Bachelor thesis. UPV/EHU Faculty of Business and Economics Álava Section

UNIVERSIDAD DEL PAÍS VASCO/ EUSKAL HERRIKO UNIBERTSITATEA/ UNIVERSITY OF THE BASQUE COUNTRY

BACHELOR THESIS

NETWORK PERSPECTIVE ON TWO MARKETING STRATEGIES TO APPEAL POTENTIAL CUSTOMERS

Written by Saioa Ochoa de Zuazola Pinedo and directed by Jaromir Kovarik

2023-2024

Index

Table of figures

1. ABSTRACT

This thesis highlights the crucial role of network mechanisms in shaping companies' economic outcomes, emphasizing the adaptive and predictive capacities of brands that understand customer behaviours. Information flow and peer pressure among diverse economic agents play a significant role in the decision processes to purchase a product, particularly during information gathering. Companies employ a wide range of marketing strategies to influence customers' decisions, including two strategies analysed here: Celebrity Endorsement, and market expansion through alliances. The Word of Mouth Communication will also be an important factor in the analysis. This study focuses on two real-life cases that implemented these strategies. Nespresso serves as the initial case study that employed the celebrity endorsement strategy using the image of George Clooney, while the second case centres on Marimekko's expansion strategy using the image of a local brand Uniqlo. We show that these distinct strategies in fact operate similarly if we analyse them from network perspective.

2. OBJECTIVES

The objective of this thesis is twofold. First, we introduce several concepts from network theory. Second, using these concepts, we show through the analysis of two real-life case studies that two distinct marketing strategies—celebrity endorsement and expansion via alliances with established firms—actually utilize similar mechanisms when viewed through a network perspective.

3. METHODOLOGY

This work combines theory and case studies. The thesis introduces concepts from network theory and apply them in the analysis of two real-life cases.

4. MOTIVATION

Social networks involve more than just those applications that young individuals use to share their daily live through images. More broadly, a network is any structure composed of diverse connections among the nodes that constitute it and online social networks are just one example of a network.

This thesis concentrates on illustrating that social and economic networks play a pivotal role in the economic outcomes of companies. Markets and customers consistently follow new tendencies and brands who comprehend customer's behaviours are the most likely to adapt and predict those trends effectively.

Economics are shaped by the structure of transactions among different agents but brands' operations are focused on the exchange of products and services and the income obtained from their sale. To enhance sales, it is imperative to understand the Purchase decision process, particularly, the Gathering information stage during which customers evaluate different options. Thus, companies apply different marketing strategies to improve their performance, such as Celebrity endorsement and Word of mouth communication or Expansion to new markets via alliances.

We provide an analysis of two different cases that employed these strategies to connect with new customers and thus increase their sales.

The thesis is compound by three chapters. The first two compound the Theoretical Framework of the study and the last one sets the focus on the Cases.

The initial chapter briefly introduces network terminology covering concepts like the nature of the networks, the measures employed to draw conclusions and two real networks. This terminology will be employed in our case studies.

The second chapter gives a further analysis of the Purchase decision process and the strategies mentioned before.

The third chapter provides an elaborated study of the cases which involves all the information developed previously within two real-life scenarios.

The first case delves into Celebrity endorsement implemented by Nespresso and George Clooney. In this instance, the coffee company selected George Clooney to convince his followers to purchase their coffee capsules. Word of mouth communication, involving recommendations from trusted sources or close nodes, is another key aspect in Nespresso's sales growth (Loureiro López, 2015). The conclusion is that the combination of these two strategies or phenomena collaborated in the growth of the company. The first one, gave visibility to the brand and the second one, combined with Celebrity endorsement, increased notably the number of customers of Nespresso.

The second case revolves around a Finnish company: Marimekko which seeks expanding their market to Asian countries, Japan, more concretely. Despite not achieving the anticipated impact, they strategically opted to collaborate with a local company, Uniqlo, to gain visibility. This collaboration involved a collection confectioned together by incorporating the prints of the Finnish company to Uniqlo's products. Subsequently, the collaboration was so effective

that the Japanese market became the main market in Asia for Marimekko and the second most profitable market of the company (Marimekko annual report, 2022).

Most importantly, we provide a network perspective on the employed marketing strategies, showing that, although both strategies are considered different in marketing science, they both rely on very similar network mechanisms. Therefore, both strategies are closely related from the perspective of network theory.

5. THEORETICAL FRAMEWORK

In this section, we introduce formally the network terminology. We then illustrate how networks provide an alternative perspective on socio-economic systems.

5.1 NETWORK

Firstly, a network is a representation of a system composed of system members and their relationships. Graphically, *"A network is, in its simplest form, a collection of points joined together in pairs by lines"* (Newman, 2018, p.1). Figure 1 provides an example of a graph. Those points are called nodes. A node is a point at which two lines or systems meet or cross (Oxford Learner's Dictionary, 2024). The nodes of the network are connected to each other through links, also known as edges that determine whether there is a relationship between the network members.

There are different kinds of networks. They can be biological, technological, economic or social networks. Therefore, the nodes can represent animals, computers, people, firms, or even countries, while the edges among them can represent who hunts whom, who trades with whom, who influences whom, and so on.

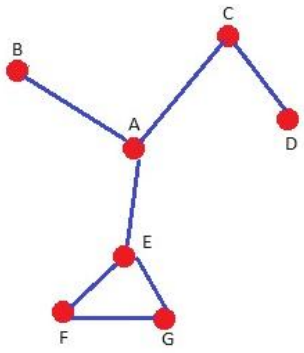

Figure 1 Simple network (own creation)

Figure 1 shows a simple network. Suppose that Figure 1 represents friendships. That is, the nodes are different people and the links show who is a friend with whom. For example, the graph shows that A is a friend of B and C but B and C are not friends, that F is a friend of A's friend, and so forth. The graph maps all the connections among all the network members. Such a network is called a friendship network.

5.1.1 Directed and undirected links

Depending on the application, links can be directed or undirected. To illustrate the concept, think about who influences whom.

In case of an undirected link, both involved nodes influence each other. In Figure 1, all pairs of friends influence each other and the whole network is thus undirected.

The opposite would be a directed link. In such a case, one of the nodes influences the other one, but the reverse is not necessarily true. Graphically, we represent the directionality by an arrow pointing from the node that influences to the node that is influenced. Alternatively, the direction can reflect from who to whom information flows. We will always specify the meaning of the arrow throughout the text.

The networks in Figures 3 and 4 provide examples of two directed networks that contain both directed and reciprocated links. The former links are represented by a link with one unique arrow at one end, while undirected links have an arrow at both ends of the link. We will discuss the networks in Figures 3 and 4 below.

5.1.2 Network measures

There exist numerous measures of one's positioning in networks. Below, we introduce three network measures that will play an important role in our analysis in Section 6, namely the degree, the clustering coefficient, and betweenness centrality.

5.1.2.1 Degree Centrality

The degree is simply the number of one's connections (Zhang & Luo, 2017). Then, the degree coefficient of a node is the number of her edges. Throughout the thesis, we denote the degree *k* and write k_v as the degree of node v.

Graphically, the degree is the number of links a node have with other nodes. In Figure 1, the degree coefficient k_A for the node A is three (i.e., $k_A = 3$), since the node has three links with nodes B, C and E. This measure provides information about who is locally the most influential member of a network or, in other words, who is the most popular. Targeting popular individuals can be used for marketing purposes to influence the diffusion of information in a network because the nodes with the highest degree can inform directly the largest number of people and stimulate the information flow in a society.

Depending on whether the network is directed or undirected, we distinguish between the degree, out-degree and in-degree.

In undirected networks, only degree matters. As we can see in Figure 1, as it is an undirected network, nodes A and E are the ones with the highest degree, the ones with the largest number of connections.

In directed networks, the degree is simply the count of one's relationships disregarding the direction of the link.

Out-degree score is the number of relationships from one node to other nodes. For example, the number of friends who inform one about a new product (Scientist, 2023). Out-degree of a node v is the sum of the connections that point from any other node to node v.

In-degree score reflects the number of relationships that point to a node. For example, in-degree is the number of people who recommend a new product (Scientist, 2023).

In Section 6, we employ these notions in two applications. In our *Nespresso* case, the actor George Clooney is a popular celebrity with many fans who admire him. In network terminology, he has high out-degree and can thus influence many people, but he does not even know them and is not influenced by them (i.e., he has normal in-degree). Such a marketing strategy based on one's popularity is known as celebrity endorsement (see Section 5.2.2 for details). In our *Marimekko* case, one node—a firm that would like to access a new market—establishes strategically a link to a highly connected firm that has already established many connections in the market with the objective of exploiting those connections.

5.1.2.2 Clustering coefficient

The clustering coefficient of a node quantifies how inter-connected his or her neighbours are (Soffer, & Vazquez, 2005).

More precisely, in Figure 1, node A has three neighbours, B, C and D. There might therefore exist three friendship pairs in node A's network neighbourhood: BC, BD, and CD. However, no pair of A's friends form a friendship. The clustering coefficient of A is thus zero (i.e. C_A=0/3=0). Consider node E instead. She has three friends, A, F, and G. F and G are friends, while A is not a friend with any of them. Therefore, since out of the three possible friendships in E's neighbourhood one exists, the clustering coefficient of E is C_E=1/3. Last, consider node F. Node F has two neighbours, E and G. These two nodes are friends. Then, the clustering coefficient of F C_F=1 as both of his neighbours are neighbours too.

For the calculations, we have employed the following formula (Alberich, et al, 2002):

$$Cv = \frac{Nv}{\frac{\mathrm{k}v(\mathrm{k}v-1)}{2}}$$

where $\mathrm{k}v$ is the *degree* of node v and Nv is the number of existing connections between the neighbours of v.

The clustering coefficient measures the density of the network neighbourhood of a node and lies between 0 and 1. The closer to 0, the less connections v's neighbors have and the less dense or less cohesive a neighbourhood is. In Figure 1, node F is the node with the highest clustering coefficient because all his neighbours are mutually friends and his neighbourhood is cohesive. In contrast, A has the lowest clustering coefficient because no pair of her neighbours forms a friendship. Then, the most the higher the clustering coefficient the more cohesive a network neighbourhood is.

Note that, say, node B in Figure 1 only has one connection. Therefore, there is no potential pair in her neighbourhood. In such a case, the clustering coefficient is undefined as $k_B(k_B$-1)

= 1*0=0 leads to C_B0/0, an indeterminate number. In such cases, we follow the literature and set the coefficient to zero (i.e., C_B=0).

In the context of the diffusion of information, the main benefit of clustering is to multiply the sources of information. A node with high clustering is likely to receive the same information about, say, a product from multiple sources (who also speak to each other) and this generates a reinforcement in the behaviour of the customers. The customers embrace the opinions of their close nodes and neighbours as they trust them and, as time goes by, the neighbourhoods share the same opinions and preferences for products.

5.1.2.3 Betweenness centrality

The betweenness centrality of a node v counts how many times different pairs of nodes excluding v, have to pass through v if they want to exchange information or communicate. Therefore, the betweenness reflects how important a node v is in the network as an intermediator or broker.

To compute the betweenness centrality of a node v, we must apply the following formula (Jackson, 2008, p.20):

$$Betweenness_v = \sum_{ij:i\neq j, v\notin\{i,j\}} \frac{\frac{P_v(ij)}{P(ij)}}{\frac{(n-1)(n-2)}{2}}$$

where *ij* is a pair of nodes i and j. *P(ij)* is the number of the *geodesics* between i and j. *Geodesic* is the shortest possible path between two nodes in the network (Oxford Learner's Dictionary, 2024). $P_v(ij)$ is the number of such shortest paths that go through v. Lastly, n is the total number of nodes in the network. Therefore, $(n-1)(n-2)/2$ is the number of all pairs of nodes i and j in the network, different from v. It is therefore theoretically the maximum possible number of shortest path that can pass through node v.

Hence, the betweenness centrality of a node v is the fraction of the shortest paths between all other members of the network that pass through v. Since this measure is a fraction, it always takes values between zero and one (Jackson, 2008). One means that node v belongs to all shortest paths between all pairs of other nodes, while zero reflects that a node v does not intermediate between any pair of other nodes. Since the denominator of the bewtweenness centrality is the same for all nodes in the same network, the higher the betweenness score the more central a nodes is as, in such a case, the node would broker between larger number of other nodes in the network.

To illustrate the computation of betweenness, let us start explaining the concept of the shortest path using the network in Figure 1. Consider nodes A and D. The only shortest path between them is A-C-D. Node B does not belong to this shortest path, while node C does. As another example, the shortest path between C and F is C-A-E-F, passing through A and E. In contrast, the path C-A-E-G-F also starts in C and finishes at F but it is not the shortest path

because it passes through three other nodes, A, E, and G. As a consequence, node G does not belong to the shortest path between C and F.

Therefore, the number of shortest path between A and D to which B belongs is 0 (i.e. $P_B(AD)$=0) and $P_C(AD)$=1 because there is only one shortest path between them and C belongs to it. In a similar vein, $P_A(CF) = P_E(CF) = 1$ but $P_G(CF) = 0$.

In order to compute the betweenness scores of the nodes in Figure 1, consider first node B. Observe that no pair of nodes different from B has to pass through B to communicate. That is, node B does not belong to any shortest path between any pair of other nodes. Hence, $betweenness_B = 0$. Similarly, $betweenness_D = betweenness_F = betweenness_G = 0$. All other nodes have positive betweenness. As an example, consider node C. Node C lies on the shortest paths between node D and all other five nodes different from C and D, but C does not bridge between any pair of nodes from other than C and D. Therefore,

$$betweenness_C = \frac{Pc(DA)+Pc(DB)+Pc(DE)+Pc(DF)+Pc(DG)}{\frac{(n-1)(n-2)}{2}} = \frac{5}{\frac{(7-1)(7-2)}{2}} = \frac{1}{3},$$

meaning that node C lies on 30% of shortest paths between all pairs of all the other nodes. Similar computations can be obtained for the remaining nodes. However, in Figure 1 node A has the highest betweeness centrality: $betweenness_A = 0.73$, which indicates her high level of intermediary importance within the network. This means the node A plays a significant role in connecting other nodes and facilitating interactions as it takes part in almost in ¾ of the paths of the network. As mentioned above, the nodes with the lowest betweenness centrality (0) are nodes B, D, F, and G as they do not broker between any pair of other nodes.

The computation of betweenness centrality is relatively simple in the network in Figure 1. However, real-life networks, such as that in Figure 3, are considerably more complex and the computation of betweenness requires sophisticated measurement techniques, such as e.g. the Pajek Method (Batagelj, & Mrvar, 1998). This method is a computer algorithm that allows making calculations with large networks to find the most central nodes in terms of betweenness. The main goals of this method is to reduce the complexity of the network by dividing it into different smaller networks, to help the user visualising the network and select efficient algorithms to analyse the large networks (Batagelj, & Mrvar, 1998). By using it, we can find the brokers and thus, the nodes with key positions in the network.

The typical interpretation of betweenness is brokerage and intermediation. A broker is an actor who connects otherwise disconnected nodes and network neighbourhoods. In Figure 2, the broker, represented by the black circle, bridges between two actors, represented by the white circles, who would be otherwise disconnected (Chaudhary, & Warner, 2015). Hence, if they want to trade or communicate, they have to operate through the black node. Matters are more complex in real-life networks, but the intuition is the same.

Figure 2 Broker (Chaudhary & Warner, 2015).

In our cases, George Clooney is the broker between *Nespresso* and the followers of the actor. In addition, the firm *Marimekko* uses the firm *Uniqlo* as a bridge or broker to get access to the clients of the Nippon brand in order to access the Japanese market. At the same time, Uniqlo benefits by getting access to the clients of *Marimekko*. Hence, both firms act like brokers.

5.1.3 Social and economic networks

The main objective of network theory is to provide a different perspective on a complexity of a system from simple aggregation. Such network perspective has been employed in many different environments such as schools, family, workplace, etc. Connections are needed to approach other nodes, then it is interesting to get the right ones for our purposes. Such real-life networks are considerably larger than the network in Figure 1 and cannot be described visually. The literature terms such networks as *complex networks*.

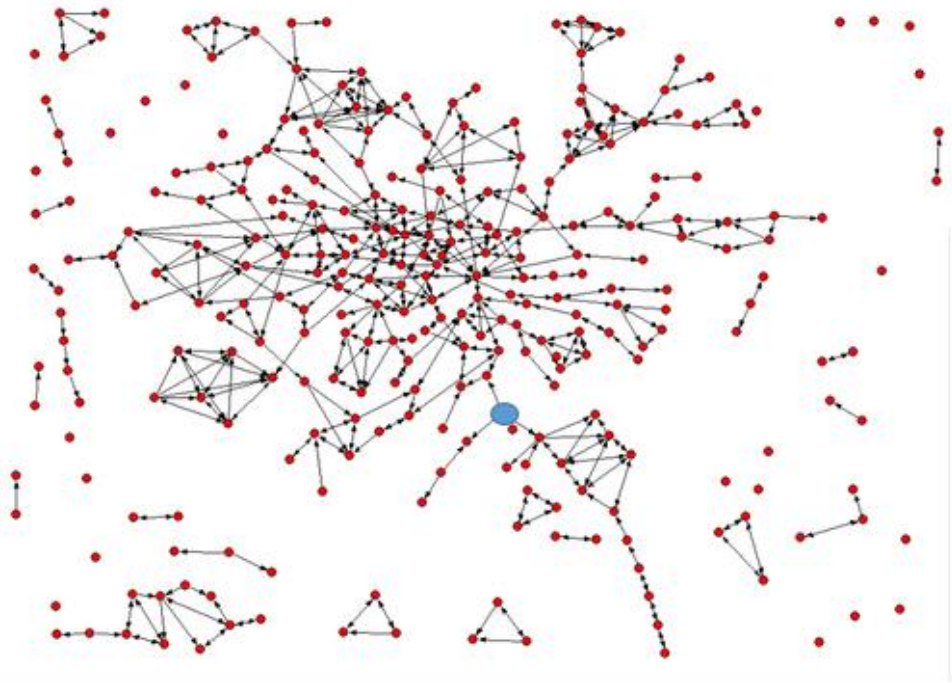

Figure 3 Student Network: Friendships (Kovarik, 2012)

As an example, Figure 3 represents a friendship network among more than 300 students from Kovarik et al. (2012). It illustrates that there are distinct groups, a core of the majority of students in the centre of the network, a number of smaller groups around the core, many small groups disconnected from the main component of the networks, and some nodes do not have any links in the network.

Unlike in Figure 1, the connections in this network are represented by one- or two-directional arrows. As explained in Section 5.1.1, we distinguish between directed and undirected links. Therefore, Figure 3 represents a directed network, in which we find mutually friendships as well as case, where one individual claims that he is a friend of another node who, however, does not consider the former his or her friend. Such asymmetry in friendships is a common feature of friendship networks. In terms of influence, it means that two students

influence each other if they consider each other a friend, while if only one of them does this consideration, they are not friends and only one of them influences on the other one.

In complex networks, we cannot easily assess the positioning of each node in terms of the network measures introduces in Section 5.1.2. However, we can read certain details from Figure 3. As for the degree, note that the most popular people are located in the dense core of the network. Regarding clustering, the typically feature of social and economic networks is that the local clustering is high and this can be also appreciated in Figure 3, which contains a large number of triangles. This means that friends of each node are likely to be friends and the network is highly clustered. Last, we can appreciate the presence of nodes with high betweenness who connect different parts of the network. The node represented in blue in Figure 3 is the only intermediator between three parts of the network. Without him or her the connection between those three sections of the network will not be possible and information would not flow. However, as discussed above, finding these brokers and compute their betweenness centrality is a challenging task and a network software has to be used.

We can find some similarities with this network in the cases we are going to study below, especially in the Nespresso case.

In Figure 3, the nodes represent distinct individuals, but connections can also exist between companies or even countries. In addition, companies can be connected with customers, and the connections can be directed or undirected.

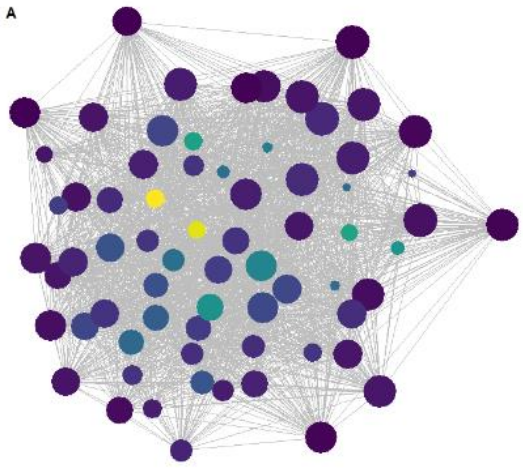

Figure 4 Argetinian banks network (De la Fuente, 2023)

Figure 4 is a different example which represents a network among banks and financial companies in Argentina from De la Fuente (2023). Banks are the nodes of the network and the edges represent their connections and exchanges. The edges among the banks are not like the ones in Figure 3. They are undirected because banks are the kind of sector that needs to exchange resources with their competence. After all, they are buying and selling products and services to each other and they receive money or another product or service back, it depends on the connection. Therefore, the links are bidirectional, or as we said, undirected so they are like the ones in Figure 1.

As mentioned above, it is difficult to appreciate the structure by naked eye, but a few observations can be made. The complexity of the network is higher than the one in Figure 3 and it is so cohesive that is tough to understand the connections in the core of the network. Here, there are not different groups, there is only a huge and highly connected one. So, the degree is incredibly high if not for all, for the majority of the nodes.

In addition, something that distinguish this network with the previous one is the size of the nodes. The nodes in Figure 3 had the same size. In this network, the bigger the node is, the higher degree it has and the smaller the node is, the lower degree. It is interesting that the nodes which are farther from the nucleus are the ones with a higher degree, unlike in the other network.

According clustering, the network is so complex that it is not possible to distinguish any cluster but sure there are because many exchanges happen among the nodes of this network. Hence, as resources are needed, the tendency is to work with the collaborators of our partners. Especially, the ones in the middle of the network which are closely connected and have the highest betweenness.

The Betweenness centrality in this network is much clear than in the Figure 3, because De la Fuente (2023) distinguished the nodes by colours. The ones with the brightest colours are the ones with a higher betweenness. Thus, the yellow nodes which are in the middle of the network, are the ones who take part in more geodesics, as we explained in section 5.1.2.3, these are the shortest paths between other nodes. On the contrary, the darker the colour of the node is, the less times it takes part in geodesics between other nodes. These are the ones more far away from the core of the network. Again, it is interesting that the nodes with a higher betweenness have a low degree. This means that they have key connections and because of this the might not need too many.

This last point is important because for businesses is crucial to have advantageous connections and not waste resources in the ones that are not.

5.2 ACQUIRING NEW CLIENTS: TWO MARKETING STRATEGIES.

Companies are interested in acquiring new clients. To that aim, they are interested in understanding the tendency of their target groups to satisfy their necessities with the objective to influence their preferences. In this section, we provide a description of the purchasing decision process and outline two marketing strategies to influence this process widely employed in practice.

5.2.1 Purchase decision process

The purchasing decision process is defined by Rivera et al (2009) as “the set of activities that individuals engage in when they select, purchase, evaluate, and use goods and services, with the aim of meeting their needs, involving mental and emotional processes, as well as physical actions”. In other words, it consists in the period of time between the realization of a consumer that she needs to buy a product and she makes the purchase. The process passes

through several stages. The process may differ across people and products, but let us focus on the stages described in Figure 5.

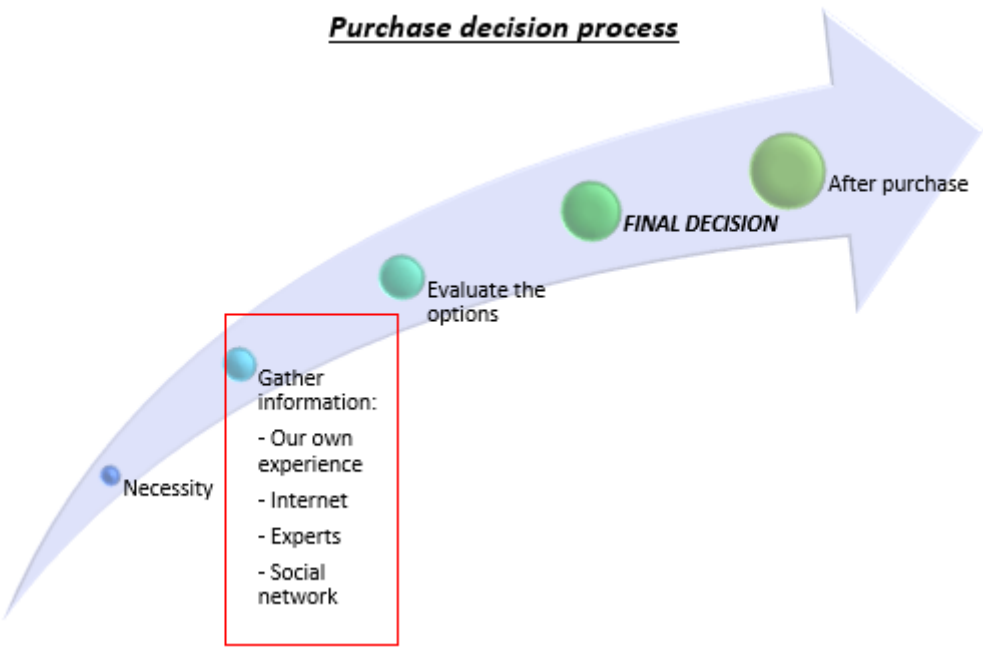

Figure 5 Purchase decision process (own creation) according to Sulla (2021).

In Figure 5, we can differentiate five stages (Sulla, 2021). The first one is "Necessity". This stage represents the moment when the customers realize they need—or want—to buy something.

The most important process for this work is the second stage, called "Gathering information" which represents the time needed to understand the product and all the features that it could have. The customer will start to define which possible purchases are, thus, this stage is critical for the companies as it is the moment to start convincing the customer. That is why it is highlighted with a red rectangle. Here, we focus on possible strategies of a company to intervene in this stage.

In the process of gathering information, a client collect data from her experience, people around her, the experts, etc. This also includes information about the reputation of the company and its products, reflected in recommendations of famous people or extrapolate the reputation from the collaboration of the firm with other more familiar firms. These mechanism are the subject of the next sections.

After this, taking into account all the information and the preferences of the customer, this buyer has to" Evaluate the different options" and finally "Take a decision".

Moreover, there is a last stage in the process and it also crucial from the business point of view: After the purchase. This is because it shows whether the product or service succeed the expectations of the buyer or not. If the answer is yes, this buyer will keep buying the products of the brand and possibly recommend them to her friends and acquaintances, especially when the expectations are over succeed. On the contrary, if the experience of the buyer is negative, she will advise her close connections not to buy the product which is a loss for the company.

The process of information diffusion is called *Word of Mouth* and it consists of the spread of the information among connected people and after the reinforcement of this opinion, it can change the preferences of the other nodes or generate new necessities. Therefore, an agent in this stage interacts and influences agents at the stage of gathering information described above. For example, if one friend recommends one bar to another, and later after asking another friend, she has the same opinion about that place, the no user might want to try it as both friends had a good experience there.

Bughin et al (2010, p.2) also define *Word of Mouth* as "consumer-to-consumer communication with no economic incentives" due to the lack of hide interests in this kind of recommendations. They also assert that this effect accounts for 20 to 50 percent of the purchasing decisions. Therefore, it is an important fact to take into account.

Thus, the satisfied customer can be an important promotion tool for the company as the customer will keep buying the product apart from recommend it. Even more, these satisfied customers can also create a necessity in other possible customers, after showing the product and its benefits to other nodes. This generates raises the client portfolio of the company.

5.2.2 Celebrity endorsement as a promotion tool

In marketing, Promotion is one of the 4 Ps: Product, Price, Placement and Promotion (Goi, 2009). Let us focus on the Promotion part. Promotion is the last P because it happens right before the commercialization of the product or during the same. It consist of getting the attention of the target market so they know the product and have a good perception of it.

Companies use techniques like advertisements, collaborations, gifts, discounts, etc. to persuade the possible customers to buy their products. They frequently hire celebrities for this process, so they take part in the adverts or share the product in their social media which is called Celebrity endorsement (Erdogan, 1999).

According to branding, the consumers will relate the characteristics of the celebrity to the brand and enhance the image of the brand (Hove, 2019). For this reason, the election of the celebrity has to be taken focusing on the customers. If the election is not appropriate can be detrimental for the company as the image of the celebrity can damage the one of the company and the opinion of the customers about its products.

Nespresso employs this technique to influence on the perception of the customer about their capsules of coffee. For further information check the Section 6.1 where the case is more deeply explained according to the marketing strategy and the network perspective.

5.2.3 Expansion strategy through alliances

Our case 2 in Section 6.2 sets the focus on two companies that worked together to increase their sales in a new country. Due to the high level of risk and the expensiveness of the process of expansion, some companies decide to collaborate with incumbent companies.

Expansion is the process a company does to increase their sales by penetrating a new market or country. As it is a new market for them, there is lots of information that they do not

have, such as the culture of the country, the expectations of the customers, their preferences, needs, shopping habits, etc.

Therefore, having an established company as a collaborator in the target market facilitates the expansion (Moen et al, 2010).

Certain reasons for an expansion via an alliance are directly economic and unrelated to marketing. As García-Canal et al (2002, p.1) affirmed: "A typical local alliance is formed by a multinational enterprises and a local partner with the aim of combining the former's technology and products with the local knowledge and resources provided by the local".

For example, the expanding enterprise needs information of the market, they can decrease costs by exploiting exiting resources and networks of the incumbent, etc. Naturally, this comes at some costs such as profit sharing, innovation sharing, etc.

Figure 6 Brokerage chain in the expansion process (own creation).

In this work, we focus on reasons related to marketing though. In particular, as a result of a collaboration, the existing and potential customers of the established firm may learn about the newcomer and they can extrapolate certain information about the newcomer from the reputation of the incumbent firm. Again, it is somehow complex, but an alliance generates certain connections between the incoming firm and the clients connected to the established firm as shown in non-network terms in the diagram in Figure 6. This is the process that we describe from both non-network and network perspective in our Case 2 below.

6. CASES

6.1 CASE 1: NESPRESSO AND GEORGE CLOONEY

6.1.1 Case description

Nespresso is one of the most known brands of coffee. The brand was created in 1986, and it is a trademark inside the range of products of Nestlé (Loureiro López, 2015). The Swiss brand already sells soluble coffee with the brand Nescafé which was created in 1938 (Nescafé, 2024). Hence, they created Nespresso to satisfy the necessities of a different segment of the market.

Nespresso sells individual capsules of coffee to drink at home. They sell both the capsules as well as the machines necessary to prepare the coffee. In doing so, they try to project an image of a glamorous coffee, differentiating themselves from the traditional coffee brands.

With the aim of extolling this glamorous image, the Nespresso Club members chose in 2004 George Clooney as the ambassador of their brand (Huergo Cornejo, 2014). Recognized for his elegance and notable acting career, George Clooney transmits his preference for Nespresso's coffee. Through this association, he imparts an image of sophistication to the brand. In addition, the message that he is sending to the audience is that a celebrity of his stature chooses Nespresso, elevating like this the premium image of the brand.

As explained in Section 5.2.2., this is a marketing technique called Celebrity endorsement that helps to reinforce the image of the brand with the characteristics and personality of the actor.

This being said, we are going to study the effected caused by the collaboration with George Clooney in the image of Nespresso and the increase on the sales they had. For this duty, there is a questionnaire done by Loureriro López (2015) and some important data from Huergo Cornejo (2014) that will help to thoroughly understand the situation of Nespresso in the market.

Setting the focus into numbers, Figure 7 is a summary of the economic result of the company during 2000 and 2009. AS mentioned above, the company incorporated George Clooney in 2004. Then, during these years it is possible to analyze the results of the ambassadorial.

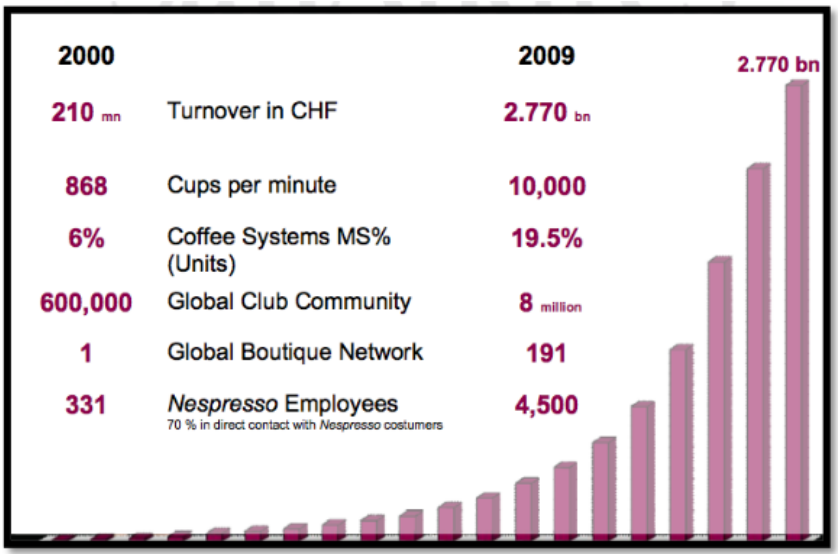

Figure 7 Nespresso's growth's summary (Huergo Cornejo, 2014).

It is evident that all the factors studied by Huergo Cornejo (2014) experienced an increase during this timeframe, as the turn over raised up in millions of dollars and the number of stores increased too. What holds greater significance is the community generated around the brand, it is the representation of those customers loyal to the company. In 2000, they were six hundred thousand individuals which is an admirable data but at the end of 2009 they were already eight million. This increase means that the satisfied customers kept being loyal to the brand and new users also became part of the community. While it may be challenging to point out all the causes for this growth, the research done by Loureiro López (2015) will help us to find some of those causes of the increase.

In her survey, she discovered that when asking which coffee brands come to their mind, the 76% of the respondents spontaneously answered Nespresso. This means that three quarters of the sample were familiar with the brand. The next most recognized brand only got a 12%, highlighting the significant gap between these two brands. This percentage can be compared in the following figure. Consequently, the conclusion is that the brand was well known among the sample.

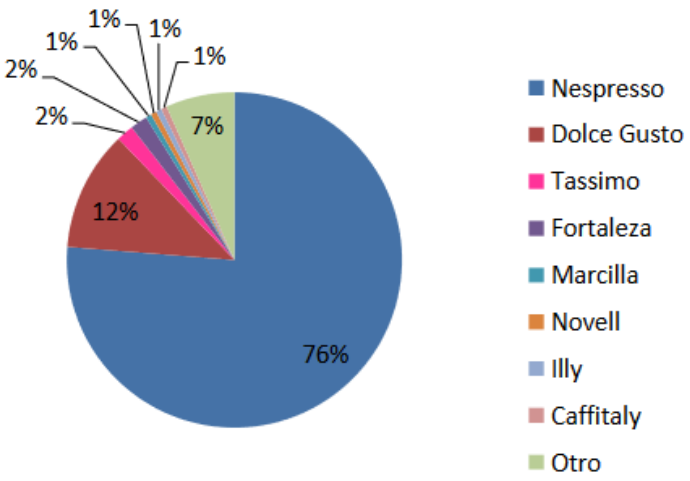

Figure 8 "Which brands come to your mind?" (Loureiro López, 2015, p. 39).

The next question was if they remembered any announcement of any of the companies. This question is key for our analysis because Nespresso and George Clooney principally conveyed their endorsement through advertisements. Then, it is compulsory to study the performance of them to know whether they were effective or not.

Figure 8 provides a summary of the sample's answers and it indicates that the 91% of them respond Nespresso. Hence, almost the whole sample remembered the adverts of the company more than the ones of the competence. Thus, the endorsement was successful to increase the visibility of the company.

Nespresso	91%
Marcilla	3%
Dolce Gusto	2%
Otros	2%
Fortaleza	0,72%
Tassimo	0,72%

Figure 9 Do you remember any advertisement of coffee capsules? (Loureiro López, 2015, p.40).

Another significant point that Loureiro López discovered is that 40% of the respondents who bought Nespresso, tried the brand for the first time after a recommendation of someone else. Therefore, the recommendations of a close source were crucial to appeal potential customers into action. This is reflected in figure 10 below. This data represented in Figure 10 is also reinforced by Huergo Cornejo (2014) as he affirmed that the half of the targeted market tried the product after the recommendation of a close friend. Reinforcing this way the affirmation from Bughin et al (2010) mentioned in Section 5.2.1. Then, there is the possibility to conclude that the Word of Mouth communication takes an important paper in the performance of the company.

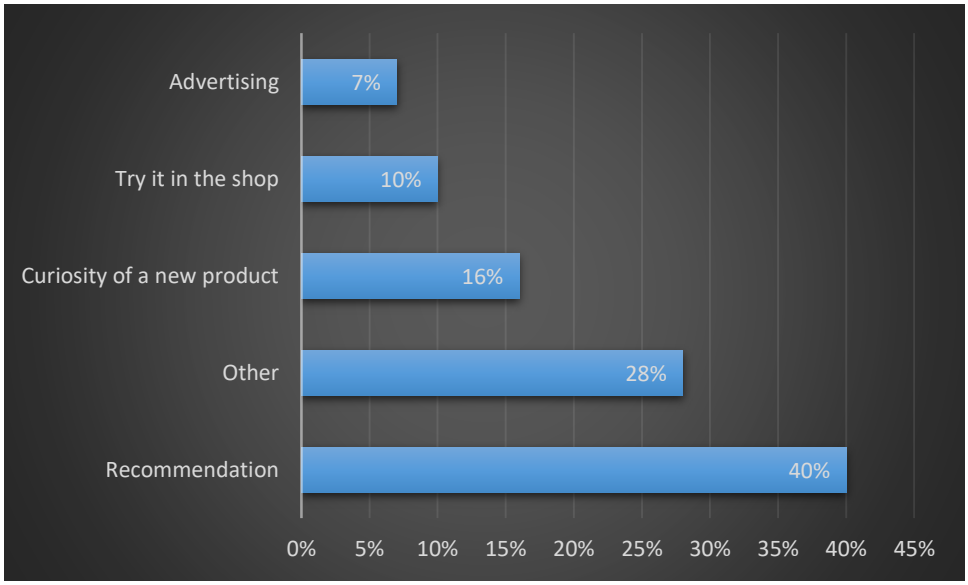

Figure 10 Based on the results that SIlvia Loureiro López got in her survey to the question Why did you start consuming Nespresso? (Loureiro López, S., 2015).

From this figure it is possible to comment that the advertisements, which was one of the tools to promote the connection with George Clooney as an ambassador of the brand, were not such a determinant tool to call potential customers into action. The percentage for this aspect was only 7%. Anyway, the celebrity endorsement is more than some advertisements. As explained in Section 5.2.2, it permits to reflect the personality of the celebrity into the image of the brand. Therefore, it is an effect that cannot be analyse in this kind of indicators as it is something subjective.

Consequently, as the figure does allows to appreciate neither the indirect effect of George Clooney nor the mechanisms behind. In addition, the results of the brand were incredible satisfactory, so it is possible to conclude that the combination of the strategies and tools used by the company were determinant for the incomes of the company.

The next section uses a perspective of network theory to suggest that the effect of word-of-mouth and celebrity endorsement might reinforce each other.

6.1.2 Network perspective

Firstly, it must be said that to obtain a complete network perspective requires access to the real network of the company. However, this is not possible due to the confidentiality constraints. Therefore, we illustrate the network perspective on this case using an artificial network.

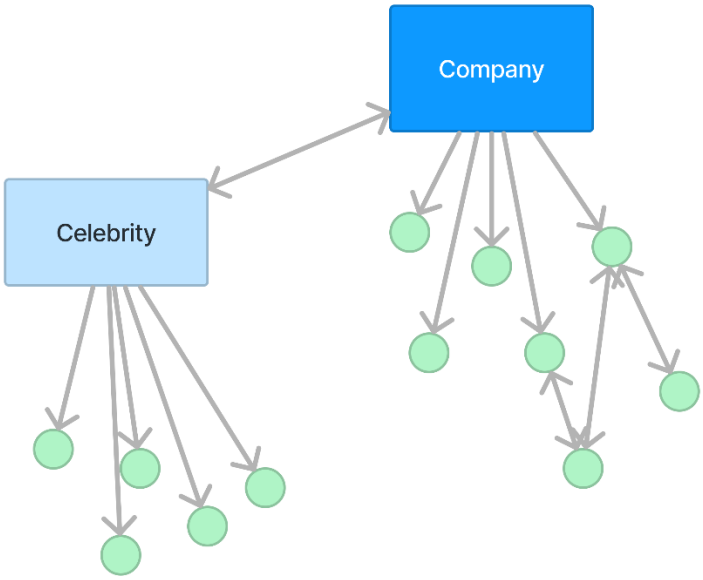

Figure 11 Celebrity endorsement network (own creation).

From network perspective, Figure 11 shows that, due to the celebrity endorsement, the celebrity creates a link to the company. In addition, the company already has consumers and the celebrity has followers. This indirectly creates a link between the company and the

followers of the celebrity. That is, the celebrity becomes a broker between the company and the celebrity's followers.

To relate this effect to the clustering, it is very likely that the existing consumers of the company are interconnected and the followers are interconnected. Hence, there already exist clustering and many triangles. In addition, the newly established link from the company to the followers of a celebrity generates many triangles involving the company and two existing and/or potential consumers. This reinforces the impact of celebrity enforcement further through the word of mouth communication.

Note that, in Figure 11, there are different kind of connections. Firstly, those connections between Nespresso and the customers are directed, as explained in Section 5.1.1, where the company influences the customer, but the customer does not influence the company. The other type of connection is between Nespresso and George Clooney, where both somehow influence each other. As mentioned, the actor conveys his image to the company, and reciprocally, the company does the same in return to the image of the actor. Therefore, the connection must to be undirected.

In addition, there also exist some connections among customers of the brand and other individuals. These connections represent friendships, familiar ties, co-working etc. and are generally undirected as well. Then, both of them influence on each other, generating word-of-mouth communication

Concerning the degree, Nespresso and George Clooney each have a high number of connections, but Figure 11 is only a condensed representation of the real network. Nespresso is a worldwide company with many followers, as demonstrated in Figure 11, and George Clooney is a widely recognized celebrity with a great fan base. Thence, their large out-degree coefficient make them influence many individuals. In contrast, the customers of the company as well as the followers of the celebrity are likely to have standard connectivity.

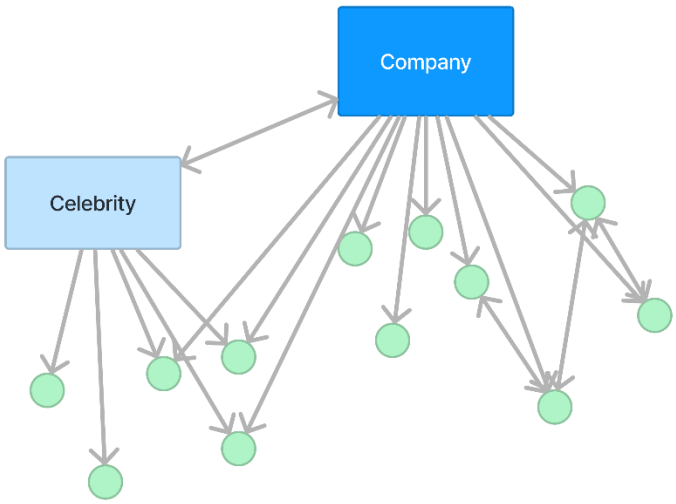

Figure 12 Result of celebrity endorsement in a network (own creation).

Figure 11 is the representation of the network during the endorsement phase, yet the Nespresso's primary aim was to attract new customers. From a social and economic

networking perspective, this is the reshaping of the network to establish specific connections between Nespresso and the followers of the celebrity.

While Figure 11 illustrates the network's dynamics in the short term, Figure 12 represents its evolution over the long term. It is notable that the brand successfully established these specific connections with George Clooney's followers, as well as also with the close nodes of existing customers, expanding this way the client-portfolio of the company. Hence, the celebrity and the customers of the brand which started acting as brokers between the company and potential clients turned this chain into the triangular structures mentioned above.

Nevertheless, it is not possible to forget, as depicted in Figure 9, that Celebrity endorsement was a crucial factor in augmenting brand's visibility and it is possible that a great part of people influenced by word-of-mouth were actually informed by the followers of George Clooney.

Consequently, it is crucial to remember that the convergence of these network dynamics significantly influenced to the outcome of the brand as they mutually reinforce each other. Therefore, without comprehensive data on the case, it is difficult to determine the entire strategy of the brand and the multitude of factors contributing to its successful performance. However, from network perspective, the synergy between these two elements proved remarkably successful.

6.2 CASE 2: MARIMEKKO AND UNIQLO, EXPANSION STRATEGY THROUGH ALLIANCES

6.2.1 Case description

Marimekko is a Finnish brand created in 1951. The history and the present of this company is directly affected by connections and collaborations of different people and brands as they worked with international trademarks such as Adidas or Converse (Kimmo, 2022).

They started creating clothes because Armi Ratia's husband, the founder of the company, had a printing company. In 1951, Ratia created some cotton clothes in her husband's printer and after that, they decided to show them through a fashion parade. It was at that parade when they realized the designs could be successful (Marimekko, 2024).

Figure 13 Unikko pattern (Marimekko, 2024).

Later, in 1953, Vuokko Eskolin-Nurmesniemi collaborated with Marimekko to increase the production and she also helped them to create more designs. They also worked with other designers like Maija Isola, who created the most memorable pattern of Marimekko: Unikko, the one in Figure 13 (Üstüner, 2015).

Additionally, in 1954, Jacqueline Kennedy, who was the First Lady of the United States of America at that moment, wore one dress of Marimekko on the cover of Sports Illustrated magazine (Kimmo, 2022). This is a celebrity endorsement free action, as there is not a real contract between both parties, but she is giving visibility to their products and supporting the company. This initiative was also intriguing in terms of enhancing visibility for the Finnish brand in the American market, which was a key target market they aimed to penetrate.

Likewise, it was in 1991 when a businesswoman, Kirsti Paakkanen, bought Marimekko. She hired new designers and her main objective was to expand the brand internationally. They particularly focused on the Japanese market (Üstüner, 2015), because they hypothesized that their product could fit in the Asian market. Since the process of market expansion is risky and expensive. They decided to collaborate with the Japanese company Uniqlo to penetrate the Japanese market.

They set the first physical shop of Marimekko in Japan in 2006 and, ever since, they have opened 40 stores in the Nippon country (Chiba, 2020).However, company's outcome has not always been such positive. To achieve these conditions they had to set the strategy explained in Section 5.2.3. Expansion strategy through alliances.

Concerning Expansion strategy through alliances, as it has been said Marimekko entered the Japanese market with limited success. They did not need to expand to another market but they really needed to get visibility there. Hence, the objective was to enhance visibility, by creating products with a local company, Uniqlo, increasing this way the likelihood to raise their sales up in this area. But it was not until 2018 when they collaborated with the Nippon Company (Kimmo, 2022).

The collaboration consisted on a collection confectioned by both companies. They used the patterns of Marimekko, like the one in Figure 13, and the clothes of Uniqlo. Selling this way products known by the customers with the identity of the Finnish brand, because their patterns are the most recognizable symbol of the company.

To obtain more data about the performance of the company in Japan we are going to analyse the global results of the company in two different years. Firstly, the results of 2010, four years after the settlement of the first shop in the Nippon country, and the outcome for 2022, this is, four years after the collaboration with Uniqlo.

Observing and comparing the performance of the Finnish company in 2010 (Figure 14) and 2022 (Figure 15), the difference in results is particularly noteworthy. We are going to set the focus on the dependence of the company from the different markets it is operating.

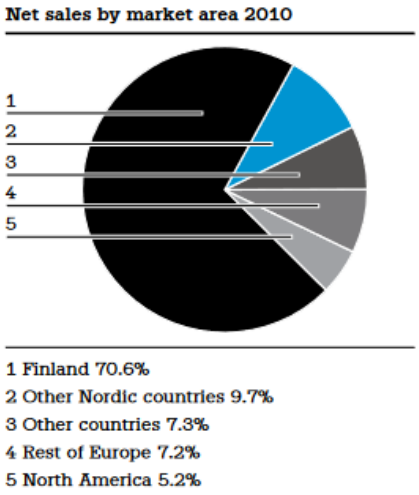

Figure 14 Net sales by market area 2010 (Marimekko annual report, 2010, p.7).

In 2010, the majority of company's sales, specifically 70.6%, came from the Finnish market. This is unsurprising as it is their local market and nowadays Marimekko is one of the symbols of the country due to its association with Finnishness, which is exemplified by characteristics such as closeness to nature, a sense of warmth, simplicity, and the Finnish way of life (Nakagami, 2023).

The remaining portion of their market, comprising 16.9% of the sales, was primarily situated in Europe, with strong support coming from the Nordic countries, which share significant similarities with Finland. Regrettably, specific data for the Japanese market is not provided in the summary. This is because it is involved in the 7.2% for the “Other countries”, as it is not a main market for them during this year which supports the conclusion that the performance of Marimekko in this market was not particularly successful before the alliance strategy.

By the year 2022, there were notable changes in Marimekko’s sales distribution. Firstly, the dependence of Marimekko from the local market decreased, constituting 59% of sales, experiencing a reduction of almost 11%. The percentage for the combination of Europe and

Scandinavia achieved the 18% of the sales. However, the most notable change is the emergence of the Asian-Pacific region, getting the 18% of the sales, when this area was not even specified in the previous figure.

Now, it is the second biggest market for Marimekko. Apart from this, the Finnish company affirms in its Annual report (2022) that Japan is their main market in this area. In summary, the performance in this market and area was considerably enhanced over the twelve years, and the collaboration with Uniqlo took an important paper in the results obtained.

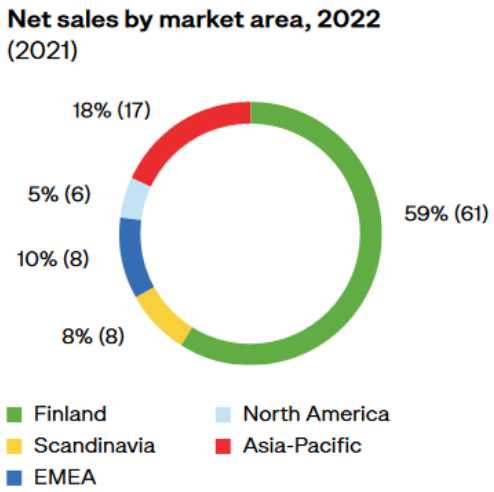

Figure 15 Net sales by market area 2022 (Marimekko annual report, 2022, p.6).

This been said, we are going to give a network perspective for these data and the effect of the alliance generated by both companies to spread the market of Marimekko in the Asia-Pacific area, in Japan concretely.

6.2.2 Network perspective

Once more, the access to the network is restricted as it is private information of companies. Consequently, the conclusions will be drawn based on the results explained in the preceding section and the condensed network drawn in Figure 16.

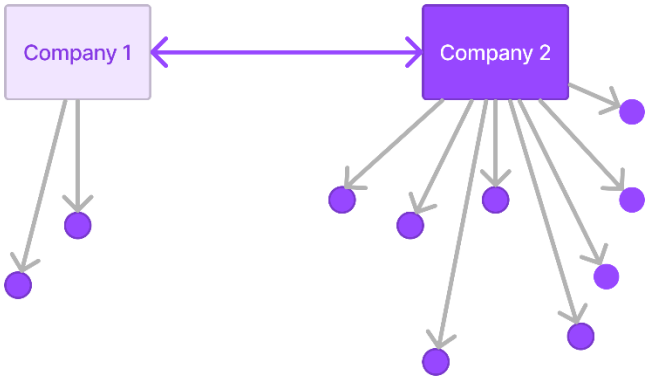

Figure 16 Expansion through another company (own creation)

Figure 16 is a condensed version of the actual network for both companies in the Japanese market. Notably, Marimekko exhibits a lower degree than Uniqlo which is a common occurrence in expansions through alliances. As explained in Section 5.2.3, this indicates that the established company typically has more customers than the foreign one, in terms of networks this means a higher degree.

However, the connection between both companies is undirected. As previously explained in section 5.1.3, both companies are partners or collaborators. Due to this condition, they must share values that the jointly created collection will reinforce to capture the attention of the customers. In this case, Marimekko is assimilating the values of Uniqlo to its brand to call the customers of the Japanese brand into action. This mirrors the situation in case 1 but instead of a celebrity they are incorporating the values of another brand into their own.

As explained in section 5.1.1., directional arrows signify a directed connection. In this context, a directed connection implies that only one node influences on the other. Therefore, similarly to the previous case, customer are still influenced by the companies. Consequently, it can be inferred that the out-degree of Uniqlo is higher than that of Marimekko in this network as well.

Uniqlo, represented by Company 2, is the broker between the other two parties of the network, Marimekko and the customers of Uniqlo. Hence, the Betweenness Centrality coefficient for this node started being high in the short-term but in the long-term, as indicated in Figure 17, it decreases.

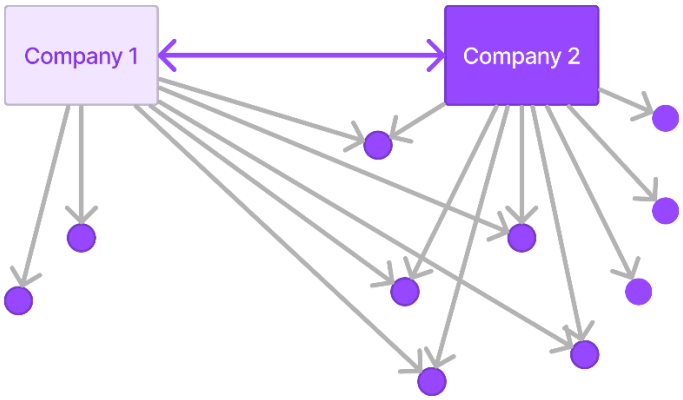

Figure 17 Result of Expansion through another company (own creation).

The result of the Expansion through alliances is represented in Figure 17. This is, Marimekko created its own connections with some of the customers of Uniqlo, increasing this way their client-portfolio. Thenceforth, they did not need Uniqlo as a broker, eliminating the chain created by Marimekko and Uniqlo to connect the Finnish brand with the customers of Uniqlo. This is, they transformed the chain in Figure 6 into a triangle where Marimekko and Uniqlo, each one of them, have their own directed connections with customers.

As a result, the market share of Marimekko increased like it has been illustrated in Figure 15. We have to remember that in 2010, Japan and Asia-Pacific area were not main markets for the Finnish brand and in 2022 they became their second best market after Finland, their home country.

It is also important to emphasise that those positive results for the company do not depend only from one action. They come after the combination of different positive actions that together convince the possible customers to stay loyal to the brand.

Likewise in the previous case, the action gave visibility to the brand which already was offering a qualified product but it was not known by the targeted market. It is also interesting to remember that other facts like Worth of Mouth are important in these strategies to accelerate these processes.

7. CONCLUSION

The general conclusion is that networks are key for the activity of the companies because, as we have seen in both cases, they have direct and indirect benefits for them.

On the one hand, Nespresso case showed that a celebrity could be a useful tool to get the attention of the target market. Even so, the success of this company did not only came from working with a celebrity. They also benefit from the Word of Mouth which was crucial for the increase on their sales. It is not possible to conclude which one of the two phenomena was the most determinant in the performance of the company. What it is possible to conclude is that both facts were essential for the outcomes of Nespresso. It is more, the combination of them was the most intelligent strategy to get such a performance as they reinforce each other. This is, the Celebrity endorsement permitted the company to get visibility in the market and a positive perception of the product, as an actor such as George Clooney is recommending it. The customer is positioning the product as something unique and elegant as he is transmitting the characteristics of the actor to the product. Apart from this, the possible customer is receiving positive feedbacks from people they trust, their close nodes. Then, this combination of positive reviews made new customers try the product and engage them to the brand.

On the other hand, Marimekko significantly increased their sales in the Asian continent. Then, the conclusion is that the collaboration was effective because they chose the correct company to work with. Both companies have similar products and customers, then, the generation of an edge between the customers of Uniqlo with Marimekko was not a difficult mission. Hence, the strategy of Marimekko to increase its visibility in the Japanese and Asian market was strong and successful as they were benefited by clustering. In this case Marimekko created connections with the edges of its connection (Uniqlo).

Anyway, these actions cannot be taken alone. I mean, the effectiveness of the performance of a company does not come for one and only action. There is a Marketing plan behind with different actions and decisions. The whole of these are responsible of the results of the companies.

These actions do not last forever, they have a due date and to assure their success, they need a reinforcement. Nespresso did it with George Clooney by creating new adverts every so often. In the case of Marimekko, they did more than one collaboration with different brands to keep reminding the customer that they exist.

In conclusion, social networks are one of the basis of economics. There are many interactions between companies and customers that generate the corresponding consequences such as profits or actions. Hence, enterprises that understand those interactions faster will understand better the decisions of the customers, and will be able to explode more successfully the opportunities of the market.

8. BIBLIOGRAPHY

[1] Alberich, R., Miro-Julia, J., and Rossello, F. (2002). Marvel universe looks almost like a real social network. Available from URL: Arxiv. [Barab´asi, 2002] Barab´asi, A.-L. (2002). Linked-The new science of networks. Perseus Publishing, Cambridge, MA.

[2] Batagelj V. & Mrvar, A. (2003). Pajek. *Program for Large Network Analysis.* University of Ljubljana, Slovenia, Ljubljana. To download from http://vlado.fmf.uni-lj.si/pub/networks/pajek/doc/pajekman.htm

[3] Bughin, J., Doogan, J., & Vetvik, O. J. (2010). A new way to measure word-of-mouth marketing. *McKinsey Quarterly*, *2*(1), 113-116.

[4] Chaudhary, A.K. & Warner, L.A. (2015). *Introduction to Social Network Research: Brokerage Typology*: AEC535/WC197, 3/2015. EDIS, 2015(3), 4-4.

[5] Chiba, M. (2020). *Japan Market Entry Strategy: case study: Myssyfarmi Oy.*

[6] De la Fuente, M. D. (2023). *Análisis de la Topología de las relaciones entre Bancos y Firmas mediante Redes Complejas: comparación del caso de Argentina e Italia.*

[7] Erdogan, B. Z. (1999). Celebrity endorsement: A literature review. *Journal of marketing management*, *15*(4), 291-314.

[8] García-Canal, E., Duarte, C. L., Criado, J. R., & Llaneza, A. V. (2002). Accelerating international expansion through global alliances: A typology of cooperative strategies. *Journal of World Business*, *37*(2), 91-107.

[9] Gestal, I. P. (2018, 27 noviembre). Uniqlo 'hace caja' en Europa: entra en beneficios en plena oleada de aperturas. *Modaes*. https://www.modaes.com/empresa/uniqlo-hace-caja-en-europa-entra-en-beneficios-en-plena-oleada-de-aperturas

[10] Goi, C. L. (2009). A review of marketing mix: 4Ps or more. *International journal of marketing studies*, *1*(1), 2-15.

[11] Hove, I. (2019). The impact of celebrity endorsement on brand image at Nash. Retrieved from http://liboasis.buse.ac.zw:8080/xmlui/handle/123456789/10991

[12] Huergo Cornejo, M.T. (2014). Caso Nespresso: análisis de una propuesta innovadora.

[13] Jackson, M.O. (2008). Social and Economic Networks*. Princeton University Press.* JacksonChapter1.pdf

[14] Kimmo, M. (2022). Pandemic survival for companies: how did Marimekko survive the COVID-19 pandemic?.

[15] Kovářík, J., Brañas-Garza, P., Cobo-Reyes, R., Espinosa, M. P., Jiménez, N., & Ponti, G. (2012). Prosocial norms and degree heterogeneity in social networks. *Physica A: Statistical mechanics and its Applications*, *391*(3), 849-853.

[16] Loureiro López, S. (2015). Nespresso: evolució i imatge de marca.

[17] Marimekko History – Marimekko as a company | We as a company. (2024) https://company.marimekko.com/about-marimekko/history/

[18] Marimekko annual report (2010) *https://company.marimekko.com/app/uploads/2017/12/Annual_Report_2010.pdf*

[19] Marimekko annual report (2022) https://company.marimekko.com/app/uploads/2023/03/Marimekkos-year-2022.pdf

[20] Moen, Ø., Bakås, O., Bolstad, A., & Pedersen, V. (2010). International market expansion strategies for high-tech firms: partnership selection criteria for forming strategic alliances. *International Journal of Business and Management*, *5*(1), 20.

[21] Nakagami, A. (2023). The Country That Is Everything We Dream Of" Representations of Finland in. *Comparative Education Review*, *54*(1), 51-75.

[22] Nescafé. (2024). Historia de NESCAFÉ®.https://www.nescafe.com/pe/historia-de-nescafe

[23] Newman, M. (2018). *Networks*. Oxford university press.

[24] Oxford Learner's Dictionary. (2024) *Geodesic adjective - Definition, pictures, pronunciation and usage notes.* Oxford Advanced Learner's Dictionary at OxfordLearnersDictionaries.com. https://www.oxfordlearnersdictionaries.com/definition/english/geodesic?q=geodesic

[25] Oxford Learner's Dictionary. (2024) *Node noun - Definition, pictures, pronunciation and usage notes.* Oxford Advanced Learner's Dictionary at OxfordLearnersDictionaries.com.https://www.oxfordlearnersdictionaries.com/definition/english/node?q=node

[26] Rivera, C., Arellano, C., y Molero, A. (2009). Conducta del consumidor: Estrategias y políticas aplicadas al marketing (2da ed.). Madrid - España: *ESIC Editorial.*

[27] Scientist, F. R. S. D. (2023). The degree centrality algorithm: simple but powerful. Graphable. https://www.graphable.ai/blog/degree-centrality-algorithm/

[28] Soffer, S.N. & Vazquez, A. (2005). Network clustering coefficient without degree-correlation biases. *Physical Review* E, 71(5), 057101.

[29] Sulla, A. E. G. (2021). Comportamiento del consumidor y su proceso de decisión de compra. El nuevo camino del consumidor. *Gestión en el tercer milenio*, *24*(48), 101-111.

[30] Üstüner, S. G. (2015). Innovation in Textile Design: A Case Study of Marimekko. In *International Textiles and Costume Congress, Istanbul, Turkey*.

[31] Zhang, J. & Luo, Y. (2017). Degree centrality, betweenness centrality, and closeness centrality in social network. In *2017 2nd international conference on modelling, simulation and applied mathematics (MSAM2017)* (pp. 300-303). Atlantis press.