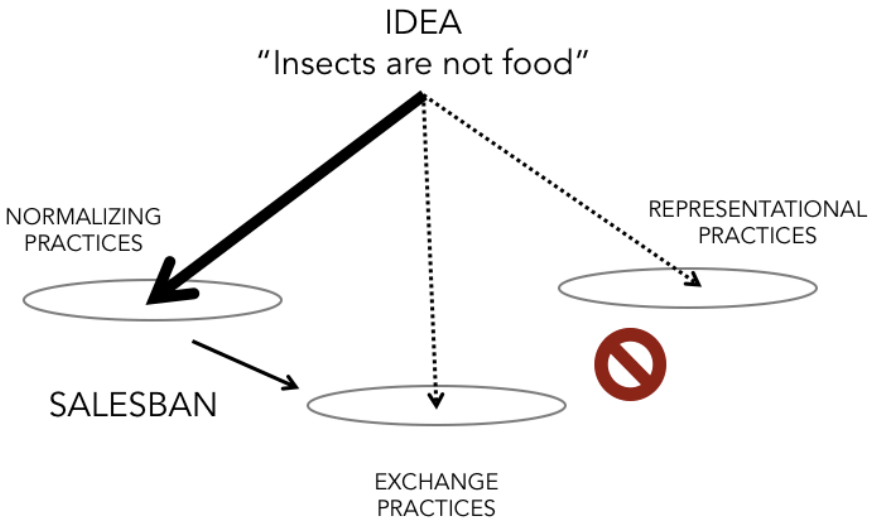

Figure 7. Illustration of strong but partial performativity. The idea that insects are not food get performative through the normalizing practice, resulting in a sales ban that consequently affect the whole market formation.

Kjellberg and Helgesson (2006) claim that the "different exchange, normalizing and representational practices may simultaneously perform different versions of the same market" (p. 849). Further, in order for a market to function properly "these versions need not be at odds with each other, but may more or less peacefully co-exist" (ibid. p. 849). In our empirical case, we argue that the different ideas of insects as edible or non-edible are performative on different levels and to different extent. The practices are further forming the market for edible insects differently, which results in multiple, for the sake of simplicity, two complete different version of the market, that we believe cannot peacefully co-exist.

5.3.3 Two contradicting views – is it really that simple?

We have now deliberately divided different ideas of what an insect "is" into two different parts: ideas perceiving insects as edible and ideas perceiving insects as non-edible. Nevertheless, we have further identified conflicting ideas of what an insect "is" *within* the group of actors sharing the idea of insects being food. For example, entopreneurs are developing different products that they want to "singularize" (Callon, 1998), hence create goods that consumers would chose over another product. Even if collaboration occurs to some extent through the lobby group, they are still potential (future) competitors. Hence, market actors who agree on the general idea of insects being food, are trying to form the market in different directions. Strongly connected to this, are the different ideas of which *type* of insects to introduce to the market, such as crickets or mealworms. Moreover, due to the novelty of the market in Sweden, but also in Europe as a

whole, standards and guidelines about how to breed and produce insects need to be determined. This knowledge is needed in order to authorize edible insects as approved food, whereby which insect to use in the products will be of critical importance.

Supported by Rosa et al. (1999), we have identified that this market under formation is characterized by instability. This explains why the different ideas of what an edible insect product is, and how the market should be framed among market actors, are not enacted. Building on the notion of different levels of performativity, the opposing ideas regarding edible insects create multiple versions of the market that are not currently aligned. As practices are shaped by different ideas, and actors are not working in the same direction, friction is created which results in a chaotic an unstable market environment.

6. Conclusion

The purpose of our thesis was to develop our understanding in how new markets are formed. With the purpose in mind, our research question was formulated as follows: *How is the market for edible insects in Sweden being formed?* In order to answer this question, we chose to divide it into two sub-questions, which will be answered separately in chronological order. We have applied a market-as-practice approach throughout our thesis, and used the heuristic model of market-as-practices by Kjellberg & Helgesson (2007) as our main theoretical tool of analysis.

6.1 What practices are forming the market for edible insects in Sweden?

In order to facilitate for the reader, we divided the practices into two parts, based on the ideas of insects being "edible" or "non-edible". In regards to practices working towards forming a market for edible insects in Sweden, hence influenced by the idea that insects are "edible", we have identified the following practices:

Exchange practices identified are 1) product development in terms of prototyping, and deciding on texture, taste and packaging and 2) marketing, in terms of advertising, strategizing on price levels, and defining the product categories.

Normalizing practices identified are: 1) The development of the Swedish lobby organization, Insekslobbyn, in terms of meetings, conducting guidelines and common strategies for the members with the aim to change or overcome the barrier of the current regulation, and 2) Research, in terms of the conducted work in defining standards in insect production and use, including guidelines and standards for production processes, breeding and animal care.

Representational practices identified are: 1) Media content depicting insects as edible, 2) Research reports depicting insects as edible and 3) Exchange practices and market insights from other geographical markets depicting insects as edible.

Practices influenced by the idea of insects being non-edible, concerns the *normalizing practices* associated with the novel foods regulation. These include 1) formation of the guidelines in how to apply for authorization of novel foods, 2) discussions in how to interpret the EU regulation, and 3) formal instructions and recommendations from the Swedish Food Administration and the decentralized entity County Administration of Food Safety to entopreneurs.

6.2 How are the practices forming the market for edible insects in Sweden?

Our findings show that the different ideas of whether insects are edible or not contribute to the market formation through their different levels of performativity within the three practice categories of exchange, normalization and representations. The idea of insects being non-edible gets performative through the normalizing practice of the Swedish Food Administration (Livsmedelsverket) and the EU Commission, which results in a stop of the commerce of edible insects in Sweden. This practice successfully excludes insects from the food market and hinders the market formation of edible insects in Sweden. Simultaneously, practices influenced by the idea of insects being edible challenges this exclusion and work towards forming a market. This is done through a process of legitimating edible insect products with the aim to change the current norm and get incorporated into Swedish food market. The opposing ideas create multiple versions of the edible insect market that are not currently aligned with each other. The conflicting views form the market in opposite directions resulting in an unstable market environment.

7. Final discussion

In this chapter, we refer back to the research gap presented in our introduction chapter and discuss the theoretical and empirical contributions of the thesis (7.1). Further, potential limitations with our study will be elaborated upon (7.2), followed by reflections on managerial implications (7.3) and suggestions for future research (7.4).

7.1 Theoretical & Empirical Contributions

Drawing upon our conclusion, we will now refer back to the research gap described in the first chapter by presenting the contributions made through our work.

First of all, this thesis contributes to research by increasing the understanding of a market formation processes, which was our main purpose. By this case study, we have added a new empirical example of how a new market is formed. This is further a theoretical contribution within the market-as-practice discipline that has encouraged studies on new and emerging markets (see section 1.3, Problematization & Research Gap). Additionally, we have contributed by identifying new types of activities within each practice, and what implications a sales prohibiting law can have on a market. Our empirical findings also deliver extensive information on historical, current and potential future events for the market for edible insects in Sweden. Yet, we are well aware of that this portraying will most certainly change within a relatively short notice.

Moreover, our findings have proved a new example of generic performativity, namely, "strong but partial performativity", supporting the view that there are usually multiple market versions existing in parallel. Additionally, we have contributed to the research of market formation by supporting the notion of legitimation as an important aspect in forming a market.

In regards to research on entomophagy, we have contributed to theory by studying edible insects from a market perspective. Finally, we argue that we also have contributed to the subject of sustainable foods, hoping that this study will help raise awareness to this matter of which we are concerned and passionate about.

7.2 Limitations

First of all, one limitation to our study could be the choice of theoretical framework. As the framework itself does not make any distinctions between the powers of the different activities, the power positions between certain actors are not really accounted for here. Further on, due to the novelty of the market formation we have, as a part of this thesis, consolidated information of historical and current event on the market of study. Due to a combination of limited time scope and a rapidly changing market environment, all actors have not been covered. On the other hand, it is almost an impossible task to cover a whole market; yet, this should be considered a limitation. Connected to this, we have chosen to investigate a very specific market at a very early stage, which results in limitations regarding generalizability. Since this area is almost unexplored, we cannot say that this study applies to all other new product markets, nor to other insects markets in other geographical areas.

7.3 Managerial Implications

Studying this market formation, we have understood that several actors are involved in the formation of a new market, and that these actors does not always have the same idea of how the market should be formed. In terms of the market for insects as food in Sweden, we argue that research can be seen as carrier of legitimacy, helping a new product to gain legitimation. We therefor stress the importance of collaboration between business and academia to facilitate the formation of a new market. Further, in this case we argue that regulatory bodies, research and business are not working in the same direction. To facilitate the formation of a new market and make the process more efficient we further suggest collaborations between these three parties, as they are all equally important actors on the market.

7.4 Future Research

During the process of writing this thesis many interesting topics have appeared as suggestions for future research. We have condensed them to four main areas presented below.

Firstly, we suggest a replication of our study. This market was partly chosen due to the aim of contributing to research about market formations. However, the market formation process is still at a very early stage, and assumingly change a lot after 2018, when the new version of the novel foods regulation will apply. Therefore, we suggest studying the same market in 5-10 years from now would be of great relevance, as we believe that the market will continue to evolve.

Additionally, in case of replicating our study other actors such as consumers, producers and restaurants could beneficially be included.

Secondly, we suggest further research on the categorization if edible insects, assuming that insects will be legal and sold within a near future. We have understood that market actors have very different ideas of what an insect product "is" and which product category it should belong to. We believe this matter to be of great interest but also important from a marketing perspective when introducing insect-products to consumers.

Thirdly, we suggest further research on the interrelation between the edible insect market and the market for insects as animal feed. Due to the scope our study, the feed market has been excluded. Through our empirical investigation, we have got indications on that the feed market is paving the way for the development of the edible insect market, as the increased knowledge about breeding and production can be used for both markets.

Fourthly, throughout this process we came to understand the ambiguous character of the novel food regulation, causing different interpretations of the rules among EU member states. Connected to the strong performativity found in the regulation, it would be interesting to investigate what effect the regulation has had on different countries.

Lastly, we encourage research comparing this case with other cases of new product markets and the implied regulatory issues. For example, vitamin supplements and herbal medicines is a discussed topic in regards to the Swedish Food Administration both in terms of recommendations and approved ingredients. We believe it would be of both high interest and relevance to study these products and compare them with the process of edible insect products.

8. References

8.1 Literature: Journals

Anand, N., & Peterson, R. A. (2000). When market information constitutes fields: Sensemaking of markets in the commercial music industry. *Organization Science*, *11*(3), 270-284.

Araujo, L., Finch, J., & Kjellberg, H. (2010). *Reconnecting marketing to markets*. Oxford University Press.

Araujo, L., Kjellberg, H., & Spencer, R. (2008). *Market practices and forms: introduction to the special issue*.

Callon, M. (1998). An essay on framing and overflowing: economic externalities revisited by sociology. *The Sociological Review*, *46*(S1), 244-269.

Callon, M., Méadel, C., & Rabeharisoa, V. (2002). The economy of qualities. *Economy and society*, *31*(2), 194-217.

Deroy, O., Reade, B., & Spence, C. (2015). The insectivore's dilemma, and how to take the West out of it. *Food Quality and Preference*, *44*, 44-55.

Dubois, A., & Gadde, L. E. (2002). Systematic combining: an abductive approach to case research. *Journal of business research*, *55*(7), 553-560.

Dubuisson-Quellier, S. (2010). Product tastes, consumer tastes: The plurality of qualification in product development and marketing activities.

Evans, J., Flore, R., Pedersen, J. A., & Frøst, M. B. (2015). Place-based taste: geography as a starting point for deliciousness. *Flavour*, *4*(1), 7.

Giddens, A. (1984). *The constitution of society: Outline of the theory of structuration*. University of California Press.

Hagberg, J. (2016). Agencing practices: a historical exploration of shopping bags. *Consumption Markets & Culture*, *19*(1), 111-132.

Hagberg, J., & Kjellberg, H. (2010). Who performs marketing. *Dimensions of agential variation in*.

Kjellberg, H., & Helgesson, C. F. (2006). Multiple versions of markets: Multiplicity and performativity in market practice. *Industrial Marketing Management*, *35*(7), 839-855.

Kjellberg, H., & Helgesson, C. F. (2007). On the nature of markets and their practices. *Marketing theory*, *7*(2), 137-162.

Kjellberg, H., & Olson, D. (2016). Joint markets How adjacent markets influence the formation of regulated markets. *Marketing Theory*, 1470593116658203.

Kjellberg, H., Storbacka, K., Akaka, M., Chandler, J., Finch, J., Lindeman, S., ... & Nenonen, S. (2012). Market futures/future markets: Research directions in the study of markets. *Marketing theory*, *12*(2), 219-223.

Latour, B. (1984). The powers of association. *The Sociological Review*, *32*(S1), 264-280.

Latour, B. (1987). *Science in action: How to follow scientists and engineers through society*. Harvard university press.

Latour, B. (2005). *Reassembling the social: An introduction to actor-network-theory*. Oxford university press.

LeCompte, M. D., & Goetz, J. P. (1982). Problems of reliability and validity in ethnographic research. *Review of educational research*, *52*(1), 31-60.

Lizardo, O. (2007). "Mirror neurons," collective objects and the problem of transmission: Reconsidering Stephen Turner's critique of practice theory. *Journal for the theory of social behaviour*, *37*(3), 319-350.

Loon, J.J.A., van Huis, A. (2010). An exploration on greenhouse gas and ammonia production by insect species suitable for animal or human consumption. *PLoS ONE Volume 5,* article number e14445.

Mattsson, L. G. (2003, September). Understanding Market Dynamics. Potential Contributions to Market (ing) Studies from Actor-Network Theory. In *19th IMP Conference*.

Nenonen, S., Kjellberg, H., Pels, J., Cheung, L., Lindeman, S., Mele, C., ... & Storbacka, K. (2014). A new perspective on market dynamics: Market plasticity and the stability–fluidity dialectics. *Marketing Theory*, *14*(3), 269-289.

Oonincx, D. G., van Itterbeeck, J., Heetkamp, M. J., van den Brand, H., van Loon, J. J., & van Huis, A. (2010). An exploration on greenhouse gas and ammonia production by insect species suitable for animal or human consumption. *PloS one*, *5*(12), e14445.

Ortner, S.B. 1984, 'Theory in Anthropology Since the Sixties', Comparative Studies in Society and History, 26(1), 126-166.

Pickering, A. (1993). The Mangle of Practice: Agency and Emergence in the Sociology of Science. *The American Journal of Sociology*, 99 (3), pp. 559-589.

Reckwitz, A. 2002. 'Toward a theory of social practices. A development in culturalist theorizing', *European Journal of Social Theory* 5: 243-63.

Rinallo, D., & Golfetto, F. (2006). Representing markets: The shaping of fashion trends by French and Italian fabric companies. *Industrial marketing management*, *35*(7), 856-869.

Rosa, J. A., Porac, J. F., Runser-Spanjol, J., & Saxon, M. S. (1999). Sociocognitive dynamics in a product market. *The Journal of Marketing*, 64-77.

Rozin, P., Chan, C.M. and Ruby, M.B. (2014). Getting people to eat more insects. Abstract book at conference "Insects to Feed the World", the Netherlands. p. 80.

Rumpold, B.A. and Schlüter, O.K. (2013). Nutritional composition and safety aspects of edible insects. *Molecular Nutrition and Food Research* 57: 802-823.

Schultz, P. L., Marin, A., & Boal, K. B. (2014). The impact of media on the legitimacy of new market categories: The case of broadband internet. *Journal of Business Venturing*, *29*(1), 34-54.

Storbacka, K., & Nenonen, S. (2011). Markets as configurations. *European Journal of Marketing*, *45*(1/2), 241-258.

Tan, H. S. G., Tinchan, P., Steenbekkers, L. P. A., Lakemond, C. M. M., & Fischer, A. R. H. (2014). Sustainable critters or delicious fritters. In *Consumer acceptance of edible insects in the Netherlands and Thailand. Abstract book at conference "Insects to Feed the World", the Netherlands* (p. 88).

Van Broekhoven, S., Oonincx, D.G.A.B., van Huis, A., van Loon, J.J.A (2015). Growth performance and feed conversion efficiency of three edible mealworm species (Coleoptera: Tenebrionidae) on diets composed of organic by-products. Journal of Insect Physiology 73: 1-10.

Vargo, S. & Lusch, R. (2004) Evolving to a New Dominant Logic for Marketing. *Journal of Marketing*, 68(1): 1–17.

Vargo, S.L. (2007) 'On a Theory of Markets and Marketing: From Positively Normative to Normatively Positive', *Australasian Marketing Journal* 15(1): 53–60.

Weissman, D. B., Gray, D. A., Pham, H. T., & Tijssen, P. (2012). Billions and billions sold: pet-feeder crickets (Orthoptera: Gryllidae), commercial cricket farms, an epizootic densovirus, and government regulations make for a potential disaster. *Zootaxa*, *3504*(6).

Whittington, R. (2006). Completing the practice turn in strategy research. *Organization studies*, *27*(5), 613-634.

8.2 Literature: Books

Araujo, L., Finch, J., & Kjellberg, H. (2010). Reconnecting marketing to markets. Oxford University Press.

Azimont, F. and L. Araujo (2010). How performance metrics help shape markets. In Araujo, L., J.H. Finch and H. Kjellberg (eds.) *Reconnecting marketing to markets*. Oxford, Oxford University Press: 94-116.

Berry, W. (2005). War does not maintain peace or promote freedom. In L. I. Gerdes (Ed.), War: Opposing viewpoints (pp. 71-79). Detroit, MI: Greenhaven Press.

Bourdieu, P. (1977). *Outline of a Theory of Practice (Vol. 16)*. Cambridge university press.

Bryman, A. (2012), Social Research Methods (4th edn). Oxford: Oxford University Press.

Bryman, A. and Bell, E. (2011), Business Research Methods (3rd edn). Oxford: Oxford University Press.

Callon, M. (Ed.). (1998). *The laws of the markets* (Vol. 6). Oxford: Blackwell.

Callon, M., & Latour, B. (1981). Unscrewing the big Leviathan: how actors macro-structure reality and how sociologists help them to do so. *Advances in social theory and methodology: Toward an integration of micro-and macro-sociologies*, 277-303.

Dicke, M., van Huis, A., Peters, M., van Grurp, H. (2014). The hockey stick pattern in the acceptance of edible insects in the Netherlands. Abstract book at conference "Insects to Feed the World", the Netherlands. p. 118

Flick,U. 2009, An Introduction to Qualitative Research (4th edn). SAGE Publications Ltd.

Flick,U. 2014, An Introduction to Qualitative Research (5th edn). SAGE Publications Ltd.

Jansson, A., & Berggren, Å. (2015). Insects as food-something for the future?.

Kjellberg, H. (2010). 'Marketing on trial: the SAS Eurobonus case.' In Araujo, L., J.H. Finch and H. Kjellberg (eds.) *Reconnecting marketing to markets*. Oxford, Oxford University Press: 181-203

Mitchell, T. (2007). The properties of markets. In MacKenzie, D. A., Muniesa, F., & Siu, L. (Ed.). *'Do economists make markets?: on the performativity of economics.*' (pp. 249-274) Princeton University Press.

Rubin, H.J. and Rubin, I.S. (2012), Qualitative Interviewing: The Art of Hearing Data (3rd edn). London: Sage.

8.3 Electronic Sources

Anki Sundin.se (2015). Proteinrik mat och matinsekter. Available at: http://ankisundin.se/proteinrik-mat-och-matinsekter/ Accessed 2017-03-27

BBC Good Food (2017). Food Trends 2017.

Available at: https://www.bbcgoodfood.com/article/food-trends-2017 Accessed 2017-04-11

BBC (2013). UN urges people to eat insects to fight world hunger. Available at: http://www.bbc.com/news/world-22508439 Accessed 2017-05-10

Bjurström & Lindgren (2016). Proteinskiftet. Available at: http://www.macklean.se/siteassets/insikter/macklean-insikter-8---proteinskiftet.pdf Accessed 2017-04-16

BugsFeed (2016). The EU Struggle with edible insects. Available at: http://www.bugsfeed.com/the_eu_struggle_with_edible_insects Accessed 2017-05-09

Bugsfeed (2017). Homepage. Available at: www.bugsfeed.com Accessed 2017-05-11

Dagens Nyheter (2013). FN till Väst: Ät insekter. Available at: http://www.dn.se/ekonomi/fn-till-vast-at-insekter/ Accessed 2017-04-25

Dailymail 2 (2015). Insect-eating latest culinary trend. Available at:

http://www.dailymail.co.uk/femail/food/article-2936565/Insect-eating-latest-culinary-trend-hit-UK.html Accessed 2017-04-11

Eat:em (2017). Home page. Available at: http://www.eatem.se/ Accessed 2017-05-11

Eatem Sverige (2017). Instagram Post, May 9th. Available at: https://www.instagram.com/p/BT1tfzKh3xd/?taken-by=eatemsverige Accessed 2017-05-11

Elle (2016). Haka på senaste hälsotrenden: insekter som ingrediens. Available at: http://www.elle.se/senaste-halsotrenden-ar-du-redo-att-satta-tanderna-i-insekter/ Accessed 2017-04-20

Entomophagy (2017). About entomophagy. Available at: http://www.entomophagy.com Accessed 2017-05-13

Entomove Project (2017). Available at: www.entomoveproject.com Accessed 2017-05-11

European Commission (1997). Regulation (EC) No 258/97 of the European Parliament and of the Council of 27 January 1997 concerning novel foods and novel food ingredients.

Available at: http://eur-lex.europa.eu/legal-content/EN/ALL/?uri=CELEX:31997R0258 Accessed 2017-04-11

European Commission (2015). Regulation (EU) 2015/2283 of the European Parliament and of the Council on novel foods. Available at http://eur-lex.europa.eu/legal content/EN/TXT/?qid=1449760581954&uri=OJ:JOL_2015_327_R_0001 Accessed 2017-04-27 Accessed 2017-04-15

European Commission (2017a) Novel Food Legislation. Available at: https://ec.europa.eu/food/safety/novel_food/legislation_en Accessed 2017-03-29

European Commission (2017b). Novel Food Authorization. Available at: https://ec.europa.eu/food/safety/novel_food/authorisations_en Accessed 2017-05-11

European Food Safety Authority (2016). Novel and traditional food: guidance finalized. Available at: https://www.efsa.europa.eu/en/press/news/161110 Accessed 2017-05-14

Europe Newsweek (2015). Bug's life: edible insect industry facing new EU regulation. Available at: http://europe.newsweek.com/bugs-life-edible-insect-industry-facing-new-eu-regulation-331045 Accessed: 2017-05-09

European Parliament (2016). Insects – soon to be a regulated food? Available at: http://www.europarl.europa.eu/RegData/etudes/ATAG/2016/583830/EPRS_ATA(2016)583830_EN.pdf Accessed 2017-05-02

Expressen (2011). Så blev tacos och texmex hela Sveriges fredagsmys. Available at: http://www.expressen.se/nyheter/sa-blev-tacos-och-texmex-hela-sveriges-fredagsmys/ Accessed 2017-05-10

Federal Agency of the Safety of the Food Chain, (2016). Placing on the market of insects and insect-based foods intended for human consumption. Available at: http://www.afsca.be/foodstuffs/insects/ Accessed 2017-03-29

Food and Agriculture Organization of the United Nations (2013). Edible insects: future prospects for food and feed security. FAO Forestry Paper. Available at: http://www.fao.org/docrep/018/i3253e/i3253e.pdf Accessed 2017-02-15

Forbes (2015a). 2016 Food Trends: Being Brand Agnostic, New Proteins, Delivery Shifts and 5 more. Available at: https://www.forbes.com/sites/phillempert/2015/11/15/2016-food-trends-being-brand-agnostic-new-proteins-delivery-shifts-and-5-more/#6f13e1622ecb Accessed 2017-05-12

Forbes (2015b), Consumer trends in health and wellness, forbes.com Available at: https://www.forbes.com/sites/thehartmangroup/2015/11/19/consumer-trends-in-health-and-wellness/#431fe645313e Accessed: 2017-05-09

Forbes (2016). Three lessons for entrepreneurs on getting people to eat insects or trying anything new. Available at: https://www.forbes.com/sites/mikemontgomery/2016/05/25/three-lessons-for-entrepreneurs-on-getting-people-to-eat-insects-or-try-anything-new/#43a3d58d4442 Accessed 2017-05-09

Fortune (2013). The United Nations Says We Should All Be Eating Insects. Available at: https://www.forbes.com/sites/timworstall/2013/05/14/the-united-nations-says-we-should-all-be-eating-insects/#5bf965de7fe3 Accessed 2017-05-07

Food and Agriculture Organization of the United Nations (2015). Insects for Food and Feed. Available at: http://www.fao.org/forestry/edibleinsects/en/ Accessed: 2017-05-09

Forskningsådet Formas (2016). Äta insekter – en smaklig lösning på dagens globala problem. *Projektdatabas för beviljade projekt.* Available at: http://proj.formas.se/detail.asp?arendeid=35340&x=250&y=20&sprak=2&redovisning=0 Accessed 2017-05-03

Future of food 2050 (2015). Alternative protein sources. Available at: http://futurefood2050.com/interviews/alternative-protein-sources/ Accessed: 2017-05-09

Future of food 2050, (2016). US Cricket-farming Scales Up. Available at: http://futurefood2050.com/us-cricket-farming-scales-up/ Accessed: 2017-05-02

Global Market Insight (2015). the edible insect market. Available at: https://www.gminsights.com/industry-analysis/edible-insects-market Accessed 2017-05-09

Göteborgsposten (2016). Insekter som vardagsmat. Available at: http://www.gp.se/nyheter/g%C3%B6teborg/deras-dr%C3%B6m-insekter-som-vardagsmat-1.3951926 Accessed 2017-05-11

HakunaMatAB (2016). Instagram Post. Available at: https://www.instagram.com/p/BIupqvrDeb0/?taken-by=hakunamatab Accessed 2017-05-11

ICA (2014). Annonsprislista. Available at: https://www.ica.se/Global/annonsinformation/prislista-buffe-2014.pdf?epslanguage=sv Accessed 2017-05-10

iForm (2016). Törs du äta syrsor och andra insekter? Available at: http://iform.se/nyttig-mat/superfood/tors-du-ata-syrsor-och-andra-insekter)

Elle (2017). Senaste trenden: är du redo att sätta tänderna I insekter? Available at: http://www.elle.se/senaste-halsotrenden-ar-du-redo-att-satta-tanderna-i-insekter/ Accessed 2017-05-11

Jnytt (2014). Nu ska insekter serveras på Jönköpingskrog. Available at: http://www.jnytt.se/article/nu-ska-insekter-serveras-pa-jonkopingskrog/ Accessed 2017-05-09

Jordbruksverket (2016). Införsel av livsmedel och foder av animaliskt ursprung för personligt bruk. Available at: http://www.jordbruksverket.se/amnesomraden/djur/resorochtransporter/djurprodukter/livsmedelochfoderinforselforpersonligtbruk.4.4bdd0ace12e454f491d80002541.html Accessed 2017-05-05

Kafka of Sweden (2017). Home page. Available at: www.kafkah.com Accessed 2017-04-11

Livsmedelsverket (2015) EU-förordning 2015/2283. Available at: https://www.livsmedelsverket.se/om-oss/lagstiftning1/gallande-lagstiftning/eu-forordning-20152283 Accessed 2017-03-27

Livsmedelsverket (2017a). Livsmedelskontroll. Available at: https://www.livsmedelsverket.se/produktion-handel--kontroll/livsmedelskontroll/ Accessed 2017-05-13

Livsmedelsverket (2017b). Nya livsmedel - Regler. Available at: https://www.livsmedelsverket.se/produktion-handel--kontroll/produktion-av-livsmedel/nya-livsmedel Accessed 2017-03-29

Macklean (2017). Aktuellt. Available at: http://www.macklean.se/aktuellt/ Accessed 11-04-17

Merriam Webster (2017). Dictionary: Insect. Available at: https://www.merriam-webster.com/dictionary/insect Accessed 2017-05-13

My Fitness Pal (2017). Everything you need to know about cricket flour. Available at: http://blog.myfitnesspal.com/everything-need-know-cricket-flour/ Accessed 2017-05-09

New York Times (2014). Jiminy Cricket! Bugs Could Be Next Food Craze. Available at: https://www.nytimes.com/2014/08/03/business/jiminy-cricket-bugs-could-be-next-food-craze.html?_r=0 Accessed 2017-05-12

New York Daily News (2015). "Entopreneurs' try to convince public that insects can be delicious" Available at: http://www.nydailynews.com/life-style/eats/entopreneurs-convince-public-eat-bugs-article-1.2186196 Accessed 2017-05-09

Nordic Food Lab. (2017). Homepage. Available at: http://nordicfoodlab.org/ Accessed 2017-05-04

Sveriges Lantbruksuniversitet (2017a). Äta insekter – en smaklig lösning på dagens globala problem. Available at: https://www.slu.se/fakulteter/vh/forskning/forskningsprojekt/insekter/ata-insekter--en-smaklig-losning-pa-dagens-globala-problem/ Accessed 2017-04-28

Sveriges Lantbruksuniversitet (2017b). Crickets as sustainable food. Available at: http://blogg.slu.se/crickets-as-sustainable-food/Accessed 2017-04-26

Stockholms Fria (2015). Klimatsmart insektsmat får nobben. Available at: http://www.stockholmsfria.se/artikel/119478 Accessed 2017-05-11

Svenska Dagbladet (2015). Hon vill få svenskar att äta malda syrsor. Available at: https://www.svd.se/hon-vill-fa-svenskar-att-ata-malda-syrsor Accessed 2017-05-09

SVT (2013). FN: Ät mer insekter. Available at: https://www.svt.se/nyheter/at-mer-insekter Accessed 2017-05-03

Sydsvenskan (2013), FN: Vi måste äta mer insekter http://www.sydsvenskan.se/2013-05-14/fn-vi-maste-ata-mer-insekter Accessed 2017-04-28

Tastebugs (2017). Homepage. Available at: www.tastebugs.net Accessed 2017-05-11

TV4.se (2015), "Här äter Peter Jihde levande larver" Available at: http://www.tv4.se/nyhetsmorgon/klipp/h%C3%A4r-%C3%A4ter-peter-jihde-levande-larver-3203841 Accessed: 2017-05-09

United Nations (2015), World population projected to reach 9.7 billion by 2050. Available at: http://www.un.org/en/development/desa/news/population/2015-report.html Accessed: 2017-05-09

Vinnova (2016a). Utlysningar, Klimatsmart protein. Available at: http://www.vinnova.se/sv/Ansoka-och-rapportera/Utlysningar/Effekta/Klimatsmart-protein/ Accessed: 2017-05-08

Vinnova (2016b). "Insekter som mat och foder - det näringsrika, smakliga framtidsalternativet med litet ekologiskt fotavtryck" (Project by RISE) https://www.vinnova.se/p/insekter-som-mat-och-foder---det-naringsrika-smakliga-framtidsalternativet-med-litet-ekologiskt-fotavtryck/ Accessed: 2017-05-08

Vinnova (2017a). About us. Available at: http://www2.vinnova.se/en/About-Vinnova/, Accessed 2017-05-13

Vinnova (2017b). Hakuna Mat - Klimatsmart Protein 2017. Available at: https://www.vinnova.se/p/hakuna-mat--klimatsmart-protein-2017/ Accessed 2017-05-11

Vinnova (2017c). Mjölmaskprotein – Från prototyp till product. Available at: https://www.vinnova.se/p/mjolmaskprotein---fran-prototyp-till-produkt/ Accessed 2017-05-11

Vinnova (2017d). Utlysningar, Framtidens livsmedel. Available at: http://www.vinnova.se/sv/Ansoka-och-rapportera/Utlysningar/Effekta/Framtidens-livsmedel/#1 Accessed 2017-04-07

Vinnova (2017e). Käka Syrsor. Retieved 2017-04-28 http://www.vinnova.se/sv/Resultat/Projekt/Effekta/2011-01544/Kaka-syrsor-kittlar-dodsskont-i-kistan/ Accessed 2017-05-11

Wellness Mama (2017). Cricket flour A Healthier High Protein Flour. Available at: https://wellnessmama.com/147742/cricket-flour/. Accessed 2017-05-04

Örebro University (2016). Syrsor som mat – ett första steg är taget. Available at: https://www.oru.se/nyheter/nyhetsarkiv/nyhetsarkiv-2016/workshop-om-syrsor/ Accessed 2017-05-13

8.4 Media

Andersen, K., & Kuhn, K. (2014). Cowspiracy: The Sustainability Secret. In *AUM Films & first spark media.*

9. Appendix

9.1 Interviewee Index

9.1.1 Overview of interviews

Actor Group	Organization	Representative	Role	Interview type	Interview Date	Follow-up
Entopreneurs	Hakuna Mat	Ellen Gellerbrant & Emma Aspholmer	Co-founders	Phone	07-02-2017	E-mail
	Eat:em	Martin Strid	Co-founder, CEO	Skype	10-02-2017	
	Nutrient	Adam Engström	Founder, CEO	Skype	13-02-2017	E-mail
	Tebrito	Nils Österström	Co-founder, CEO	Face-to-face	07-02-2017	
	Ento	Erik Stenberg	Co-founder	Phone	01-03-2017	
	Kafkah	Alberto Corti	Co-founder	Face-to-face	20-03-2017	
Institutions	Vinnova	Lena Eckerdal Rimsten	Program Manager, Section: Health, Department: Life science	Face-to-face	16-02-2017	E-mail
	Livsmedelsverket	Astrid Walles-Granberg	Advisor, Support Department, Inspection Division	Face-to-face	06-03-2017	E-mail
Food Retailers	ICA	Louise Nilsson	Team Manager Product Development Innovation	Face-to-face	01-03-2017	
	Coop	Jonathan Tullberg	Head of Private Label	Face-to-face	21-03-2017	
	Axfood	Mikaela Reijbrandt* & Theodore Lindberg**	Director, Price & Market analysis / Category Business Developer*, Procurement Analyst**	Face-to-face	03-03-2017	
Research /Academia	Sveriges Lantbruksuniversitet, SLU	Åsa Berggren	Professor, Department of Ecology	Skype	16-03-2017	
	Örebro Universitet, Grythyttan	Ola Albrektsson	Student & Chef	Phone	10-03-2017	
	Research Institutes of Sweden,RISE	Johan Berg	Researcher, Built Environment / Energy and Circular Economy	Phone	03-05-2017	
Media	"Bug Burger"	Anders Engström	Blogger & Insect eating advocate	Face-to-face	10-03-2017	E-mail
	"Anki Sundin"	Anki Sundin	Nutritionist (M.Sc. Nutrition), SSE MBA	Skype	17-02-2017	

9.1.2 Declined Interview Participants

Actor Group	Organization/Representative	Why interesting?
Entopreneurs	Qvicket, Josefin Strömberg	CEO of Swedish start-up selling cricket flour from Belgium
Restaurants	Paul Svensson, Chef	Paul Svensson is a well-know chef in Sweden. He will participate in the project for SLU by creating two dishes made of crickets.
	Blueberry, Café chain	Were planning on launching a "cricket-smoothie" with flour from Qvicket but had to stop due to the regulation.

9.2 Interview Guide

Name:

Title:

Organization:

Date:

Interview type:

Briefing

- Introduction of the authors and the subject
- Practicalities (Confidentiality, Recording, Option to be anonymous, transcript validation)

Background: About you and your company

- When was the company founded?
- Why was it started?
- Describe your everyday activities?
- Your biggest priorities right now?

Products & Advertising

- Tell us more about your product!
- How are you advertising your product?
- Have customers shown interest in your product? (B2B and B2C)
- Who do you see as your competitors?
- Which products do you see as substitutes to your product?

Regulations

- How are you affected by the regulation?
- Are you working to change the current regulation?

Market/Business Network

- Which actors are within your network?
- Do you have any collaborations with other actors?

The market for edible insects – Now and in the Future

- In general and with regards to your business
- Biggest barriers to commercialization of insects?
- How long will it take until we eat edible insects in Sweden? Why?

9.3 Thematic Coding of Interviews

Identified themes	Entopreneurs						Institutions		Food Retailers			Research/Academia			Media		
	Hakuna Mat	Eat:em	Nutrient	Tebrito	Ento	Kafkah	Vinnova	Livsmedels verket	ICA	Coop	Axfood	Sveriges Lantbruksuniversitet, SLU	Örebro Universitet, Grythyttan	Research Institutes of Sweden,RISE	"Bug Burger"	"Anki Sundin"	
The importance of media	X	X	X	X	X	X		X	X	X	X				X	X	
The importance of social media	X	X	X	X	X				X		X				X	X	
Regulations as a barrier	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	X	
Product development for insects	X	X	X	X	X	X	X	X	X	X	X						
Imitation of existing products	X	X	X	X		X			X	X	X		X	X	X	X	
Norms about food	X	X	X	X	X	X	X	X	X	X	X		X	X	X	X	
Diverse market definition & boundaries	X	X	X	X	X	X						X			X	X	
Globalization's effect on market boundaries	X	X		X	X	X											
Digitalization effect on market boundaries	X	X	X			X			X	X	X				X		
Competitors & actors on insect market	X	X	X	X	X	X	X					X	X				
Knowledge sharing between actors	X	X	X	X	X	X	X		X	X	X				X	X	
Lobbying for insects	X	X	X	X	X	X	X										
Influence from other markets	X	X	X		X	X			X		X		X		X	X	
Interlink between food and feed (insects)		X	X	X	X												
Barriers for formation of insect market	X		X	X	X	X	X	X	X	X	X	X	X	X			
Importance of insect type	X	X	X	X	X	X		X	X	X	X	X	X	X			
Characteristics of the food industry		X		X	X		X	X	X	X	X		X				X
Product development & innovation in food industry							X	X	X	X	X						
Lifecycle of food trends									X	X	X						X
Sustainability aspects of food	X		X	X	X	X			X	X	X						X
Digitalization in food retailing									X	X	X						X
Insects as alternative to new protein	X	X	X	X		X	X	X	X	X	X	X					X
Research of edible insects	X	X	X	X	X		X	X				X	X	X			X
Lack of research on edbile insects as a barrier	X		X	X	X	X	X	X	X	X	X	X	X	X			X