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This is the accepted and refereed manuscript to the article published in Industrial Marketing Management, 45(2015)February:207-217

Publisher's version available at http://dx.doi.org/10.1016/j.indmarman.2015.01.009

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# THE ROLES OF MONEY AND BUSINESS DEALS IN NETWORK STRUCTURES

#### **Abstract:**

In this article we attempt interpreting and conceptualizing the roles of monetary processes and business deals in relation to IMP methodology and theory. This suggests that we have to separate the way the money is handled. We point to the need to analyse the specific situations within which money is involved as "deals". Each deal has its own history as it is a construction of two interacting firms that are influenced both by the joint social-material value creation processes and the specific features of monetary flows and appropriations of gains and losses that result from these interactions. The money distributive dimension should not be seen as a parallel activity layer of such business interactions - such as we may interpret accounting - but should be seen as a different, related network. We use a single case study to extract interpretations of different deals and deal-structures and use these to discuss the particularities of deals, their various roles and functions, and finally also how we may proceed to better study and theorize the roles of money in relation to IMP network theory.

## 1. INTRODUCTION

Industrial network theory is based on the separation of three interrelated layers: activities, resources and actors. Much research has been done on these three layers, how they function and how they are related. For example, innovation issues have been related to the use and interaction of different technical resources. However, one specific resource has not been as central as one might have expected. This is the monetary resource and the specific activities performed by different actors in order to handle this resource. Of course this aspect has in general been dealt with as a typical outcome of the interactions (e.g. Håkansson 1989), but it has never been investigated as a specific resource with its own unique characteristics.

The objective of this paper is to make a first attempt at interpreting and conceptualizing the monetary processes in IMP methodology and theory. This includes an identification of special issues related to the fact that money is a particular kind of resource that might have several different roles in the development of the industrial network. The industrial network research tradition has, over the last four decades, contributed to our understanding of how economic values are created through complex social and material interactions while the fundamental roles and characteristics of money, financing, appropriation of monetary gains, etc. have not received that much attention.

We believe that what is needed now is a study of the roles of money as a resource of its own kind, such as its roles in the constitution of economic organizing and inter-organizational collaboration, its role as the material content of financial flows, payments and revenues, and its role as a core target in battles over the allocation and distribution of monetary gains and losses from interacted value-creating business activities. In what ways is money different from other kinds of resources and how should we conceptually see money – in this fundamental and real sense – as interacted with the other social, material and creational interactions of the business networks we have studied?

We believe that - with the deliberate focus on the material and the social realities of the economy that has been core to the empirically, often almost anthropologically oriented IMP research tradition - it has been both necessary and productive to defend and protect the analytical approaches applied from being flooded by conventional economic theories where conceptions of money - and the roles of money in various contexts - are core, pre-defined and powerful. To investigate how things actually work, it is sometimes necessary to insist that different analytical conceptions must be developed, applied and shielded from whatever are the dominant views of others, in order to explore and make sense of realities in particular dimensions and new ways.

However, the lack of inclusion of monetary issues in most industrial network studies also indicates that it has not been easy to contribute productively to money-related theorizing by simply using the same conceptual models that we use to analyze social-material interactions in economic and business settings. Something appears to be significantly different with money - as a resource, as an activity-layer and as a relational layer between actors - that has made it difficult to grasp it, to investigate it and to theorize it in similar ways.

We argue that the time is ripe to embark on the challenge of focusing more directly on money in relation to industrial network analysis and theorizing, in order to explore with more focus on how the interacted economy actually works. By explicitly bringing money as a particular kind of resource into industrial network theory, we hope to be able to stimulate research that looks more deeply into a number of issues – such as the problems of appropriation of collectively created economic values and/or the problems of distribution of such values in interacted networks. All these topics are of vital concern to business practitioners operating in steadily more networked landscapes that are raising a number of highly demanding challenges to managers, policy makers and regulators. Being experts on the understanding of these networked economies also necessitates a deep concern with their economic and political implications for welfare and distribution and for society as a whole.

We will embark on this analytical voyage inductively by starting in one single, illustrative case study to extract a few fundamental ways social-material networks and money appear to be related, assuming, from the basis of numerous industrial network studies, that this relationship is not a simple, straight forward one (Axelsson & Håkansson 1979, Håkansson 1989, Håkansson, Ford, Gadde, Snehota & Waluszewski 2009). The selected case regards a Norwegian software company, Opera Software Co. In this case we found that the company appropriated most of its financial revenue streams and profits from one type of actor while its main contribution to user-oriented value was in relation to another type of actor from whom it appropriated almost no financial revenues at all. This simple, and we believe quite typical observation, indicates that the relational structures of the financial revenue flows are not necessarily mirroring the major social-material value creation processes and network patterns. In other words, one critical characteristic, and therefore also one major reason for this research, is that the money distributive dimension is not mirroring the social-material structure that delivers user-value or other economized outputs to the involved actors. It is a different, but related structure.

#### 2. THEORETICAL CONTEXT

The particular roles of money in business networks that we are interested in will be seen in relation to the interactive approach to business studies within industrial marketing and purchasing

theory (IMP). This approach can broadly be seen as rooted in a critique of some of the fundamental assumptions in economic theory, a critique that goes a lot further than, for instance, the critiques given by the Asymmetric Information School (Akerlof, 1970; Spence, 1973; Stigler, 1961), the Transaction Cost School (Williamsson, 1981, 1985) or the Search Theory School (Stigler, 1962; Mortensen, 1986; McCall, 1970) that represent different modifications of the rationality, independency and full information assumptions in market economic theory. Contrary to these, IMP holds a fundamentally relational view of the economy which is rooted in a different understanding of knowledge and value creation in society. It argues that we may not have knowledge of a phenomenon unless we have been or are somehow related to it (Håkansson et al, 2009). The immediate analytical consequence of this perspective on knowledge is that relationships and interactions are necessary requirements for all meaningful economic activities, and that we always depend on others and their knowledge to transform knowledge into economic value. As such, its understanding of knowledge has close affinity with the Constrained Rationality School (March & Simon, 1958; Simon, 1957, 1991; March, 1994). The understanding of knowledge as fundamentally relational is essential to the understanding of economic value and of how it is created through interactional processes that co-evolve the expansion and distribution of knowledge and economic value. The IMP economic approach departs from this basic acknowledgement of the fundamental role of interaction processes for both knowledge and economic creation to be possible. Without interaction there can be no actual economic resources, no real economic activity, no meaningful economic actors, and accordingly no economic value creation. No business can be an island (Håkansson and Snehota 1989), and the IMP tradition has accordingly been deeply concerned with the study of the business networks that are the outcomes of extended interactions over time. These are the core "acting and being acted upon" subjectobjects in its theory of the economy.

One early and repetitively important result in IMP research is that business relationships to a large extent are informally related (Håkansson 1982, Håkansson & Johanson 1987, Håkansson & Snehota 1995). The companies live together and handle many issues without formal agreements. A point of departure for raising a question about the roles of money in such economic structure can be to focus on processes where economic transactions between actors are being established, up-dated or revised. When two parties have aspirations to improve their value creation activities and constructively engage with one another, they need to establish some initial

agreement (often informal) regarding what the two parties will contribute to the value creation activities, and how the economic results shall be distributed between them. However, as soon as they exchange money in this interaction they need a legally binding contract supported by the state legal system – it can be an agreement for buying some products or some services. In this case there is money specified in the agreement. We suggest using the term "deal" to name this kind of money-agreement that is a result but also an influencing factor for economic interactions between economic actors. These deals are part of the total process and they can probably have quite different roles in different interaction processes. Given the uncertainties, these deals are both problematic to formulate and difficult to handle, which can be seen in terms of the use of informal regulating mechanisms in most relationships. (Håkansson 1982, 1989 and Håkansson & Snehota 1995)

The problems of formulating deals can be seen in the controversies over identifying a right "price" in many seller-buying interactions (Gadde, Harrison & Håkansson 2002, Anderson 2004). Deals, accordingly, play a role in an interactional theory of the economy but they are not necessarily the foundation of relationships. They provide for an ordered interface between the engaged economic actors in certain specific dimensions, but are not the basis on which the actors exploit one another's resources, knowledge and activities in joint or otherwise interdependent value creation efforts. They are only one aspect of the way the involved actors share the collective results of these efforts. Hence, to negotiate and re-negotiate deals with others is one among other important economic activities in any business. Similarly, there are other important activities related to deals, such as: to seek to improve the structure of the deal, to move others to contribute more and to reduce their claims for the collective gains created, to combine the deal with other deals with somebody else and to use that combination to influence other actors. The deals are what establish the basis for monetary transactions. Hence, deals represent a specific type of "unit" in networked economic activities that also is related to a larger necessary infrastructure for monetary transactions, accounting and other monetary aspects of economic life. They facilitate the ordering in some dimensions but they can also be negative factors for the more general value creating process they are part of. This has been one part in the substantial work that has been done within the area of accounting in networks (Håkansson and Lind, 2004; 2007; Håkansson, Kraus & Lind, 2010; Lind and Strömsten, 2006; Baraldi & Strömsten, 2009). Accounting is about the monetary value dimension of economic resources, activities and actors

and is core to whatever has to do with measurements, calculations, evaluations and representations of economic value in monetary terms, including of course the notion of profitability based on shared, acknowledged accounting standards. Accounting, in its essence, is the making of value mirror images of any given economic activity and can therefore always be seen as a particular dimension of social-material economic activities and thereby also as a particular kind of activity layer of any given business network.

The fact that the relationship between value creation and appropriation is fundamentally rooted in deals implies that there is no obvious or necessary relationship between them – in any given case. This relationship actually is an empirical question to be investigated concretely.

There is also reason to expect that the effects of a single deal on value creation and appropriation is not a simple one, as a single deal will always be related to other deals, often extending to multiple financial and industrial networks. So, to study the roles of money suggests following the networked deal structures and focusing on the processes through which these are being upgraded, re-structured, extended or de-coupled, and the outcomes of such processes in terms of user oriented value creations, appropriations of gains and distributions of losses.

Deals are also critical to innovations of all kinds. Mental creative processes and their distributive and interacted social communications are continuously offering propositions for new value creation initiatives and activities that, in order to materialize, need to get access to necessary resources, activities and actors. This can usually only be done through interacting with resources, activities and actors that are already engaged in other durable deal structures, be it within organizations or in relation to other organizations. In both cases, to mobilize financial resources and financial interaction processes is critical to the ability to actually move such resources, activities and actors to engage with and to pull off value creation processes in which these new propositions may be tested in the real economy. Hence, deals based on such propositions that mobilize and move financial resources in order to involve and engage other resources, knowledge, activities and actors are critical components of any new value creation process – of any kind.

We accordingly suggest investigating a deal in how it affects, and is an outcome of, a business relationship. How the deal establishes and formats the interfaces of the parties in relation to each other and in which dimensions and how the specified obligations and the reward agreements affect the productivity in the value creation process. Furthermore, we want to

investigate how the deal establishes the foundational requirements needed for the parties to transfer assets, money and debts between each other in an orderly fashion and how this affects efficiency and security. Finally, in focus is how a deal is related to one or more other deals as "a networked deal" and creates more extended networked deals beyond those that are directly identified in the given analysis which will be referred to as "deal structure".

We shall now present the Opera Software case that contains a discussion of three different but related deals. Based on these, we will in the next step extract some further insights into the roles of deals and money and their relationships to the social-material interaction processes that create value for different customers and users of the company's technology.

#### 3. THE OPERA SOFTWARE CASE

The research has been carried out as an explorative and empirically grounded case study (for a detailed description see Svendsen et al 2014). Based on the case approach, the purpose of the research was to document and analyse the development of one company (Opera AS) in Nigeria based on rich empirical, context-dependent data.

Interviews were the main *data* source. Nineteen informal and semi-structured interviews were conducted with Opera employees, users of Opera's products and Nigerian experts. The interviews were carried out face-to-face when possible, and through video conferencing, utilizing Skype and Opera Software, when practical circumstances such as distance and time dictated it. The interviews were primarily recorded and transcribed, with only a few exceptions where detailed notes were taken instead.

To understand the context of the case, the study was based on a mix of informants. Some are Nigerians or other Africans who can explain regional matters and affairs with the insights and limitations of their native backgrounds and local presence. Others include Nigerian expats who relocated to Norway and have been abroad long enough to see their own country from the outside, and some Norwegian experts.

User statistics provided by Opera Software were also included. Numbers documenting user uptake and growth in Nigeria, the most popular web sites visited by the users, handsets used and data consumption are some examples.

Secondary data and documents were used to complement and verify the primary sources. Annual reports, financial reports, quarterly reports and press releases from 2000- 2012 were used. Opera also publishes a monthly report called the State of the Mobile Web (SMW), which also proved valuable to verify facts. These reports were used to get a picture of the basics of the organizations, its history and growth, and served as useful background data when interviewing employees from Opera HQ.

# 3.1. Opera Software

Opera Software is a Norwegian company producing and supplying compact web browsers. The company was established in 1995 by two managers who had previously been working for Telenor, the major Norwegian telecommunication company which today is primarily a global mobile phone operator. Opera Software was permitted to take over and continue a web browser project that Telenor terminated as it did not fit with the company's priorities at the time. Opera Software continued to develop the technology and launched its first web-browser in 1996. A web-browser is a software application necessary to navigate, to search for and locate content on the Internet and to display information on the device. In the year 2000 Opera experienced a commercial breakthrough with the browser Opera 4.0 for Windows. This browser was downloaded more than 1 million times the first month after launch, and Opera thereafter quickly became the third largest browser supplier in terms of number of users, behind its well-established American competitors, Microsoft's Internet Explorer and AOL's Netscape Navigator.

At the end of 2011, Opera had 777 employees, 897 MNOK in revenues, and reached 142 MNOK in yearly profits. The company offered a selection of free web-browser products. (Opera Software annual report 2011). The four main browsers were:

- Opera for Desktops, first launched in 1996, intended for personal computers. Reached 60 million users in Q1 2012.
- Opera Mini, first launched in 2005, intended for basic feature phones with Java script technology. Reached 169 million users in Q1 2012.

- Opera Mobile, first launched in 2008, intended for smart phones. Reached approximately 25 million users in Q1 2012.
- Opera Devices Software Development Kit (SDK) was delivered as a solution for Original Equipment Manufacturers (OEMs) of devices since 2005, intended for a variety of Internet devices, such as TVs, game consoles and tablets (Annual report 2005).

# 3.2. Opera Mini

The company has in particular been successful with the browser "Opera Mini" which is attractive to those using mobile phones to connect to the internet. In Telenor, the product was developed in relation to one particular customer but failed to meet the objectives of the partnership project. The output of that process, however, was a technological solution that served as the input to the version that was further developed through several versions and finally launched as Opera Mini in 2005. Through the use of a unique server application between the handsets and the internet sources, the volume of data to be handled within the mobile phone itself was reduced to only 10% of the total data traffic volume that could effectively be operated by the phone, as the specialized server took over handling the other 90%. The result was a radical improvement of the capacity to handle large internet data volumes by small mobile phone handsets.

Figure 1: Illustration of Opera Mini 7 Smart Page



# 3.3. Opera Mini in Nigeria

Opera Mini was first released in Norway in 2005, but it achieved moderate success with only a few thousand downloads. In 2006, it was released globally and grew slowly but steadily for a while. Then it suddenly exploded in such geographical areas as Russia and Indonesia, and later in Nigeria and other emerging or developing markets. The adoption and growth rates in these emerging markets were surprising because Opera had neither employees working in these areas, nor any marketing campaigns or other activities directed towards these users. In fact, these potential markets were not even on the company's radar at the time; the US was a particular area of focus drawing most of the investments, and operational and financial resources were poured into this region. But it proved difficult to gain a strong foothold there. All the major competitors - Chrome, Safari, Internet Explorer and Mozilla - were located like pearls on a string along the US West Coast from Canada in the north to Mexico in the south, making it difficult for Opera to find sufficient consumer-spaces to expand more rapidly.

One important reason for the success in developing regions was due to early cooperation and an agreement with Nokia, which installed Opera Mini as a standard on several of its mobile phone models. Suddenly, and surprisingly for Opera, in 2008 the company learned that it had got a large number of users in Africa and especially in Nigeria. All these users used Nokia mobile phones. The reason behind the increased use was that this browser functions exceptionally well

on tiny micro computers such as mobile phones. The browser is technically designed to optimize the use of the internet through a rather simple mobile phone connected to ordinary telecom infrastructures. The positive development continued and in 2012 the company had more than 10 million users in Nigeria providing for a market share above 70 %. Just like in the rest of the world, the main use of internet in Nigeria was related to Facebook and other social media sites. However, none of these users were paying anything to Opera. The browser was either preinstalled by Nokia or it could be downloaded for free.

#### 3.4. Customers that are not the users

All the Opera users had to pay for their communications through the telecom networks to some telecom operator. These operators were accordingly potential "buyers" of additional web-browser services from Opera, even though the users, as we have already noted, could download the Opera Mini basic program for free.

However, operators were interested in software that could increase the use of mobile phones in all kinds of ways. This meant that they could become interested in establishing some form of co-development with Opera where the use of Opera Mini was further developed and made more efficient in relation to the use of the operators' other systems. It turned out that a couple of them could actually be convinced to enter into more extended business relationships with Opera. The outcomes of their negotiations were contracts that defined and secured mutual obligations to contribute and deliver as well as agreements regarding the distribution of economic rewards from the joint projects. In this way the operators became both the distributors for, and the customers of, the upgraded Opera browsers in Nigerian rural and urban society.

## 4. THREE SITUATIONS WHEN VALUE CREATION AND MONEY MUST MEET

The Opera case is intriguing as it invites observation of the single company within a complex business network with a monetary and financial perspective and focus. There are several situations in the case where it is obvious that the company has to find a special way to economize on the value creating process. Here we will focus on three such situations. The first is when the

company was established, the second concerns the business relationship with Nokia that resulted in Opera Mini being preinstalled in new mobile phones, and the third focuses on what happened when Opera had to develop relationships with the operators in order to tap into the using of its web browsers and establish revenue streams from the use.

# 4.1. The establishing of Opera Software

Opera is a company born out of a development project that came to a halt in 1994 in a large company (Telenor). Telenor decided to terminate the project as it did not fit with its priorities at the time, despite the fact that it had produced some interesting results. Two managers; Jon von Tetzchner and Geir Ivarsøy, who had been central in the development project decided to leave Telenor. Based on a permit from Telenor to take the project with them out of Telenor, they established a separate privately owned company in 1995. Their ambition was to continue the development project, and due to all the work that had already been done, they managed to launch a first web-browser already in 1996 (Opera Software annual report 2000).

This is a not a very unusual birth process for high tech companies. Its establishment as an independent company came much later than the birth of the idea or the starting up of the technology and the business development process. The new company did not pay the costs of the already made investments, which of course reflected the fact that Telenor had already decided to abort the project and in this way write off the investment. Sometimes the companies doing the early processing in these situations become share holders or can be very important as customers or suppliers for the private startup company. More often, the new company develops independently based primarily on the more and less formally acquired technology platform and/or the experiences and personal networks of a few individuals.

So, the two managers established a separate company based on the material input of a semi-developed technology and their own personal resources and networks – and headed off to obtain external funding to build a business for themselves. We can also note that the initial agreement that led to the establishing of the firm and that constituted its major resource base was in fact a more or less informal deal with Telenor that the two managers could take proprietary control over the technology and move it out of Telenor. If Telenor had decided to pull off the project, for instance as a corporate subsidiary, the story of this Norwegian software program would have evolved very differently. For instance, if Telenor were to expand the new business, it

would have required the use of corporate financial resources obtained from its market revenues. As it happened, however, the two founders had to obtain private equity financing to further develop the technology, and at the same time rush off to establish some kind of early revenues from product sales in order to defend their proprietary controls from being diluted by new financial investors.

# 4.2. The relationship with Nokia

In the annual report for 2011 it was reported that 40% of all Opera Mini users were related to OEM pre-installations and distribution. Important OEM partners included companies like Nokia, Samsung and Huawei. It is also noted that, originally, the OEMs had paid a license fee for using Opera Mini as part of their integrated solutions on the mobile phone devices, but lately Opera had changed its focus from seeing OEMs primarily as a source for generating financial revenues towards seeing them much more simply as contributors to obtain expanded distribution of the browsers. This change in view obviously reflected the fact that, at this point in time, its Nokia agreement was not easy to re-negotiate, while the rapid expansion of users seemed to open up other, additional opportunities for the company to develop its business.

The importance of Nokia in relation to Nigeria is presented in Table 1.

Table 1: List of the top 10 handsets used for accessing Opera Mini in Nigeria, September 2008 (SMW 2008/09).

No	Handset	Series	No	Handset	Series
1	Nokia 311c	S40	6	Nokia 3230	S60
2	Sony Ericsson K750i	N/A	7	Nokia 6300	S40
3	Nokia 2626	S40	8	Nokia 5200	S40
4	Nokia 6070	S40	9	Nokia 2600c	S40
5	Nokia N70	S60	10	Nokia 2630	S40

Here we see an interesting relationship between two complementary producers. The mobile handsets become more useful and therefore more attractive when there were useful programs

installed when they were being sold. At the same time, the producers of the handsets typically can or will not pay much for this adding of programs as they do not know how useful each of these programs will be for different users or if they will in fact trigger more sales. Accordingly it is highly uncertain at that point in time how much added value they will contribute. The case also shows that it was only in some special and rather unexpected countries that Opera Mini turned out to be extensively used.

At the same time, Opera Software had been eager to establish some early revenues to support its continued development work aimed at making it big on the US market. Establishing license agreements with OEMs that covered less interesting markets that the company was not targeting anyway, was obviously an easy decision to make in the given circumstances. The license contract secured certain but limited revenues without giving substantial revenue upside potential for Opera, which did not matter much as the expected major upside opportunities for the company were identified and expected elsewhere.

This situation is also rather typical for industrial companies. Often products or systems are complementary and highly dependent on each other. It can be very difficult to conclude on a monetary evaluation of the potential economic contribution of each of the elements in such combined products. For Nokia and Opera to arrive at the "right" value would require a very comprehensive study and it would still be difficult ex ante to arrive at something that would capture the added value of this interdependent product.

Opera was also focusing on another aspect. It was viewing the OEM producers as a means to also obtain wider distribution – to get as many as possible to use and learn about Opera Mini in order to build a position based on volume. Given its weak negotiating position vis a vis Nokia at the early stage of this process, given its limited knowledge of development markets and their potential use of Opera's programs, and given its ambition to raise money through early limited licensing, Opera chose to accept the low revenue contract and to appreciate the Nokia agreement as a means to generate "free" expansion needed to obtain a position where volume matters with regard to your ability to become relevant as a partner for other actors in the industry.

#### 4.3. The use of the web-browser

The use of web-browsers is free. This means that the 11 million users in Nigeria are not paying anything to Opera when using the Opera Mini browser. Their customers have to pay a fee to

download the web-browser if it has not been pre-installed by the mobile phone producers. But this is a very difficult way to appropriate substantial revenues. Thus, Opera had to find another way to obtain revenues from its large number of users. There were two possibilities. One was to put advertising possibilities into the web-browser functionality in order to build and grow an advertising business on the Opera Mini platform. This proved to be a difficult and time and resource consuming alternative.

The second opportunity, and the one chosen by Opera, was to approach the mobile operators who were benefitting from the extensive use of the web-browser. The more it is used, the more time the user will spend on it, which will be charged by the operators. Opera managed to approach the operators by offering them a special service based on a technical solution that facilitated and made the use of the web-browser more efficient for the users. This increased the use of the web-browser while at the same time using less of the operators' resources. But it was certainly not an easy task, and it took Opera quite some time to develop these solutions and convince a couple of the main operators to enter agreements that made them pay for the additional services.

This situation is similar to the second situation above as it is focused on exploiting some indirect effects of a certain activity, because these effects might sometimes be easier to charge for than the direct effects already settled in established deals. However, the web-browser is related both to the handsets produced and marketed by the OEMs – as shown above – and to the telecom operators selling time on established lines or channels.

What can be observed from these events is that the surprising growth in the use of Opera Software's browsers in developing countries permitted Opera to develop additional value creating activities in order to engage with a different kind of involved actor than those it had already settled agreements with. They never managed to re-negotiate established agreements, but focused on developing additional solutions and services in order to expand their business network in relation to the Nigerian market.

#### 5. ANALYSIS

The Opera example illustrates that the heterogeneity of interactions makes them difficult to simply translate into financial flows that fully reflect the actual value creation processes. Such translation can neither be a derivative nor a true value mirror image of such a process, but rather

appears to be an outcome of complex interactions and negotiations which over time produce a set of deals which in turn affects the participants with regard to how they interact. The deals are just formal units within the total interaction process which determines that a specific actor receives some share of the financial gains (and losses) from its outcomes. New solutions and offerings must find ways to establish deals with others in order to be fitted into the existing structures of activity and to function in relation to the dynamics of existing value creation processes as well as to be a part of the deal structures that format and facilitate the associated financial flows.

Based on the three situations presented in this case, we will now turn to the main objective of this paper – which is to try to interpret and conceptualize the monetary processes in IMP methodology and theory. We start by focusing on the roles and functions of business deals in relation to organized business collaborations.

## 5.1. Deals as fundamental components in economic collaborations

In all the three situations presented, the establishing of monetary agreements between involved actors is at the core of the stories. We have chosen to introduce and to use the term "deal" to represent these agreements, as the term associates with something that is voluntarily negotiated regarding what the parties shall contribute and what they will receive in return from activities addressed by it. The deal typically includes judicial, economic and operational elements that are put in place by the actors to arrange for specific parts of the total interaction. It becomes a legal, governmental and financial infrastructure for some part of the collaboration over time. The "deal" represents what the parties coming together at that time can specify and agree upon as part of their collaborative arrangement expressed in judicial and economic terms. It regulates a part, but often not at all the total relationship, including the social-material activities and resources.

The three situations we have identified in the case are different examples where the interface between the socio-material interaction and the monetary dimension has been made distinct and thereby easy to describe and analyze. In the first situation we observe how specific already existing deals are influencing the ownership of an enterprise which is defining the rights of the owners to control and govern the activities of the firm and to receive the economic results from its efforts. In the second situation we observe effects of an established business deal in a changing and unpredictable world. And finally, in the third situation, we see the formatting and establishing of additional deals with other actors that build on the deals that were already in

place. Together they form an interrelated network of deals across multiple actors that are all doing business through the same technologies and users and that are expanding their deal-structures to take advantage of additional opportunities that are revealed over time.

When conducting the further analysis, we will start with the second situation as this represents a "typical" situation in business networks particularly relevant to the IMP tradition. Subsequently, we will move our attention to the last situation, before returning to the first one about the establishing of economic ownership and of monetary interactions.

#### 5.1.1. A business deal

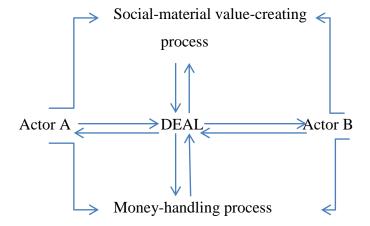
In the Opera Mini case we observe that the creation of deals regarding the monetary dimension is based on multiple interactive value creating processes as also earlier IMP research has concluded (Håkansson 1982, Håkansson & Snehota 1995). It was through the interactions with the first customer (that ended in no commercial deal) that the Opera team eventually developed something that became valuable - the Opera Mini. And it was through interactions with Nokia that the company later got a large number of users in Africa despite the fact that Opera itself had done nothing there. The revenue effects were outputs of activities performed by others in the network (Håkansson & Snehota 1995, Håkansson et al 2009). Consequently, the real value to users that were the basis for these revenues were outcomes of complex and extended value creating processes by partner-actors capable of developing and marketing in very particular locations and situations. This is fundamentally about "the real economy" - the social-material value creation activities that are performed within the constraints of actual time and space. These processes are highly diverse, complex and multidimensional, which makes them impossible to describe in precise ways in deals or other formal contracts (Håkansson & Lind 2004). The deal is accordingly limited to just a few variables, in this case, for example, to the transfer of the right to use Opera Software's technology on Nokia mobile phones in the exchange for an ex ante agreement upon price. Based on this deal, Opera Software later became dependent on Nokia for its ability to interact with the actual users of the Opera Mini software program.

The establishing of a business deal in the form of a license agreement with Nokia was part of a broader cooperation with several OEMs. This permitted Nokia to install Opera Mini on its mobile phones for a license fee and to distribute these phones in markets outlined in the deal. From this arrangement Opera Software received some money to cover some of its operational

and development costs. The deal with Nokia was probably not at all seen as core, not for Opera nor for Nokia at the time. The positive effect for Opera Software was primarily to contribute to the financing of technology and business development that hopefully would contribute to building a position as a substantial player - especially in the US market. However, as a result of the early deals with the OEMs, almost all the monetary outcomes from the later success of the Opera Mini browser in countries like Nigeria were obtained by Nokia, as the OEM-provider, and by the telephone operators in those countries. As it turned out, the initial deal cemented a networked appropriation of the monetary flow that for the most part excluded Opera Software from monetary gains from its substantial and growing contribution to the actual value creation process. However, on the positive side, Opera had obtained a large number of users, and these were, of course, valuable even if they did not pay anything to Opera for their use of the software. Hence, the deal - rather than the value contribution and creation process itself - decided how much Opera Software eventually gained from the activity in monetary terms.

If we look at the problem more in principle (see Figure 1), the two actors A and B (such as Opera and Nokia, or Opera and an operator in Nigeria) are involved in two types of processes. One is the value-creating process and the other the money-handling process. The deal is the arrangement in between that is related to the roles of the different actors in each of these two processes - and that affects the interactions and can be seen as an attempt to translate between the two processes with respect to each of the actors.

Figure 1. Deals in between value creating and money-handling processes



From these observations, we suggest that business to business deals more generally can be seen as negotiated agreements in between the social-material activities aimed at collective value creation processes on the one hand, and on the other hand the associated money-handling processes in which economic value has become a homogeneous monetary resource; money.

#### **5.1.2.** The deal and the network

The third situation in the case illustrates the possibilities to create additional deals as a result of the developments in other relationships (Håkansson & Snehota 1995, Håkansson et al 2009). The case shows that Opera was highly involved in the value-creating process but had a much more peripheral role in the money-handling process. The operator was involved in both, but had the more central role in the money-handling process. The limited role of Opera in the money-handling process severely constrained the company's ability to appropriate a larger share of the money gains. The solution to this chosen by Opera became to try to help the operators get even better positions within the value-creating process. By doing this, Opera managed to get a couple of the operators to share their central position in the money-handling process. Together the two parties (Opera and each of the operators) formulated another deal, regarding Opera's additional technology support for the operator, and the monetary rewards would be shared between them.

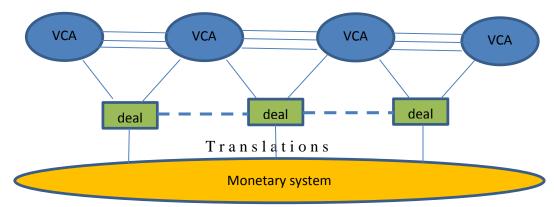
This illustrates a continuous process of expansion of the infrastructures of co-operation and collaboration that permits the companies to expand their businesses and their opportunities to gain monetary benefits in relation to the technologies, products and services they already control. (Ford et al 2011). Established business deals are negotiated and structured at certain points in time thereby building on the existing infrastructures and interfaces. These deals reflect what the parties know and are able to agree upon at the time. As the economic landscape evolves, however, both knowledge and circumstances change and the actors move on to seek to take advantage of discovered new opportunities, given the deals that are already in place that constrain what more they may actually do (Håkansson et al 2009). Hence, new deals regarding the same business domain add to existing business deal structures by extending them further to facilitate additional technology, product, service and business organizational developments, and to distribute appropriated money gains from these added activities. The financial and monetary flows from a range of users using interdependent technologies, products and services,

accordingly follows the complex legal structures represented by the evolving networked deal structures. Consequently, in all business networks interactions take place continuously regarding possibilities to design and formulate new deals, to combine activities or resources in new ways or to distribute or redistribute the monetary gains.

At the level of networked deal structures it appears that they come to serve as interlinked infrastructures for social-material value creative interactions as well as monetary transactions, but more interestingly, they work to interact highly heterogeneous social-material networks with what appears to be a much more homogeneous financial network that may be associated considerably more with a functional system than with networks. The abstract and simplistic character of monetary value appears to make monetary networks different from social-material networks. This concept is illustrated in figure 2 below.

Figure 2: Networked deals as a means to connect heterogeneous social-material value creation networks with a homogeneous monetary system

Value creation activity network with resource, activity and actor layers



#### VCA = Value Creation Activity

A deal can, accordingly, be seen as a sub-process of translation in between heterogeneous social-material networks and the financial/monetary system where the core resource is homogeneous and the "meaning" therefor much more system-like. Networked deals may thus be interpreted as judicial and economic constructions at the interfaces of different actors that are translating

heterogeneous interactional processes into homogeneous calculus, comparative measurements and monetary flows (Håkansson & Lind 2004).

#### 5.1.3 The deal and the distribution of control and economic results

Let us now turn to the last of the three examples of deals in the case. The establishing of Opera as a company was done through the writing and signing of legal documents that regulated the relationship between the owners, on the one hand, and representatives of the operative company on the other. In this case the main owners were bringing specific resources in terms of knowledge, experiences and a contact network acquired through the earlier process in Telenor. The establishing of ownership included the right to appropriate the net residual economic results from the company's operations. In this case, the company that had invested in the early development of the business activity (Telenor), eventually gave it away and also permitted two of its employees to take the technology, along with all their experience and contacts, and to pursue the opportunity to gain from it outside the Telenor company. To establish the new firm and to initiate its activities, these persons brought, in this way, some key resources to the new company.

The establishing of Opera Software as a company completely redefined the previous relationships between its social-material resources, activities and actors, on the one hand, and the monetary resources on the other. The event re-constituted the operative firm, re-defined obligations to fund the company financially, re-defined the distribution of ownership control rights and settled new rules regarding the appropriation of eventual money gains. However, the social-material value creation activities were brought over to the new firm more or less unchanged, which meant that the new entity could build on the investments already made and paid for.

The ownership deal was a constitution for the relationship between the company and the owners, and it had in this case two important parts. The first was that the owners had to supply the necessary equity to pull off the activity and secure the basis for obtaining investments or loans from others, which required deals with additional owners as well as with creditors. Hence, financial resources entered the company on the basis of the specific ownership deal that served as the company's legal constitution. The second was that the owners brought in an established social-material value network that permitted the company to start its operations. This second part became the core of the new company, building on a more or less informal deal with the actor

where it all started – Telenor. In the Opera case it is very clear that the most important constitutive deal was the one with Telenor which terminated Telenor's ownership of the technology it had developed and moved it into the hands of two employees who had been core to its internal development. This deal contained an explicit monetary flow, namely zero. In order to get a positive cash flow, the new company had to enter deals with others.

A deal is usually settled when it becomes a legally binding contract. The fundamental deal in economic life is represented by the constitution of the relationship between owners and the company they establish. The owners are external to the company itself, and the contract establishes what we generally perceive of as "ownership of economic enterprise" (Hansmann, 1996). Through this legal relationship, the owners obtain the right to control the company as well as to receive its net residual earnings, thereby forcing it to present measurements and calculations that reflect its activities and to calculate and verify the net economic results in monetary terms.

To establish the ownership deal, the owners must supply the minimum resources required to pull off the activity. In the case of Opera Software, this was represented by the technology the owners brought with them from Telenor and some monetary funding. Jointly, these two elements represented the equity of the firm at the constitutional event. This permitted the owners to establish a company as a legal entity. They did this, as well and in practice, through the appointment of a CEO who represented the firm and all of its activities including the right to enter legal relationships with others.

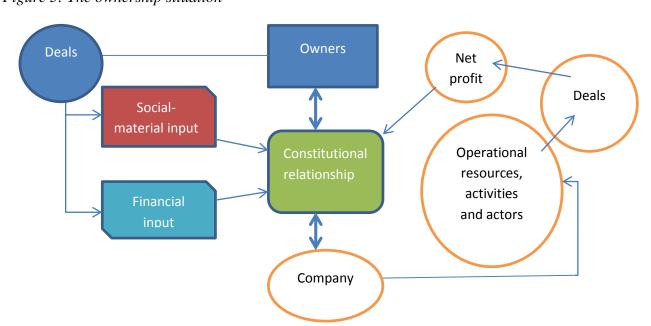


Figure 3: The ownership situation

The constitution of the firm defined it as an economic agency, which forced it to use an accounting system including systematic economic measurements, calculations and accounting that translated the social-material activities and trades conducted by the firm into monetary measures (Håkansson, Kraus & Lind 2010). On the basis of these, the company was permitted to manage monetary flows and processes in accordance with what is laid down in all the deals it has committed to. Hence, these flows are controlled and enforced by the deals and are only indirectly connected to the basic social-material resources, activities and actors doing the work.

As Figure 3 indicates, the construction of a company is a legal process, but the important starting point is built on the already existing deals – either on the input or output side of the company. Without such important deals there would have been no real commercial body in the new company.

#### 6. HOW TO STUDY THE ROLES OF MONEY IN BUSINESS NETWORKS

The objective of this paper is to try to interpret and conceptualize the monetary processes in IMP methodology and theory and thereby discuss how we, from an interactive approach, may address the monetary aspects of business activities: How can we understand the interactions between money and the complicated and extensive processes that are tied to the use of essentially immovable resources that we have found to be so characteristic of many industrial areas, especially since money is rather one-dimensional and a resource that is quite easily movable? We have found this to be a quite problematic area of the interactional approach and recognize that in this paper we will only manage to come up with some rather preliminary suggestions for how to conceptualize it. There seems to be no simple way to translate the complex interactions we perceive of in IMP studies into the monetary interactions and vice versa (Håkansson 1982, Håkansson & Snehota 1995 & Håkansson et al 2009). We now want to discuss and to summarize major issues that we have identified which call for future research and theorizing efforts.

In general terms, a deal is a result of a process in which two or more parties have agreed upon something that is affecting their interdependent cash flows. It can be a routine deal where

some volume of products or services is given a certain price, or it can be a more special deal where the parties agree to pay or invest in some more or less specified project. The deal is a result of how the actors perceive of each other and the interaction processes they are involved in. Consequently, they can put more or less resources into the formulation of the deal, they can be more or less skillful in doing deals and they can be more or less eager to settle. Furthermore, they might have very different reasons for entering the deal. The deal is, in this way, always a "reciprocal construction". It can be more or less fair, more or less forced and more or less clear or easy to follow.

One key issue is always what to include and what to exclude from the deal. What is a good deal given the situation, and what is required in terms of capabilities and efforts in order to reach its objectives? An additional issue regards the time perspective, and yet another, the broader preconditions for achieving a good deal, for instance with respect to legal systems and political predictability. A fourth major issue concerns what other deals a particular new deal is related to. Can the company build on some existing deals? Can the company achieve other deals if it enters this particular new deal? How can the company adapt the deal to work better in relation to existing and potential deals? All these aspects can be found in the presented Opera Software case, illustrating how important it is to see the deal as a result of all these aspects and issues, and of the competence, knowledge and business landscape interpretations of those actors that engage in the deal-making processes.

Our observations from the case and the analysis above, point to at least three basic issues. The first regards the need for a closer look at the deal and especially how it relates to the heterogeneous social-material value creation processes with the homogeneous money flow. The second is about the fact that single deals are related to a number of other deals forming a structure of networked deals. Finally, the third issue concerns the continuous process of networked deal-making in which we can identify both stabilizing and dynamic processes over time. In the following we will present and discuss each of these three issues for the purpose of building elements of a conceptual theory to further study the roles of deals in networked economies.

## 6.1. The deal in between social-material and monetary processes

The first general issue we will suggest addressing is:

A deal can be seen as the result of an interactive business relationship where the basic problem is the difficulty to relate the heterogeneous social-material interactions to the homogeneous monetary sub-processes.

The Opera case is illustrative of how important the deal-making is in order for a company to get a favorable position in relation to its money flow. It was when Opera managed to get some new deals with the operators that the company was able to get larger monetary rewards in return for its role in the value creating process. Formulating positive deals is thus challenging and possibly quite problematic, both for the business actors and for conducting economic analysis. Deals are challenging to formulate and design, they are problematic to handle and use when they exist, and may be problematic when they terminate – for instance because they are related to other deals that may destabilize. As a consequence, a business actor – as all the actors in the case - will tend to gradually involve itself in a number of deals that somehow relate to one another, to potential future deals and also to those that terminate.

Business network theory, such as represented by the IMP, represents a process view of economics where the actual economic value is generated through numerous interactional processes involving heterogeneous, context dependent resources, activities and actors (Håkansson et al 2009). Value is not seen as intrinsic to a particular resource, but as the outcome of its participation in particular combinations of heterogeneous resources, activities and actors Håkansson, 1994). Changes in such interactions will alter the value of the resource as a collective effect that may be harvested by the participating actors. Hence, the value of a given resource is neither homogeneous, nor given nor stable, but critically depends on its interactions with others (Håkansson & Waluszewski 2002; 2009). In this perspective, one important aspect of dealmaking is about the efforts of business managers to find resource, activity and actor combinations with resources, activities and actors owned and controlled by others that generate more value (benefits). Such increased values are accordingly collectively generated and these additional values cannot be directly traced to any of the participating elements, but are the genuine result of the new combining. The deals made between the involved participants will distribute these collective gains between them. The distribution of gains can, due to the characteristics of the process, be more or less connected to the distribution of duties to supply resources, activities and actors in the combined activity. The deal-making process is, accordingly, at the core of what

economic value creation is all about - the continuous search for additional opportunities to find more valuable combinations that can be transformed into monetary benefits.

Another important aspect of deal-making is that, contrary to the social-material world which is full of interrelated heterogeneous resources, money as a resource appears to be very homogeneous, precisely defined and quite easily movable. However, money only works in collectively structured ways, which implies that the deal structures must also relate to the economic and financial meta-structures of our societies - where case deals that concern the overall organizing of the economy and the distribution of gains and losses across the entire polity become a critical, as well as completely legitimate, part of the business economy.

Deals permit money to flow between the actors and order these flows according to the deals, thereby giving opportunities for economic measurements and calculations in the specific parts and sub-processes of the entire value creation process (Håkansson, Kraus, Lind 2010) The common denominator in all of these calculations is money. Hence, we suggest seeing the processes of monetary calculations and flows as conceptually separated from the social-material value creation processes. Consequently, we have to focus our interest on where these processes are interacted - the deals.

The translation from values (benefits) created through re-combinations of heterogeneous resources into homogeneous and easily movable money is both a powerful vehicle and a source of a number of problems and concerns for those involved. For instance, money can move freely but the deals cannot, as they depend on their extended, complex deal structures. The fundamental element of economics in this way becomes not a matter of individualism versus collectivism, but about the dynamic interplay between the complete necessity of collectivity and the reality of subjective interests at all levels of representations of "individual agency".

One interesting aspect is that most economic measurements and accounting procedures usually regard the flow of money and not the basic value creating process. This is certainly a problematic issue.

A deal is the result of a temporary compromise in two dimensions. Firstly, it is the result of the specific interaction between two (or more) parties. It is what can be agreed by these parties at this point in time and is the outcome of their efforts to put together the necessary elements to make a deal with one another. Hence, it is an act that certainly affects rules for further interactions between the participants. One crucial issue is that the outcomes of such deals may

not at all be "balanced" or "fair" in relation to the contributions to the actual value creation processes, neither ex ante nor ex poste, as they may be influenced, for instance, by power relations (Olsen et al, 2014).

Deals may also represent a compromise regarding how the interface is resolved between the particular sub-process handling the monetary dimension and the total interaction process of which it is part. The total interaction is constituted by the productive value creation processes based on a highly complex social-material network that is in constant development and where nobody might know exactly how it will develop in the future. In order to calculate the value creation outcomes, this total social-material interaction network has to be translated to a specific sub-process where the measurement as well as the distribution of the money is done within the accounting and financial payment system. A deal is a necessary arrangement that necessitates yardstick measurements and mathematical calculus. It translates heterogeneous activities into mathematics in combination with money as a homogeneous resource. Such estimates will always be uncertain. Thus, the calculations will be a compromise highly affected by the abilities of the involved parties to argue and to influence.

# 6.2. The importance of a structure of networked deals

Our observations and analysis also give reason to suggest focusing on a second basic issue:

The monetary flows across companies and business networks are constituted by interrelated deals that are at least partly interdependent. They can be interdependent both due to the interactive value creating processes but also due to the monetary system.

In the case it is obvious that the deals Opera is making with different counterparts are interrelated, but it is equally obvious that the deals made within the network in Nigeria are all related. Deals are in this way creating different and interrelated deal structures. These structures are the outcomes of the overall interaction processes as well as being important monetary features factors affecting the further interactions. We need, accordingly, to investigate both the actual social-material interactions and the monetary systems' specificities to understand how and why particular deals are being created, but also to research the particularities of established deal structures in order to understand how they influence the social-material interactions in business networks and their translations into monetary flows across the involved actors.

There are many and quite difficult consequences of the existence of this type of deal structure. One important consequence is that the deals are interdependent. One deal can be a requisite for another -- and the way one deal is formulated may obviously influence the possibility to form others deals. Over time this creates numerous challenges and problems for the involved companies as the case illustrates. The companies have to put a lot of effort into making these deals and combining and relating them in different ways. The unique structure of interdependent deals is also problematic for all those interested in understanding and trying to influence what is going on. The existence of the deal structure makes it difficult to use measurements based on money flow as indicators of efficiency or values. The monetary distribution is a construction made by the involved actors and may instead reflect relative power rather than contributions to the actual value creating process. Monetary profits may thereby be more an indication of power and political capabilities than of efficiency.

# 6.3 Continuous process of networked deal making

Finally we will suggest a third general issue regarding the process of continuous network deal making:

In business networks there is always a continuous process of additional and re-negotiated deal-making. Here the processes represented by heterogeneous resources, activities and actors are translated into the monetary process by including new or re-negotiated deals. New perceived opportunities are combined in battles over distribution of future monetary gains from interdependent activities.

Hence, to study the dynamics of deals formation is a gateway to study the economic dynamics of business networks. The existence both of continuous socio-material interaction and a deal structure provides possibilities for the involved actors to challenge and to reformulate single deals. Firstly, new deals can be formulated and signed. These new ones can be more or less in accordance with the existing structure as is exemplified in the case. Secondly, existing deals can be renegotiated and changed. Thus, individual deals in the structure are put under more pressure or less pressure to be adapted to new circumstances and conditions. Thirdly, an important source of change is the altering of interdependencies between the deals due to events and processes outside the overview and control of a given actor. This is what happened to Opera that led it to

develop special solutions for the telephone operators and negotiate additional deals with them. This also increased the interdependence between the users and the operators as an effect of the new deals between the operators and Opera and the added technology services that resulted from them. The interacted solutions between all three parties became more efficient but also more interdependent. At the same time the total deal structure became more integrated, which also affected other actors, such as Nokia.

Many deals may be relatively stable over substantial periods of time. Others are fragile, may lose their relevance to the actors involved, or may be substantially altered through renegotiations. Others may be forced aside or forced to change by regulators or others, and in many cases they become targets for strategic as well as judicial battles - battles over rules, control rights, losses, gains, etc. As a result, economic analysis of business activities should put emphasis on these dynamic processes affecting deals and deal structures that are at the core of economic interactions in real economies.

One reason why deals are problematic is that they become real through the act of signature, and thereby represent stabilized powers and formats that ultimately must be enforced by the powers of the state. When signed, they achieve an influential existence of their own. A deal is formulated and agreed at a certain point in time, but already the next day something might happen that alters some of its basic pre-conditions. Thus, how the actors will use the deal depends on what happen in the broader networks of interactions over time. It will depend on how the actors can use the deal in relation to each other, and also in relation to all other interaction processes they are part of. The deal can be seen as a constructed "resource" that may be used in a lot of different ways. However, it may also be seen as a liability that perhaps should be withheld as a secret – to undermine other deals by deliberate counter-moves. The deal is a judicial agreement and may thereby serve as a constitutional set-up for a business relationship to be established and to work over time. As such, the deal should work to facilitate continuous interactions, improvement processes and shared benefits, but also to force the parties to comply with their obligations when they would prefer not to. Due to changing conditions, learning, new opportunities etc., a company might try to get out of the deal as quickly as possible or at least to break away from what was agreed upon. As such, the deal represents resistance and permanency in the face of all these changes, an insistence on order which is core to what characterizes the economizing processes we have analyzed across industries.

Another effect of changes over time is that the "value" of a deal might change – sometimes in rather dramatic ways. When is it time to re-evaluate the appropriateness of a certain deal? When is it time to terminate it? When is it time to expand it by including more activities, more resources and more efforts?

#### 7. CONCLUSIONS

Our conclusion is that deals are essential parts of inter-organizational business interactions and, in particular, that they represent a gateway to investigate how money as a resource can be better understood, studied and theorized in the perspective of IMP theory. It accordingly needs more attention from business network researchers. Deals provide means for measuring, calculating, accumulating and distributing monetary gains/returns, and they are partly results of the overall orchestration of inter-organizational interactions and partly of the capabilities of the engaged actors (Håkansson, Kraus & Lind 2010).

We suggest that the more productive approach to studying the roles of money in relation to business interactions in a network perspective is to try to open the black boxes of these issues by insisting on a micro oriented empirical approach. We believe the contributions of network theory must be rooted in deep empirical studies that permit us to observe and investigate interactions at the level of detailed, complex objectives and ambiguity of meaning and interpretation on the side of the actors. Money and cash flows are core to any economic theory of business activities. Moreover, as the relationship between social-material interactions and monetary flows is a tricky one, there are important reasons to investigate deals further. The roles of deals and deal structures in the total interaction appear to be quite problematic, complex and variable, which makes these aspects interesting – even intriguing – to explore and to come to grips with from a dedicated network theory perspective.

Three key issues have been identified based on an analysis of the Opera case. The first is the deal in itself. As the case illustrated, single deals can be extremely important for the individual company and there are strong reasons for the company to devote time and resources to design and formulate them. Thus, we need more research about the content of these deals and the variation in them as well as what kind of actor capabilities are important. We should also learn more about what kind of activities companies perform to create these deals. Especially, we need

detailed investigations into how the deals are affected by their core functioning as "translations" between the socio-material value creation interaction and the homogeneous money resource.

Here we need both case studies as well as more quantitative cross-sectional studies.

The second issue is crucial from a network perspective. The deals we found in the case are all interrelated but in different ways. Thus, no deal is an independent unit. Instead each deal is part of a deal structure, and every deal is more or less dependent on some other specific deals. This creates both opportunities and restrictions for designing single deals as well as changing and reformulating existing ones. There are several different dimensions creating these interdependencies. In the case we could see that each actor tries to relate his own deals to each other. We can also see how a technology in terms of both resources and activities is creating similar dependencies (mobile phones in relation to the internet) and that some geographical areas, such as Nigeria, do the same. A crucial issue, both for business actors as well as for all researchers investigating deals, is to put them into this context.

Finally, the deals and the deal structures are important ingredients in stabilizing as well as in creative, dynamic processes. Every deal has a stabilizing ingredient – it is a fixation of certain aspects, at least for a certain time period. It makes the world a little bit more stable in some aspects. However, at the same time a new deal might change the conditions for some other deal by creating an impulse for changes. This double role is important for the involved business actors but might even be more important for policy actors wanting to affect the development of specific networks.

#### References

Akerlof, George A. (1970). "The Market for 'Lemons': Quality Uncertainty and the Market Mechanism". *Quarterly Journal of Economics* (The MIT Press) **84** (3): 488–500.

Anderson, J. C., 2004, From understanding to managing customer value in business markets, in Håkansson, H., Harrison, D., Waluszewski, A, (eds) *Rethinking marketing. Developing a new understanding of markets*. New York: Wiley

Axelsson, B., Håkansson, H., 1989, Wikmanshyttans uppgång och fall, Lund: Studentlitteratur

Baraldi, E., Strömsten, T., 2009: Controlling and combining resources in networks – from Uppsla to Stanford – and back again: The case of a biotech innovation, *Industrial Marketing Management*, 38(5), 541-552

Ford, D., Gadde, L-E., Håkansson, H., Snehota, I., 2011 *Managing Business Relationships* London: Wiley 3<sup>rd</sup> ed.

Gadde, L-E., Håkansson, H. & Harrison, D., 2002, Price in a relational context, *Journal of Customer Behaviour*, 1 (3) s. 317-334

Håkansson, H., 1994, Networks as a mechanism to develop resources, in Beije, P., Groenewegen, J., Nuys, O., (eds) **Networking in Dutch Industries,** Leuven-Apeldoorn: Garant Uitgivers

Håkansson, H., Johanson, J., 1987, Formal and informal cooperation strategies in international industrial networks, in Contractor, F.J., and Lorange, P., (eds.) *Cooperative Strategies in International Business*. Lexington: Lexington Books.

Håkansson, H, ed., 1982, International marketing and purchasing of industrial goods: An interaction approach, New York; J Wiley

Håkansson, H., 1989, Corporate technological behaviour: Co-operation and networks, London: Routledge

Håkansson, H., Lind, J., 2004, Accounting and network coordination. *Accounting, Organization and Society*, 29(1), pp 51-72

Håkansson, H., Lind, J., 2007, Accounting in an interorganizational setting. In C.S. Chapman, A.G. Hopwood and M.D. Shields, eds, *Handbook of management accounting research*, Vol. 2, pp 885-902, Oxford: Elsevier

Håkansson, H., Kraus, K., Lind, J., eds., 2010, Accounting in networks, London: Routledge

Håkansson, H., Snehota, I., eds., 1995, *Developing relationships in business networks*, London: International Thomson

Håkansson, H., Waluszewski, A., 2007 (eds) *Knowledge and innovation in business and industry*, London: Routledge

Håkansson, H., Waluszewski, A., (2002) Managing Technological Development. IKEA, the environment and technology, London: Routledge

Hansmann, H. 1996. The ownership of enterprise, by, Cambridge, MA: The Belknap Press of Harvard University Press

Lind, J., Strömsten, T., 2006: When do firms use different types of customer accounting? *Journal of Business Research*, 59(12), 1257-1266

March, James G. (1994). A Primer on Decision Making: How Decisions Happen. New York: The Free Press

March, James G. and Simon, Herbert (1958). Organizations. John Wiley and Sons.

McCall, John J. (1970). "Economics of information and job search". *Quarterly Journal of Economics* **84** (1): 113–126.

Mortensen, D. (1986). "Job search and labor market analysis". In Ashenfelter, O.; Card, D. *The Handbook of Labor Economics* **2**. Amsterdam: North-Holland

Olsen, P.I, Prenkert, F., Hoholm, T and Harrison, D., 2014: The dynamics of networked power in a concentrated business network, *Journal of Business Research*, article in press published electronically April 3

Simon, Herbert (1957). "A Behavioral Model of Rational Choice", in Models of Man, Social and Rational: Mathematical Essays on Rational Human Behavior in a Social Setting. New York: Wiley.

Simon, Herbert (1991). "Bounded Rationality and Organizational Learning". *Organization Science* **2** (1): 125–134.

Spence, Michael (1973). "Job Market Signaling". *Quarterly Journal of Economics* (The MIT Press) **87** (3): 355–374.

Stigler, George J. (1961). "The Economics of Information". *Journal of Political Economy* **69** (3): 213–225

Stigler, George J. (1962). "Information in the labor market". *Journal of Political Economy* **70** (5): 94–105.

Svendsen, M., Dubourcq, T., Håkansson, H. 2014, An Innovation Success – But Who Gets the Revenues? Opera Software in Nigeria, The IMP Journal, 8:2, pp 84-100

Williamson, Oliver E. (1981). "The Economics of Organization: The Transaction Cost Approach," *The American Journal of Sociology*, 87(3), pp. <u>548-577</u>.

Williamsson, Oliver E. (1985). *The Economic Institutions of Capitalism: Firms, Markets, Relational Contracting*. New York, NY: Free Press.