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## Playing the Numbers Game

### Dealing with Transparency

#### ABSTRACT

Our research focus is on unpacking the performativity of transparency in order to explain how digital technologies, formerly perceived as enablers of surveillance and control, afford opaqueness as much as transparency. We develop a sociomaterial perspective on transparency and investigate how transparency in organizations is co-constituted by the materiality of digital technologies used in the workplace, together with the actions of the organizational members, who project the material effects of their actions and accordingly choose to be transparent or opaque. We extend our understanding of the performativity of transparency by taking into consideration the temporality of transparency, and by using a trichordal approach to understand its emergence. By performing a qualitative study in the business division of a large telecommunications organization, we analyze the sociomaterial practices through which account managers become transparent and opaque in their interaction with a customer relationship management system. We show that these practices emerge while account managers are oriented to the effects of transparency in the past, present, or future, and develop a model to illustrate how transparency and opaqueness are produced interchangeably along this trichordal composition. The study contributes to the discussion on the role of transparency in organizations and its interchange with opaqueness, by bringing to the foreground its sociomaterial and temporal nature.

### 3.1 Introduction

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Digital technologies have often been considered to be powerful in increasing transparency in organizations (Brivot & Gendron, 2011; Elmes et al., 2005), governance structures (Fung, Graham, & Weil, 2007; Garsten & Montoya, 2008) and in society (Hansen & Flyverbom, 2015). The affordances of information systems for increased visibility and monitoring of actions and processes across all levels of hierarchy have triggered the interest of scholars in considering the disciplinary power of IS in Foucauldian terms (Foucault, 1979). The notion of the information panopticon (Zuboff, 1988) has been used by scholars (Elmes et al., 2005; Sia, Tang, Soh, & Boh, 2002) to study the regulatory forces of enterprise systems in organizations. However, most scholars, taking a technological deterministic perspective (Boudreau & Robey, 2005; Orlikowski, 2010), have overlooked how technology may be enacted in ways that preserve the user's autonomy and provide a distorted view of the reality on the work floor to the supervisors. Studies that follow a structurational approach (Cunha, 2013; Faÿ, Introna, & Puyou, 2010) expose how organizational actors produce, make sense of and deal with numbers stored in information systems, and thus increase our understanding of how transparency influences the way employees use those systems, as well as how their use influences the transparency of information (or its absence). However, we still lack a comprehensive account of how actors choose to be transparent or opaque while using the digital technologies that render their actions visible in the organization. We draw our focus on this aspect, aiming to answer the research question: *How does the transparency afforded by digital technologies influence the way people enact these technologies in the workplace?*

Drawing upon work on transparency in similar contexts, such as rankings (Hansen & Flyverbom, 2015) and reviews (Hansen & Flyverbom, 2015; Orlikowski & Scott, 2014; Scott & Orlikowski, 2014), this study follows a sociomaterial perspective (Orlikowski, 2010), with the goal to untangle the performativity of transparency, as this is enacted through the use of information systems. We conceive of the performativity of transparency as the mechanism through which “the making visible starts changing that which is rendered transparent” (Roberts, 2009: 958). We consider performativity as sociomaterial (Orlikowski & Scott, 2014: 874), thus conceiving of reality as enacted through performance of sociomaterial practices. Hansen and Flyverbom (2014) suggest that considering the materiality that enables transparency is important, to understand why transparency efforts end up concealing more than making visible. Following the call of Roberts (2009), we aim to further understand how the devices that make human actions visible are mutually constituted with the agency of humans whose actions become visible, through these very actions. Taking into consideration that information systems afford monitoring performance in real time, as well as evaluating past performance (via storing past data) and forecasting future performance (Hansen & Flyverbom, 2015), we understand that

transparency can have a temporal orientation. Consequently, to understand its performativity –and thus why people often conceal more through digital technologies instead of making transparent (Cunha, 2013; Hansen & Flyverbom, 2015)– we need to also examine its temporality. We do so by incorporating the approach by Emirbayer & Mische (1998) in our analysis, which suggests that agency is always oriented to the present, past and future through the chordal triad of agency.

In order to unpack the performativity of transparency, we performed a qualitative study in a large telecommunications organization. Through interviews and observations with employees in the marketing and sales department, we got to develop a thorough understanding of how transparency and the lack thereof, i.e. opaqueness, emerge through the daily actions of account managers, while using a CRM system for managing their sales work. By analyzing the practices they enacted, we identified how their actions, being oriented towards their past, present and future performance, are entangled with the material reality of the past, present and future constructed by CRM data. We found that the materiality of the CRM system, offering visibility to multiple stakeholders and in real time, semi-automated figures and reports that are produced on a regular basis, editability of information retrospectively, historicity via storing past information, and other features, triggers account managers not only to act transparent, but also to act opaque as they interact with the system, and reflect on their past, present and future. Our findings contribute to the recent discussions on how transparency is manufactured in light of the affordances of digital technologies (Hansen & Flyverbom, 2015), by unpacking the performativity of transparency as such emerges over time, and by illustrating how, why and when employees' actions on the work floor become transparent or opaque, in line with past studies on transparency (Bernstein, 2012; Collinson, 1999).

The remainder of this chapter is structured as follows: First, we draw on theories of transparency, digital technologies, sociomateriality and the chordal triad of agency to construct a performative perspective on transparency. Subsequently, we provide details on our research approach, the research setting and the research methods followed. In the analysis of the findings section, we unpack the performativity of transparency as this emerges in the practices of sales employees. In the discussion section, we try to extend our theorizing on the performativity of transparency across time, and discuss the contributions of the study and implications for research.

## **3.2 Towards a performative view of transparency**

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### **3.2.1 Transparency in organizations**

Making something transparent means “casting light upon what would otherwise remain obscure or invisible” (Roberts, 2009: 957). Transparency in organizations can be defined as casting light upon the behaviors, activities, routines, output and performance that emerge at the lower hierarchical levels of organizations (Bernstein, 2012). The potential of transparency to counter opaqueness (Roberts, 2009), by illuminating what would otherwise remain concealed, has strongly related the concept to notions of accountability (Hansen & Flyverbom, 2015; Roberts, 2009), regulation (Garsten & Montoya, 2008; Williams, 2013) and surveillance (Everett, Neu, & Rahaman, 2007; Knorr Cetina & Bruegger, 2001). In this regard, organizational scholars have been concerned with the role of transparency in management of organizations (Bennis, Goleman, O’Toole, & Biederman, 2008; Bernstein, 2012; Hood & Heald, 2006), and have considered it as a powerful form of governance (Fung et al., 2007). Bernstein (2012) suggests that transparency enables not only operational control, but also knowledge management and organizational learning. Several studies illustrate the efforts of managers to increase visibility of work in their organizations, for example by redesigning the office spaces (Elsbach & Pratt, 2007; Zalesny & Farace, 1987), introducing surveillance systems (Collinson, 1999; Sewell & Wilkinson, 1992), arranging peer scrutiny mechanisms (Sewell, 1998), and adopting information and communication technologies for real-time monitoring of activities (Elmes et al., 2005; Leonardi, Treem, & Jackson, 2010; Orlikowski, 1991; Tapscott & Ticoll, 2003; Volkoff, Strong, & Elmes, 2007). Another well-known practice for increasing transparency consists in the development of performance measurement systems, such as the balanced scorecard (Kaplan & Norton, 1996; Martinsons, Davison, & Tse, 1999), target systems (Ball & Wilson, 2000; Collinson, 1999; Frey, Homberg, & Osterloh, 2013), rankings (Hansen & Flyverbom, 2015) and reviews (Scott & Orlikowski, 2012).

### **3.2.2 Transparency afforded by digital technologies**

When people interact with technologies, several affordances emerge which constitute action possibilities and opportunities (Faraj & Azad, 2012). While taking a relational perspective that recognizes the constitutive entanglement between the social and the material (Orlikowski, 2010) and focuses on the enactment of technology in practice, Faraj and Azad (2012) view an affordance as a “multi-faceted relational structure” that comprises humans and technological artifacts, intertwined in the performance of sociomaterial practices. From an affordance perspective, we can see how the interaction of organizational members with digital technologies has created opportunities for the development of practices that produce transparency in organizations.

The development of digital technologies during the last decades has had a vast impact on the development of practices that reinforce transparency in organizations. Data produced by digital technologies provide inscriptions (Latour & Woolgar, 1986; Robson, 1992) of actions that take place on the work floor, while the data stored in information systems and infrastructures serve as historical apparatuses which capture events that took place in the past. Having the possibility to informate up (Zuboff, 1988) in the organization, information systems have the potential to reveal to higher management the behaviors and performance at the operational levels, while also exposing the reasons behind management's decisions to the employees at the lower echelons of power.

In the past decades, the development of management information systems (Saunders, 1981; Sawy, 1985), executive information systems (Walstrom & Wilson, 1997), computer-based performance monitoring (Ball & Wilson, 2000; George, 1996), management support systems (Clark, Jones, & Armstrong, 2007), and electronic surveillance (Sewell, 1998) appears to have empowered management in increasing transparency and control. IS scholars have been previously concerned with the disciplinary power of information technology (Elmes et al., 2005; Orlikowski, 1991). Technologies such as enterprise systems (Elmes et al., 2005; Sia et al., 2002), knowledge management systems (Brivot & Gendron, 2011) and enterprise social media (Leonardi et al., 2010) provide the ability to observe organizational processes and employees' actions in real time, as well as storing the data for later investigation. Thus, a system that provides global visibility of information can serve as an information panopticon (Foucault, 1979; Zuboff, 1988), and increase disciplinary power without constant observation, due to the exercise of disciplinary self-control.

### **3.2.3 Performativity of transparency**

Notwithstanding the popular belief that transparency reinforces bureaucratic forms of organizing (Adler & Borys, 1996), recent studies question the effectiveness of transparency in controlling and regulating activity (Hansen & Flyverbom, 2015). For example, Collinson (1999), drawing upon his study in the North Sea oil industry which exposed the concealment practices of oil workers under extensive surveillance, suggests that transparency may influence the performance of employees and thus may end up obscuring more than exposing when put into practice. The study by Bernstein (2012) highlights the negative effects of transparency on productivity, illustrating how the workers in a Chinese factory developed different practices that they followed when they had to be transparent, while they followed other, more efficient practices, when they were not observed. Taking these into consideration, we suggest exploring further the tension between transparency and concealment by unpacking the performativity of transparency.

In the context of studying technology in organizations, performativity can be viewed from the perspective of "sociomateriality mattering" (Gond, Cabantous, Harding, &

Learmonth, 2015), which draws on gender studies and post-humanism (Barad, 2003, 2007), and Actor-Network Theory (Latour, 2005), and deals with how things constitute reality through actors' sociomaterial practices. Such a view suggests that actors, meanings, and roles are constituted within sociomaterial practices, i.e. they are “dynamically brought into being through the continuous flow of practice” (Gond et al., 2015: 9). In other words, the notion of performativity entails that the enactments of sociomaterial practices reconfigure the world, thus the world is always in the making (Orlikowski & Scott, 2014).

From a performativity perspective, the enactment of sociomaterial practices of making things transparent influences how we view the world, and thus how we further enact those transparency-making practices. Roberts (2009: 958) addresses the performativity of transparency in light of the fact that transparency, apart from merely making something visible, can also have other unforeseen effects, “such that the making visible starts to change that which is rendered transparent”. In addition to the previous examples, other studies show how rankings (Espeland & Sauder, 2007) and reviews (Covalesski, Dirsmith, Heian, & Samuel, 1998; Scott & Orlikowski, 2012) influence the ways in which organizations act, thus endogenously influencing the output of the valuation.

### **3.2.4 Sociomaterial perspective of transparency**

In order to unpack the performativity of transparency, we take up a sociomaterial perspective (Orlikowski & Scott, 2014; Orlikowski, 2010, 2007). Such a view conceives of “the social and the material as constitutively entangled in everyday life” (Orlikowski, 2010: 125) and draws upon the work of scholars from the science and technology studies (Barad, 2007; Mol, 2002) and specifically Actor-Network Theory (Latour, 2005) who consider a relational view, giving equal importance to both human and non-human actors. Past studies have examined the dynamic reconfigurations between social and material, such as in the case of pharmaceutical robotics (Barrett, Oborn, Orlikowski, & Yates, 2012) or planetary exploration (Mazmanian, Cohn, & Dourish, 2014). While the perspectives on sociomateriality may vary (Cecez-kecmanovic et al., 2014), we specifically draw on the view of strong sociomateriality (Jones, 2014), which follows an agential realist ontology, as this has been developed by Barad (2003, 2007) and followed by Orlikowski (2010, 2007). Agential realism is a relational ontology that rejects the idea that human and non-human entities have inherent properties and exist independently, and suggests that the social and the material are ontologically inseparable from the start (Barad, 2003; Introna, 2009; Orlikowski, 2010; Suchman, 2007).

Approaching transparency as a practice, manufactured in the entanglement of humans and materials (Hansen & Flyverbom, 2015), can expand our understanding of how rankings are constructed (Orlikowski & Scott, 2014; Pollock & D’Adderio, 2012; Scott & Orlikowski, 2014), how numbers take the role of “inscriptions” that help govern at a distance (Miller, 2001; Roberts, 2009; Robson, 1992; Vollmer, Mennicken, & Preda, 2009;

Vollmer, 2007), or how forecasts are produced and interpreted by managers and controllers (Faÿ et al., 2010).

Furthermore, taking a sociomaterial perspective and conceiving of transparency as a sociomaterial practice (Orlikowski & Scott, 2014), might help us better understand phenomena that have indicated the tension between transparency and opaqueness, i.e. whereas transparency is aimed to shed light on employees' actions, it often ends up reinforcing their opaqueness. Such a tension has been highlighted for example in the way managers use performance data for impression management (Cunha, 2013), in the problematic of imperfect numbers in performance measurement (Andon, Baxter, & Chua, 2007; Dambrin & Robson, 2011; Jordan & Messner, 2012), in the strategic micro-practices of calculation followed by accountants and middle-managers (Fauré & Rouleau, 2011), as well as other cases of fraud in accounting (Boll, 2014; Cooper, Dacin, & Palmer, 2013; Everett et al., 2007; Neu, Everett, Rahaman, & Martinez, 2013).

### **3.2.5 Temporal emergence of transparency**

In their study of politics of transparency in the digital age, Hansen & Flyverbom (2014) examine how “disclosure devices”, i.e. mediating technologies in manufacturing transparency, help provide not only a retrospective type of disclosure, e.g. by analyzing past data that represent traces of actions, but also an anticipatory one, which includes making predictions from analyzing real-time data. This distinction suggests that transparency as a practice also has a temporal orientation. As soon as the data that traces people's actions is stored in an information system, it can be used not only to control their actions in the present, but also to evaluate their past performance as well as to predict their performance in the future. Thus, in order to understand the performativity of transparency in light of how it is enacted through digital technologies, we need to emphasize that what is rendered visible through transparency is not necessarily an instance of the present, but it could also be an instance of the past or even of the future. Consequently, we need to consider also the temporal orientations of the transparency practices, to further explore their performativity.

In order to study the temporally enacted sociomaterial practice of producing transparency, we are going to follow the *chordal triad of agency* approach (Emirbayer & Mische, 1998: 963), according to which agency is conceptualized as “a temporally embedded process of social engagement, informed by the past but also oriented toward the future and toward the present”. Emirbayer and Mische (1998) analytically distinguish three elements of agency: the *iterational element* is oriented to the past via memory or the historical apparatus that serves as memory; the *projective element* entails the imagining the future; the *practical-evaluated element* is structured in the present and concerns making practical judgments. Although each element has as a dominant temporal orientation, it is also influenced subdominantly by the other two orientations. Thus, as



actions “are embedded within many [...] temporalities at once, they can be said to be oriented toward the past, the future, and the present at any given moment, although they may be primarily oriented toward one or another of these within any one emergent situation” (Emirbayer & Mische, 1998: 364). Organizational scholars have used the chordal triad of agency to develop a temporal approach in strategy making (Kaplan & Orlikowski, 2013), organizational identity (Schultz & Hernes, 2013), digital coordination (Venters, Oborn, & Barrett, 2014), and other concepts.

As far as transparency is concerned, the visibility that digital technologies offer in real time enables transparency of present actions; the historicity afforded by digital technologies enables transparency of actions that were performed in the past; while the inclusion of algorithmic models for forecasting based on real-time and past data, helps project activities into the future. These temporal dimensions of transparency afforded by digital technologies intensify the material effects that human actions have through the technologies that render them transparent, and can thus influence their being rendered visible or opaque. In the following sections, we are going to investigate how the performativity of transparency emerges across the three temporal dimensions.

### **3.3 Research methodology**

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Our overall aim is theory elaboration (Vaughan, 1992). We build on existing ideas about transparency in the workplace (Bernstein, 2012; Collinson, 1999) and how it is enabled by information systems (Cunha, 2013; Elmes et al., 2005; Leonardi et al., 2010), and aim to refine concepts and their relations (Locke, 2001). In order to study the enactment of sociomaterial practices that produce transparency through the use of digital technologies and understand their performative effect, we performed a qualitative study in the marketing and sales department of a large telecommunications organization, following an inductive approach (Gioia, Corley, & Hamilton, 2012; Locke, 2001). Our focus on temporality prescribed taking an insider perspective (Shotter, 2005), i.e. studying process “from within” as actors experience and enact it themselves.

We started by investigating broadly how work was performed by account managers in the sales department of a telecom organization. By taking a practice lens (Feldman & Orlikowski, 2011; Nicolini, 2012) in our data collection, we directed our attention to the micro-activities that account managers followed in their everyday work. By focusing on their actions, we developed a thorough understanding of how various technologies are constituted in their practice. Not surprisingly, a CRM (Customer Relationship Management) system emerged as the most important tool for the account managers. The scope of the CRM system was to manage customer information and coordinate sales work across Marketing and Sales, and thus enabled visibility of the account managers’ actions to their managers and other stakeholders. The reality that the CRM system represented about the

customers and TelCo's relations with them was shaping and being shaped by their actions. By observing how account managers enacted the CRM system, we identified the actions through which they were becoming transparent and opaque to the organization. Our later analysis extracted the orientation of these actions to the present, past and future. By analyzing the relations between these temporally oriented actions, we got to construct a performative view of transparency, as such emerges through the engagement of account managers with the CRM system.

### 3.3.1 Research setting

TelCo is a large telecommunications provider serving both end-consumers and businesses. We conducted our study in the Marketing and Sales department of the business market division. We focused on Sales Medium and Sales Large, the sales channels that serve small/medium-sized and large enterprises respectively through account management. The Sales department is divided into three geographical regions (East, South and West), with each region consisting of three Sales Medium and two Sales Large teams. Every team includes 7-10 account managers, managed by a sales manager. We studied the account managers' work in eight Sales Medium teams and four Sales Large teams.

**Sales work.** In Sales Medium, account managers work in pairs of internal and external account managers, who together serve a set of 250-300 small or medium-sized customers. Internal account managers work from the office and call customers by phone, while external account managers visit the customers on their office locations. Every pair decides by itself which customers to contact by phone and which to visit, but the general principle is visiting the customers with the highest revenue potential. In Sales Large, all account managers are responsible for a set of 15-20 large customers, whom they visit often in order to maintain the relationship and work on projects.

The sales process in TelCo follows the purchase funnel model, which organizes the customer pipeline in five phases: "suspect" (approached for a portfolio), "lead" (interested in receiving an offer), "prospect" (finding the offer interesting), "hot prospect" (negotiating the details of the offer) and finally "customer" (when a contract is signed). Account managers are responsible for managing the relationship with customers, maintaining the current contracts with them, and getting them interested in buying new portfolios. They have to generate leads that are later picked up by specialists, who are responsible for preparing the order and closing the deal.

**The CRM system.** Coordination of the sales process emerges through the CRM system. TelCo uses the Oracle Siebel system for customer relationship management, in which customer information is stored and accessed by different stakeholders participating in sales: account managers, specialists, sales managers, customer service, marketers, deal makers, finance employees, and others. The CRM system includes contact information about the customers and their interactions with TelCo employees (account manager,

specialists, customer service, technical support), all financial information about the past and current transactions, funnel information (in which stage of the sales process the customer is for every portfolio), and sales opportunities that are expected to come up in the future. Analysts, who create weekly and monthly reports on individual and team performance, regularly process all this data and generate revenue forecasts that are based on the sales opportunities stored in the system.

***Targets-based culture.*** TelCo employs a targets-based culture, aimed to reward employees with a yearly bonus for attaining high revenues from sales. At the start of every year, targets are set by the top management and are further divided across the departments. Product managers and marketers have to attain targets for the specific portfolios they are responsible for, while account managers have to reach targets for all portfolios. In sales there are two different types of targets: the order intake target is set for signing new contracts and expanding business, while the revenues target is set to ensure retaining existing contracts and focusing on deals with high value. The targets are divided hierarchically, having the sales director responsible for the targets of all sales channels, the sales managers responsible for the total targets of their teams, and the account managers responsible for their own individual targets. Targets are not divided equally, but instead they are calculated based on the potential revenues of the customers. The teams (and the account managers individually) that have a higher potential have a higher target to reach, without the value of the target influencing the value of the bonus that will be gained if the target is reached. As all account managers aim for lower, easier accomplishable targets than colleagues, the determination of the targets every year often involves contestation amongst account managers and sales managers, over who has higher and who has lower potential in generating future revenues, and thus should be assigned with a higher or lower target respectively.

### 3.3.2 Data collection

Our study at TelCo lasted for 24 months, during which we got a rich understanding of how account managers worked and how they dealt with the transparency afforded by the CRM system in their organization. We studied the practices of both internal and external account managers from Sales Medium, as well as the practices of account managers from Sales Large. As their work is relational, in order to get a better understanding of their context, we also looked at the practices of people they collaborated with, namely sales managers, marketers and analysts. We collected data mainly via semi-structured interviews (Weiss, 1995) and complemented it with ethnographic observations (Emerson, Fretz, & Linda, 1995; Spradley, 1980). The focus of both interviews and observations was on the informants' actions; we sought to get answers to questions on how they performed their everyday work, triggered by what drivers, and so on. During the interviews we often asked the informants to show us on their laptops the systems that they enacted in their

practices, and to provide detailed real examples. We also studied internal and external documents to further understand how work was performed in marketing and sales, and to understand the target-based culture. Data was collected in three periods in time, to enable iteration between data collection and analysis (Locke, 2001). An overview of the collected data can be seen in table 3.1. In total, we performed 77 semi-structured interviews recorded and transcribed verbatim (72.5 hours of recorded time), 21 observations summing to 85 hours of observing time and 182 pages of single-spaced notes, and used 66 internal (presentations, figures and reports) and external (annual reports, press announcements) documents.

**Table 3.1 Overview of collected data**

Type of data	Type of informants	Number	Total time
Interviews	Account managers from Sales Medium	36 interviews	33.6 hours
Observations (shadowing)	Account managers from Sales Medium	3 days of observations (shadowing), 28 single-spaced pages of notes	24.5 hours
Interviews	Sales managers from Sales Medium	5 interviews	5.2 hours
Interviews	Account managers from Sales Large	13 interviews	12.5 hours
Interviews	Sales directors	2 interviews	1.1 hour
Interviews	Analysts	17 interviews	15.25 hours
Observations (shadowing)	Analysts	8 days of observations (shadowing), 58 single-spaced pages of notes	51 hours
Interviews	Campaign manager	2 interviews	2 hour
Observations of meetings	Weekly meetings of the analysts' team	7 meetings observed, 10 single-spaced pages of notes	6.5 hours
Interviews	Marketers	2 interview	2.3 hour
Observations of meetings	Kick-off presentations of analysts and campaign manager to account managers and sales managers	3 meetings observed, 24 single-spaced pages of notes	3.15 hours
Personal notes (diary of researcher)	Based on interactions with all respondents	62 single-spaced pages of notes	-
Documents	Internal documents	43 documents	-
Documents	Public documents	23 documents	-
Total number of interviews: 77 Total recorded time: 72.5h			
Total number of observations: 21 Total time of observing: 85h			
Total number of notes pages: 182			
Total number of documents: 66			

### 3.3.3 Data analysis

We performed our analysis using a practice lens (Feldman & Orlikowski, 2011; Nicolini, 2012), trying to capture the routinized ways through which people act while intertwined with other human and material actors (Sandberg & Tsoukas, 2011). Using guidelines from grounded theory approaches (Corbin & Strauss, 1990), we performed our analysis in the following steps: We started with open coding, capturing the different actions that our

informants followed in their everyday work. We then merged codes with similar meaning and subsequently we continued with axial coding, categorizing the first-order codes into second-order constructs (Gioia et al., 2012; Maanen, 1979), which described the different practices followed by account managers. At that stage we selected codes that were relevant to our further understanding of the phenomenon, and categorized them into two aggregate dimensions: the account managers' practice and the performativity of transparency. In order to further understand how the performativity of transparency emerges in time, we then went back to the second-order codes of that category, which represented actions of being transparent or opaque. For each action, we reflected on whether it was mainly oriented towards the past, present or future (Emirbayer & Mische, 1998), and categorized it in one of the three respective categories. Then, we returned to the first-order codes and identified the elements of the past, present and future in each action. This analysis resulted in unpacking how the performativity of transparency emerges in time, and is depicted in table 3.2.

In order to illustrate the different practices that account managers enact as they deal with transparency, we try to “render the actual” (Smets & Jarzabkowski, 2014; Van Maanen, 2011: 232) by explaining the practices through the views of three exemplary account managers (Nick, Kate and Alex), that are composed by the full breadth and depth of the data we collected through our interviews and observations with the account managers at TelCo.

### 3.4 Case analysis

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#### 3.4.1 Understanding the account manager's DNA: Looking at the practice of an account manager

Before diving into the actions through which account managers at TelCo deal with transparency, we find it important to acquaint the reader with the account managers' practice, in order to better understand the ways through which their actions become transparent or opaque.

Our analysis highlighted two elements that constitute the core of the practice of the account manager: First of all, *(1) managing the relationship with the customers* is central to the practice of an account manager. This entails frequent contact with customers, either by phone or through visits, not only to talk about the portfolios but also to help them out with practical issues or just to ask them how things are going. Account managers usually consider what is called “farming” as a necessary action: maintaining good relationships and planting seeds that will eventually flourish into business opportunities. For this, they develop and sustain a personal relationship with their contact persons (e.g. by going to

soccer games together), which allows approaching them easily to build trust, stay updated on the developments of their businesses, and find new sales opportunities, which, through the good relation, can eventually turn to orders.

*“Well... It kind of depends per contact person, but very important... With ninety percent of the people, even the low people, I always try to keep a good relationship with them. Because, in the end, they have to favor you above the competitor. And if the price difference is 50%, yeah, they will still choose for the competitor. But if it's close, they think “hey, Alex is a nice guy, he does extra things for me, I can always contact him if I have problems, he helps me think forward, he helps... and then ok, so Alex will get the deal.”*

*(Account manager in Sales Large)*

Second, account managers always (2) *strive to reach the sales targets* by the end of the year, which will ensure receiving their bonus. For this reason, it is important to stay alert to extend the current contracts, to maintain the revenues that are already taken into account for the revenue target. They often put pressure on the specialists to close deals by the end of the year, to reach the order intake target. It is common to focus more on customers, portfolios and sales opportunities that will bring higher value orders and revenues. For example, Kate, an internal account manager in Sales Medium, regularly checks the CRM reports on revenues and orders to evaluate how far she and her external account manager are with reaching their target. If she sees that they are underperforming on one of the portfolio targets, she shifts to routines that will ensure quick wins, for example by arranging focus days during which she works only on a product-push basis.

*“I think time pressure is always with the sales function. Not only for yourself, for your own target, but also for TelCo as an organization. So the numbers we have to reach, when we know it's going to be difficult, we have to adjust some with our strategy... So it's always about every quarter, but end of the year is the most important date.”*

*(Account manager in Sales Large)*

Taking the above elements of the practice into consideration, we can now shed light on the everyday actions that an account manager follows: (3) *Contacting the customer* takes place either via visiting the contact person at the office or phone calls. Nick, an external account manager in Sales Medium, finds it important to start with a general conversation with the customers about their business, to better understand their needs and offer them appropriate portfolios. (4) *Finding sales opportunities* involves being well aware of the business processes of the customers, getting to know their strategy and plans for the future, and understanding their needs. This is a very tacit process that often involves “feeling” when there is some potential based on what the customer says.

*“Most times people say that account managers are people who talk a lot, but it's the opposite. Good account managers are people who listen, very carefully, and ask the good questions on the right way, and feel when a customer needs something, and back off when he doesn't want to.”*

*(Internal account manager)*

Once Nick finds a sales opportunity, he has to (5) *store it in the CRM system*, assigning the status “suspect” to the customer, together with details about the portfolio the opportunity is about and the story behind it, e.g. “expanding to a new location in June

2016". Also, it is important to estimate the value of the opportunity, e.g. by multiplying the number of mobile contracts with the price of every contract, or by providing an estimated value if the portfolio is more complex (e.g. the telephone central system). He also adds a date when the opportunity will be active; for example, if the customer opens the location in June 2016, he will set the date for December 2015, so that he is early enough with getting the customer interested and closing the deal. After he stores the opportunity, this will be available in the "Sales opportunities" page in CRM. Although the idea is to store the opportunity directly after talking to the customer, this is not easy, as he has to be on the move for the next meeting. Thus, he might store it at home in the evening, or he might block some time on Friday for storing all the opportunities of the week.

(6) *Planning when to contact which customers and for which portfolios* takes place on a regular basis. Developing an account plan at the start of the year helps keep in mind when the big deals are going to take place. Planning is also done on a weekly basis, to decide which customers to call or visit in the following days. Alex, an account manager from Sales Large for instance, arranges his plan based on two rules: one is making sure that he contacts the customers early enough before their contract ends, in order to increase the chances for renewal. He has several information systems in which he keeps track of customer contracts in different portfolios. The other rule is checking the sales opportunities he has stored in the CRM: he checks the Sales Opportunities pages on a regular basis, and ranks the opportunities on the date they are active: in this way he can see which opportunities are coming up, which have the highest value, and so forth.

*"CRM is very important, because it's an overview of all our chances. Of course I know what has happened with my customers, but CRM makes us predictable. And in CRM we can sign the customers and with the different chances that are active at our customers, so we can say ok with this customer for the next few years we have this chance, that chance, this chance... So we can be predictable. I think that's the most important thing of the CRM."*

*(Account manager in Sales Large)*

(7) *Generating leads* is the main responsibility of all account managers. Kate explains how she typically generates the leads: when there is a sales opportunity, she contacts the customer and tries to get him interested in the portfolio. If the customer is interested in receiving an offer, she goes to the funnel of the customer in the CRM system (showing the customer's phase in the sales process), finds the opportunity, and changes the status of the customer from 'suspect' to 'lead'. She adds the name of the specialist who should pick up the lead. She also updates the expected value of the order, which she now knows better than in the suspect phase. The funnel has different percentages for calculating the potential revenue depending on the customer's phase customer: 20% for suspect, 40% for lead, 60% for prospect, 80% for hot prospect and 100% for customer. So after registering the lead, the forecast for her future orders will also increase in the system.

After registering the lead, a mail is automatically sent to the specialist to check it. In this way, Kate starts (8) *collaborating with the specialist* for the related portfolio. The

specialist will prepare the offer and present it to the customer. Although it is not her responsibility, Kate often stays involved in the process until the deal is closed, so that she can maintain the relationship with her customer, as well as make sure that the deal will be closed in time for reaching her targets.

(9) *Doing administration* is Nick's least desirable activity, as it is to most account managers. It is however necessary most times. Sales opportunities have to be stored and a good overview of the customers' funnel needs to be recorded, in order to plan the right time for contacting them about a portfolio. Leads also need to be registered so that specialists can take action on the deal. Writing down the interaction with the customers is also useful not only for Nick, who needs to remember what has been discussed with the customer, but also for the internal account manager that works together with him on the same set of customers, the specialists who will prepare the offers, the customer service employees who might also need to serve the customers, and others. Although Nick's sales manager often tells him how important it is to keep this information updated on CRM, he often finds the system incapable of capturing the complexity of his customers (e.g. because they have multiple business units, they are stored with different identifiers). For this reason, John, Nick's internal account manager, makes sure they also store the information in their own administration system: they use Excel files where they store information about the status of the customers in the funnel, the contact persons, and so forth. At the same time, next to maintaining all customer information in the CRM system and their own administration, Nick and John also have to include information about their customers in other Excel lists, as required by sales management, or by marketers who want to develop a new campaign.

(10) *Preparing before contacting the customer* is a common routine for all account managers. For example, before calling a customer, Kate, the internal account manager from Sales Medium, tries to get information about the company as quickly as possible: she looks at the website of the company and searches online to see if the customer was mentioned in the news recently. She will search for the customer in the CRM system and check his funnel information, what sales opportunities she has stored for the customer, while she will also look at the interactions tab to see what she had talked about with the customer and if the customer had been in contact with someone else from TelCo, e.g. for a customer service issue. She will also have a look at the figures in the CRM system to see what the customer pays to TelCo every month, what debts the customer has, and so forth. Also, she will look at the contracts that the customer has with TelCo. She has two systems where she can search the mobile voice contracts, one system to look at the fixed voice contract, and one system for the Internet contracts. Sometimes she also opens CLM, an Excel list with analytics insights provided by Customer Intelligence, to check if there is any opportunity predicted by analytics that she had not stored by herself. Taking into



consideration all this information, she can then steer the discussion with the customer to introduce a portfolio in a natural way.

*"My resources are very important: you go to the website of the client and you can see what they exactly do: only with healthcare, or with people with disabilities like handicapped, or something else like mental. And at that moment you can ask the client exactly what you want to know. When I know it's about elderly people, I can ask them on the phone 'what do you want to do when you are having clients with special needs'. In TelCo we have the specialty on technologies for helping these people. And Google is one of the resources... [...] Then we have the CLM model, which is helping me to create an image about that client. Or we have more researches..."*

*(Internal account manager)*

Evaluation of the account managers takes place in different ways: Nick, the external manager from Sales Medium, mentions that every Friday they have a check-in/check-out meeting with the whole sales team, where he presents the leads that he created that week, the status of his deals, and his forecast for next week. Next to those meetings, Nick has monthly individual meetings with Mike, his sales manager, who challenges him on the major business opportunities and provides Nick with direction when he is facing difficulties with a customer. Mike checks several monthly reports and figures that are produced from the data in the CRM system: order intake report, funnel report, all orders report, order mutation oversight, outdated funnels, denied orders, sales desk report about offers, oversight of the account overviews, oversight of the funnel, won/lost figures, white spots report, and others. Hence, when Nick meets with Mike, they also talk about his performance based on those CRM figures:

*"Every opportunity, I set it on the CRM. And those opportunities, they give an image for my supervisors, and he can see what I 'm doing for the next months or the next years."*

*(External account manager)*

### 3.4.2 Being transparent

When analyzing the account manager's practice in the first stages of our research, certain inconsistencies emerged that triggered our attention. Although the account managers emphasized the usefulness of the CRM system in planning and preparing for the conversation with their clients, they often mentioned that they would maintain their own administration, or that they frequently found inaccurate information on the CRM, or that they were asked to fill in lists manually with information about their customers, despite the report functions of the CRM system. For example, Alex, the account manager from Sales Large, mentioned:

*So when you get the garbage in, you get also the garbage out (chuckles)... The management has chosen for a system, and for a management structure, which provides to get as much information in the system as you want. But also, they manage the account management with that system. We call it 'Excel managers'. So for the last years, many account managers have put in so many funnels, and at this moment, you get the garbage out. There are many funnels, and the amount of money that is in our pipeline is huge, but when you get it to reality, it's just a little bit...*

*(Account manager in Sales Large)*

These observations made us curious to explain how such inconsistencies emerged. By studying further how account managers were enacting the CRM system, we understood that the visibility of information to the whole organization and in real time offered by the system, usually enables the sharing of knowledge and coordination (e.g. in planning which customers to call, preparing for their conversation or collaborating with the specialist to transform a lead to order), but also it can often trigger the account managers to fill in false data. As Nick, the external account manager from Sales Medium, explains, filling in the correct or false data in the CRM system is consistent with different goals that matter to the account manager at the time:

*"Yeah, but the thing is that it depends always on what the goal is. If the goal is gain less target, then it's a good thing to give less potential, so the target will be less as well. But if the goal is that we have to develop so many clients after a year, then it's good to give a lot of potential. It depends on which goal that list at that moment is, you know..."*

*(External account manager)*

Using the chordal triad of agency (Emirbayer & Mische, 1998) as a sensitizing device, we examined the practices through which account managers deal with the transparency and the opaqueness that the CRM system affords, as they are acting in the present, reflecting on the past or projecting the future. While each action emerges with one dominant temporal orientation, we also identified how it is simultaneously oriented subdominantly to the other two orientations, as "secondary tones" of the chordal composition (Emirbayer & Mische, 1998, p. 979).

### 3.4.3 Being transparent in the present

Account managers act transparently in the present by showing their current performance to the rest of the organization. Data about contracts that were signed, revenues that came in, invoices, etc. are stored in the CRM system by account managers, specialists, finance people, and customer service employees and feed weekly reports such as revenue charts and status of the order intake. Such data is considered to be "hard data" i.e. it does not incur ambiguity, and thus makes the sales performance transparent in the organization. Every Monday, Nick and John, as an example of a pair of external and internal account managers in Sales Medium, check the weekly figures in the CRM system to track how they are doing with their individual targets on revenue and order intake. Their sales manager also checks the figures and estimates how the team is performing. Reflecting on the figures from the stored data helps them project whether they will reach their targets by the end of the year. Hence, when they see that they are running low on one of the team targets, they look for ways to increase sales on a specific portfolio, e.g. by organizing a focus day.

*"Well, we use CRM, so if there are any sales opportunities, I just put them in, and they can see it, every Monday morning they get a list with the companies, so they can see, and once every two or three weeks we have a meeting with the account team, [...] and we just talk it through..."*

*(External account manager)*

### 3.4.4 Being opaque in the present

The weekly funnel report brings all major business opportunities to the spotlight instantaneously: Account managers, specialists, sales managers and others can immediately see what is coming up and deserves attention. Nick doesn't really like that his big opportunities become visible in the CRM. Every time his sales manager notices these opportunities he starts putting pressure on him, by asking questions and giving him directions on how to proceed. In addition, every time this happens he starts receiving phone calls and e-mails from specialists, deal makers and other people, who want to get involved in the offer (looking after their bonus), while he wants to involve the people who he thinks fit with the customer and the specific deal. As he projects all this pressure, Nick prefers "staying under the radar": when he submits the opportunity in the CRM system, he sets a lower value, so that it doesn't attract attention in the funnel report. As long as the customer's status is "suspect" or "lead" in the funnel, Nick is the only person who can edit this opportunity; in this way he can hide his big potential, but he can also go back to the opportunity and change it to the higher, original value, when the offer starts being prepared. This editability of the opportunities is a characteristic that distinguishes the materiality of this opaqueness practice, from how it could be performed on paper or by e-mailing Excel files, instead of using the CRM system.

*"The big things is, bottom line is that if you put such an amount, you're always in the spotlight. The deal is in the spotlight, so managers see it, specialists, other people see it, and people want to get something of it, you know... If they have an opening or door to get to this deal as well, either with you or without you, it doesn't matter, yeah... Then they try it, you know?"*

*(External account manager)*

*"Window dressing means that I have a lead, and that's a lead for one million, but when I'm going to say it's one million, the whole organization is in my back, so when I say he's 100,000 then nothing, no one will ask about it."*

*(Account manager in Sales Large)*

The weekly and monthly figures in the CRM system make it very easy for sales management to check how account managers are performing. Nick is always stressed about his white spots. TelCo has the rule that account managers should have a lead for every portfolio with their customers. The white spots list indicates when there is no lead stored in CRM system for one portfolio. Every time he appears to have white spots in the report, his sales manager starts asking him questions during their monthly meetings. Anticipating that in case he has white spots he will have to explain why he had no lead for that portfolio with that customer, he chooses to store a fake lead in CRM: even if he adds a value of one euro, the algorithm that checks the white spots will consider it as a true lead so he'll be out of the white spots list.

*"Well, sometimes you know that in this certain customer there is just no opportunity for that. And if you leave it blank you get a white spot, and you can put no opportunity, but then you have to make sure that there really is no opportunity, and... So sometimes you just put in a lead for one euro, for 2013, and then you're off the hook!"*

*(Account manager in Sales Large)*

Also, Nick sometimes acts opaque in the present by trying to make things look bright. Reflecting on how a figure on past CRM data can give a good impression to the management, he expects that management will be happy if they see a brighter situation in the figures than in reality. In this perspective, he adds untrue data in CRM, not only to influence his individual performance, but also because sales management may want to give an optimistic picture to higher management.

*"Yeah, of course... Because, Excel lists and everything you have to fill in... sometimes you just hear that you have to make a little bit more pretty than it really is, just for head management."*

*(External account manager)*

For example, this opaqueness practice emerges as the CRM system can also be used to test the effectiveness of campaigns and other ways of working. When Nick generates a lead in CRM, he has the possibility to add a campaign code next to it, to indicate that he used that way of working to produce the lead. The sales manager tells Nick and the other account managers to just add the code every time they register a lead, even if they didn't use that way of working. Thus, when a figure is produced showing a high percentage of leads produced with that campaign code, the higher management is satisfied because the figure shows that this way of working has been effective.

*"We did that [asking for the campaign code] because we wanted proof that the CLM lists were being used. So when there was a new lead that was being made in CRM, it had to have the code by the CLM system."*

*(Sales director)*

*"They use the database and they say 'look at how TelCo and account managers are successful with using this model'... When you are successful, you have to expand it for all the channels..."*

*(External account manager)*

### 3.4.5 Hiding in the present

Due to these opaqueness practices, the CRM system contains also inaccurate data, which decreases the efficiency in planning and coordinating the deals. Thus, maintaining a shadow administration in Excel or hand-written notes becomes handy to keep up with the customers, but also enables hiding information from others, who would see it in the CRM system.

*"They are going to make their own list, which isn't in the system, so that the headquarters can find it. The salesman and the sales manager, they have their dialogue based on the real data, and they put some data in the CRM system, 'so that those jerks from the headquarters won't bother me with all kinds of questions and difficult processes'".*

*(Manager of Sales Intelligence)*

### 3.4.6 Acting upon past transparency

As previously mentioned, data such as invoices can be thought of as "hard data", which could not have been intentionally distorted. Thus, figures based on such data always constitute a transparent lens on how account managers performed in the past. Also, such data remains in the CRM forever, haunting the account managers. To take the example of

Kate, the internal account manager from Sales Medium; at the end of the year she is evaluated on her overall performance during that year. Management looks at the figures on her order intake and revenues; if she has reached her target, she gets her bonus. Kate often reflects on these figures as well to estimate her upcoming evaluation. She also reflects on the figures that compare her revenues of the current year with the revenues of the previous years, as to estimate whether she needs to do more orders to ensure her revenue target.

*"But your question was how they control it... They see by the way turnover, if it's going up or going down, if you get the orders in, and if you lose any, what story is there. That's how they control..."*

*(Account manager in Sales Large)*

Another way through which the account manager acts upon the transparency produced in the past is looking at the information that has been previously stored by others. While preparing, Kate reflects on the interactions that the customer had with customer service employees or with the account manager before her, and estimates what she will hear when she calls the customer.

*"The CRM shows the funnel, and it shows what the account manager before me has put about the potential of the client, so we also used that to look which customer was interesting at that moment."*

*(External account manager)*

### 3.4.7 Acting upon past opaqueness

Considering the inaccurate leads and opportunities that account managers registered in the past and never updated, or manually entered data that was accidentally wrong, the CRM system includes also opaqueness produced in the past. It is possible that a figure calculated from past CRM data is not correct. This leaves room for casting doubt on past figures to negotiate in the present and influence the results in the near future. For example, if the figures from last year's orders show that Kate had a small deviation from her target, she can question the numbers to get her bonus.

*"Well not all those reports, but the outcome of the total has a direct effect on the pay plan, so when you are going to say 'the figure isn't correct', then we have to clarify that. In all cases we have to do some manual handovers. Everybody makes mistakes. So in the dataset there are about 1.2 million records per month. Somebody makes a mistake, so there's always an inconsistency... And the sales person will always find that one. Because he knows what he has done with his customers, we only have the data. So he can see the difference in outcome. So he will challenge the quality of the data in total, therefore the total data isn't right and the discussion is happy."*

*(Manager of Sales Intelligence)*

### 3.4.8 Being transparent to influence the future

Storing the information about the customer such as interactions and sales opportunities enables building a sketch of the customer in the CRM system, which is and will be visible to many stakeholders. Alex, the account manager from Sales Large, finds it easy to look at

the information stored from the previous account manager when he gets a new client. Projecting that he will change his customers set in a couple of years' time, he wants to ensure that the account manager after him will serve the customer well. Storing information about his customers in CRM ensures retaining knowledge of the customer for the future.

*"They know the customer, but TelCo doesn't know the customer. So I think they need their input. And I think CRM will be a nice system to put info in. Because it's in their head, from Large, you know what I mean? [...] And if somebody is moving, gets a promotion, and somebody else takes it over, and if everything is already in the system, it's nicer to start..."*

*(External account manager)*

The availability of all the data in the CRM, combined with the analytics capabilities of TelCo, enables forecasting the future revenues. Alex knows that such information is always important to the top management, who need the forecasting reports to provide estimations about the revenues in the next years to the shareholders. Thus, he is reinforcing the predictability of sales, by storing the sales opportunities in the CRM system, projecting that this will help TelCo be transparent.

*"We can predict what is going to happen in the future. And TelCo is at the stock of [name of stock exchange office], so the people who are investing money, TelCo wants them to know what is happening in the future, so we have to be predictable. And that's the reason that higher management, [name of sales director], he wants to know what is the business for the next few quarters, and for the next years. And then you have to be predictable, and CRM is helping us with that."*

*(Account manager in Sales Large)*

### 3.4.9 Being opaque to influence the future

The data stored in the CRM system will eventually feed new figures and reports that can influence decisions in the future. Projecting the influence that the data and figures from this data can have in the future, the account manager may choose to be opaque in order to fiddle with such figures. Alex is always concerned about his future targets. He knows from past experience the "game" that is played in the start of every year with the calculation of sales targets, in which all actors negotiate about who should get a higher and who should get a lower target. If the sales management sees a very high opportunity in his funnel, they could assign him with a higher target compared to other account managers. The same could be for the total target of his sales team; other sales managers could refer to the funnel report to negotiate which team will get the highest target. Projecting how easily a major opportunity will become visible in the funnel report in CRM and (based on past experience) expecting that it will immediately attract attention with the risk of influencing his future targets, Alex prefers setting a lower value than the real one if he has to store a very high opportunity.

*"When you fill in that a customer maybe would sign for a contract for one million, then also, it would be possible that your target is changing, it would be higher. So some people try to stay low, under the radar... And if they are successful, great, but if they're not successful, they didn't lose anything, in the system..."*

*(Account manager in Sales Large)*

The CRM system allows for the major business opportunities to easily attract the attention of management, as they will always rank the funnel report based on the value of the opportunities. Alex knows from past experience that management develops high expectations when they see a major business opportunity appearing in the weekly reports, so it will be more severe if they eventually see in the oversight of the funnel that it didn't turn to an order. Projecting the possibility of not closing the deal for a major business opportunity and appearing to have failed, Alex prefers that his opportunity doesn't rank high in the weekly reports, and thus sets a lower value when storing it in the CRM system.

*"And everybody is playing the safe side. Because if you put in a lead for a customer project that's worth like... Well you know that it's probably worth a million. One Million euro order intake. As soon as you put it in for one million, [there will be] visibility, and so the end management will have a lot of attention on you and your project. So if you fail, then [the failure is] visible. So that's why people are holding back, until they know for sure that they are right about it."*

*(Account manager in Sales Large)*

Finally, the CRM system allows for the sales opportunities to become visible across various sales channels. Thus, a high sales opportunity that flashes in the weekly reports can trigger political discussions about where the customer should be allocated. In fact, in the start of every year customers are reallocated to the sales channels based on their revenues and it is a well-known principle that customers who bring very high revenues deserve to get more attention and be served by account managers in a higher customer segment. Nick, the account manager from Sales Medium, has had experiences in his team, when they had to lose their high potential customers to Sales Large. He knows that his big opportunity will start "flashing" in the weekly reports and will attract the attention of Sales Large. Nick is projecting the future: if this opportunity turns to a deal, this will ensure him not only reaching the order intake target, but more importantly it will help him significantly with reaching his revenue targets in the next two years. However, if Sales Large finds out about the opportunity through the CRM system, they will try to get the customer (and thus all potential revenues) away from him. Thus, by recognizing the situation, and projecting how it could evolve, Nick chooses to set a lower value for his originally big opportunity, in order to decrease its prominence in the CRM system.

*"When you put such a big amount in CRM, people are going to see it, and people are also going to try to take the client away from you. For example Large Enterprise. Because they say, 'Oh one million, that shouldn't be a medium client, that should be a large client, he has to come to us.' Then that discussion starts. So a lot of people say, 'no no I don't want to be in the spotlight'. I would do the same maybe, I would just put it for 200,000 while I know in my head that the opportunity is 1million, but I don't want anybody else to know that it's that big opportunity."*

*(External account manager)*

### 3.4.10 Affordances of the CRM system

In the previous paragraphs we described the practices through which account managers are dealing with the transparency that the CRM system affords. We see that in order to deal with the consequences that they may face if their actions become visible, they often play with the CRM data to fiddle with the reports and figures that render their actions visible and often even prominent.

*"We play hide and seek. Yeah, it's a game. It's a game. Eh... Me personally, I'm not the person who is always doing that. Because I think yeah, I can say that it is 1million or I can say that it is 100,000. Yeah, I will sign it for 1million. I don't care about that. But there are a lot of colleagues who will sign it for 100,000 euros. It's a game. It's hide and seek. Yeah... It's ridiculous when you think about it. Because, when you are looking at the predictability of the account managers, you are not predictable when you sign it for 100,000 while it's 1million. So yeah, I don't understand it, but it is happening."*

*(Account manager in Sales Large)*

Had the CRM system not been there, TelCo would still try to impose transparency, and account managers would still try to play games. Nevertheless, the materiality of the CRM system not only intensifies the effect that numbers and other types of data have on people's behavior by adding pressure to them, but it also reinforces an almost effortless engagement in this numbers game, as account managers can edit the values of sales opportunities whenever they want, as long as the customer is in the "suspect" or "lead" phase in the funnel, without leaving traces.

Thus, to better understand the importance of the materiality of the CRM system, we look at its affordances (Faraj & Azad, 2012). Information about the customers, the interactions with them, their sales opportunities and orders, becomes visible across the whole organization. Sales managers, higher management, other account managers, specialists and other stakeholders can access this information in real time, so they can respond quickly to sales opportunities, running deals, and other incidents. The fact that the data remains stored in the CRM system allows the account managers to use information about their account managers that was previously stored by others, but also to store information that will be useful in the future for a specialist, a customer service employee, or even another account manager.

At the same time, all the stored data can haunt the account managers: e.g. a high opportunity stored now will keep threatening their bonuses in the future for longer time, as it will be quickly spotted in the CRM system. Furthermore, the CRM system makes the extraction of data for the preparations of reports and figures that help evaluate the performance of the account manager very easy, and in fact much easier than a paper archive or even the use of Excel files. Analytics features allow for almost automatic accumulation and summarization of the data in figures and tables, which can also be post-processed (e.g. by ranking the sales opportunities based on their value), so that actors can



quickly spot information that is important to them (e.g. the sales manager seeing which major business opportunities come up in their team). Thus, when account managers fill in some information in the CRM system, they will almost automatically start projecting what impact this data will have on their future performance.

Finally, the account managers can distort part of the data easier than before: in fact, while the customer is in the “suspect” or “lead” phase, they are responsible for it and thus have the freedom to add the values, codes etc. which they prefer, as well as changing them back to the real estimated values later, without leaving traces. After the specialist picks up on the lead and puts the customer in the “prospect” phase, the account managers themselves cannot directly change the sales opportunities anymore, only track the funnel of the customer. This also implies that data from the past can be opaque only on data such as sales opportunities that were never actualized, or sales interactions that were incomplete or missing.

### **3.5 Towards a temporal view of the performativity of transparency**

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Considering all these affordances of the CRM system, we reach two conclusions: First, the CRM system triggers the actors to not only make judgments in the present situation, but also to reflect or act on the past and project their future. In fact, the account managers know that their past, present and future are interwoven with the reality that the system represents; a data-constructed reality that constitutes not only a view of the present (e.g. current status of customers in the funnel), but also a view of the past (e.g. past orders) and even a view of the future (e.g. sales opportunities). Such a data-constructed reality is not merely a material one, but in fact it is performed in the ongoing practices (Scott & Orlikowski, 2014) of registering data in the CRM, creating figures and weekly reports, monitoring these reports, and so on.

Second, we get to see that the transparency that the CRM system affords also brings opportunities for opaqueness: as the account managers evaluate the influence that this data-constructed reality can have on their performance, as it is visible to everyone and instantaneously, and know that they have the ability to shape it to some extent, they choose to enact opaqueness at times. Consequently, we see performativity of transparency in practice (Roberts, 2009). However, to fully understand how it emerges, we need to examine the temporal orientations in the enactment of transparency and opaqueness by the account managers. In table 2, we untangle the trichordal composition of the transparency and opaqueness practices that we just described. Except for the “dominant tone” which constitutes the main temporal orientation (past, present, or future), there are also “secondary tones” (the other two temporal orientations), always playing along (Emirbayer & Mische, 1998: 979).

Table 3.2 The performativity of transparency

Internal structure\ Temporal orientations of transparency		Reflecting on the past	Dealing with the present	Projecting the future
Transparency in the present	Being transparent in the present: Showing current performance to the organization	The CRM data such as sales opportunities, signed orders, invoice data, etc. feed weekly such as revenue lists, overview of sales opportunities, order intake, etc. Evaluation based on these figures has become a routine activity for all sales people.	Account managers inform their colleagues and sales managers on which customers they are visiting, for what kind of portfolios, what deals they are closing, what revenues come in, etc. via the interactions on the CRM, the phases in their funnel, and the invoice data stored in the CRM.	The weekly reports in CRM help select where to put focus on the upcoming days, e.g. whether the sales team should organize a focus day to increase sales on a specific portfolio, or whether an account manager needs help from his sales manager or others.
	Being opaque in the present: Avoiding pressure on how to do their work	Past experience has shown that major business opportunities that rank high in the reports extracted from CRM data, attract the attention of sales managers, who then put pressure. They also trigger other stakeholders who want to be involved in the deal to get their bonus.	Account managers often register a lower value for a sales opportunity that they store in the CRM system, to make it less prominent in the reports and thus stay under the radar.	Account managers expect that if they set a lower value for an opportunity in CRM, this will not attract attention in the reports and they will be able to work on the deal in their own way.
	Being opaque in the present: Avoid being challenged by the sales manager	White spots reflect the fact that an account manager has not spoken about a portfolio with his customer, although he is expected to cover all portfolios in his conversations with him.	Account managers add fake leads in the system to avoid having a white spot.	Account managers expect that if they do not include a sales opportunity about one portfolio with a customer, it will appear in the white spots list and they will be challenged by their managers.
	Being opaque in the present: Trying to make things look bright	If many leads have been registered with the same campaign code, this indicates that the specific campaign or way working is effective.	Account managers often add a campaign code when they register a lead even if they didn't follow the specific way of working to generate the lead.	Account managers expect that if they add the campaign code the directors will be satisfied, projecting that this will show that the model works.
	Hiding in the present: Keeping shadow administration	As the CRM system gives access to more people (e.g. customer service) who could have also edited customer information, account managers find inconsistency in the data.	Account managers maintain their own shadow administration in Excel files and notes, in which they keep all information about customers, deals and sales opportunities accurate.	The shadow administration can be useful in the future, not only to maintain a correct view of the customer's pipeline, but also to provide proof if necessary.
Past transparency	Acting upon past transparency: Being evaluated on past performance	Hard data such as financial data from invoices remain stored in the CRM system and help provide a history of how many deals were closed, how sales opportunities developed, and in general how the account managers performed in the past.	Account managers check the figures from the CRM system (e.g. differences in the revenues from last year) to evaluate their current performance.	Account managers look at reports from CRM data, e.g. the revenues difference from last year, to estimate how far they are from reaching their upcoming target and decide their course of action.
	Acting upon past transparency: Using past information stored by other people	The CRM provides a history of the interactions with the customer, i.e. what previous account managers or other stakeholders (customer service, specialists) discussed with him.	The stored customer interactions in the CRM help the account manager get prepared before contacting the customer.	Sales opportunities that the previous account manager had registered in the past may show up in the CRM for possible future leads.

	Acting upon past opaqueness: Inaccuracy in the past allows for negotiations in the present and future	The CRM system contains inaccurate information about the customers, which had been set by account managers or other stakeholders in the past, by accident or on purpose.	Sales people can claim that the figures from the CRM data are incorrect by juxtaposing data from their shadow administration, to prove that they actually reached their target.	Sales people favor having inaccurate data in the CRM system because they can put the blame on the inaccuracy if any issues come up in the future.
Transparency to influence the future	Being transparent to influence the future: Retaining knowledge	Information on the CRM stored by the previous account managers helps an account manager when he has to start working with a new set of customers.	Account managers store information about the interaction with their customers and sales opportunities in the CRM.	Storing information about the customers in the CRM will help account managers and other stakeholders who will have to serve the customer in the future.
	Being transparent to influence the future: Having to be predictable	Data about sales opportunities and closed deals that have been stored in the CRM system in the past feed the forecasting for the revenues in the next years.	Account managers store their sales opportunities in the CRM to help increase the predictability of Sales.	Top management uses forecasting reports to provide estimations about the revenues in the next years to the shareholders.
	Being opaque to influence the future: Trying to influence their future targets	Sales opportunities with high value become prominent in the CRM reports. Sales managers look at these opportunities to negotiate about the team targets, or to give a higher target to the account manager who appears to have customers with high prospect.	Account managers often set a lower value when storing a big opportunity in the CRM system, so that management doesn't foresee the increase in the future revenues and assign them with a higher target.	Account managers project how their targets might increase or decrease in the future based on the deals they close and the sales opportunities they create and store in CRM. They aspire to get an easier achievable target that will ensure their bonus at the end of next year.
	Being opaque to influence the future: Managing their managers' expectations	A high lead that did not turn to a deal becomes visible in the oversight of the funnel and triggers questions from the management, on how this happened and why.	Account managers often provide a lower value for a sales opportunity that they store in the funnel, so that it doesn't gain prominence in the funnel reports and develop high expectations for management.	Account managers project that if management sees a very high sales opportunity in the CRM they will increase their expectations and thus it will look like a failure if they don't get the deal.
	Being opaque to influence the future: Trying to keep the customers with high value prospects for their future revenues	Several incidents have happened in the past when Sales Large found very high opportunities from medium clients in the CRM funnel reports, and tried to get the customers allocated from Medium to Large.	Account managers often provide a lower value for a sales opportunity, in order to make it less prominent in the funnel reports and hence hide the high potential revenues from other sales channels.	Medium account managers fear that people from sales large will notice the big opportunities ranked high in the funnel reports and will try to take over a customer with very high prospect. That will mean that the high revenues from that customer will not be taken into consideration for their target in the net years.

In this way, we get an illustration of how account managers choose to be transparent or opaque in the present, shaping the data-constructed reality of the present, as they are reflecting on the effects of the transparency produced through the CRM system in the past (e.g. weekly reports for routine activities, or having received pressure from colleagues on sales opportunities that were made visible), and projecting their intentions for the near future (e.g. helping the team increase their targets or avoiding pressure). Further, we see how the level of accuracy in the data stored by previous enactments of transparency (e.g.

customer interactions) or opaqueness practices (e.g. fake leads), which constitute a data-constructed reality of the past, influence the account managers' practical evaluations in the present (e.g. checking the CRM figures), and their expectations for the future (e.g. estimating whether he will reach his target). Finally, the account managers project how the sales opportunities and customer interactions that they store for the future (shaping the future data-constructed reality) might influence their future situation (e.g. their targets in the next year), by identifying with past experiences (e.g. how targets were calculated in the past years), and thus try to influence their future through their actions in the present (being opaque or transparent).

### **3.6 Discussion**

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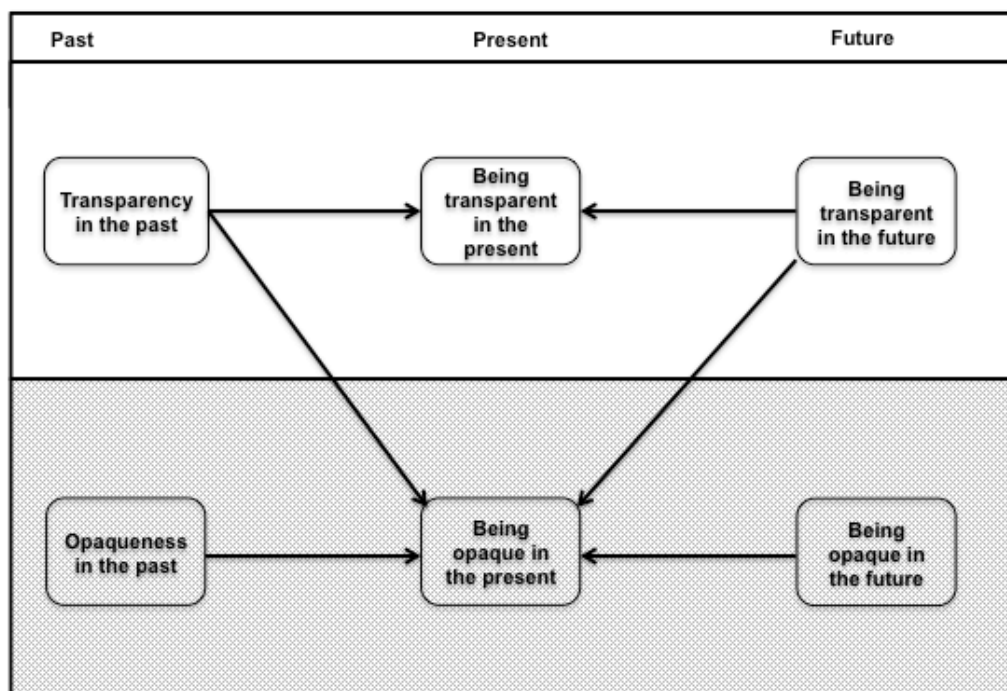
In this study we have tried to unpack the performativity of transparency: i.e. transparency, having sociomaterial agency, offers the possibility to enact not only visibility, but also opaqueness, on the things that it is aimed to shed light on. In order to do so, we have illustrated how account managers, as they enact the CRM technology, find themselves playing a numbers game, switching modes between transparency and opaqueness to achieve their goals. The numbers (and other types of data) in this game are not merely the resources through which account managers try to attain their goals, but are actually actors themselves, having equal power to influence the account managers' actions. Thus, in order to understand the performativity of transparency, we have to conceive of performativity as sociomaterial (Orlikowski & Scott, 2014), i.e. the forces of transparency that influence that which is rendered transparent are shaped in sociomaterial practices. In other words, transparency is not merely a guideline in the organization, but it is sociomaterially constructed through the enactment of the CRM system, while it triggers sociomaterial practices that reveal or conceal the information about the customers and the actions of account managers. Other material forms that could also afford transparency, such as paper archives or the exchange of Excel files via e-mail, would not trigger the same sociomaterial practices. Account managers are well aware that whatever they do has a material effect: for example, all information they store about their customers, sales opportunities and customer interactions becomes visible to many different actors and in real time, thus making their exposure, performance evaluation, and so forth much easier than other forms of transparency. Hence, they will try to influence that material effect and play with the numbers and other data they store, according to how they evaluate the situation at hand (using not only their perceptions but also by making sense of the data-constructed reality captured in the CRM system) and the ways through which the CRM system can make things transparent (e.g. ranking of sales opportunities based on their value, or calculation of white spots). The fact that the changes that they make in the stored values in the CRM system do not leave any traces, compared to a paper archive for

example, also highlights the importance of the materiality of this technology in enacting the opaqueness practices.

In order to better understand the performativity of transparency, we also have to recognize that all sociomaterial practices triggered by transparency are oriented towards a temporal orientation: The data and functions of the CRM system are not only related to what is happening in the present, but also refer to the past and can even help reflect on the future, thus making the material effects of transparency even more perceptible. Consequently, at every moment in the present, the account manager is oriented towards a data-constructed reality of the present, past, or future, while simultaneously considering the data-constructed realities and the situation in the other two temporal orientations. It is through this trichordal temporal orientation (Emirbayer & Mische, 1998), that transparency actually works as a blind, which can open and render things transparent, but it can also close and make them opaque.

In figure 1 we illustrate this dynamic of shifting modes from transparency to opaqueness through the materiality of digital technologies and the different temporal orientations. More specifically, we can see that transparency can trigger both practices of being transparent or being opaque. Reflecting on how a practice of making something transparent was enacted in the past could influence people to choose whether they will make some information transparent or opaque in order to influence their present or future. On the other hand, our analysis showed that reflecting on the opaqueness of the past would only lead to enacting opaqueness also in the present.

Figure 3.1 Visualizing the performativity of transparency



The insights of this study inform past views on IS which have considered information systems as ways to increase transparency in the organization, looking at technologies such as enterprise systems, knowledge management systems, management information systems, and other systems, as ways to develop an information panopticon (Burton-Jones, 2014; Elmes et al., 2005; Zuboff, 1988). Instead, our study suggests that the transparency afforded by such systems often triggers opaqueness, which can be enacted through the same technologies that are perceived as forms of transparency. This comes in line with more recent studies, that highlight the tension between transparency and opaqueness by looking at the development of opaqueness practices for productivity (Bernstein, 2012), use of performance data for impression management (Cunha, 2013), the use of shadow systems as a form of material loose coupling (Berente & Yoo, 2012), imperfect numbers in performance measurement (Andon et al., 2007; Dambrin & Robson, 2011), practices of calculation and fraud in accounting (Boll, 2014; Cooper et al., 2013; Neu et al., 2013), and so forth. Our analysis of the performativity of transparency contributes to these studies, by analyzing the sociomaterial practices through which transparency and opaqueness are produced. Our use of the chordal triad of agency (Emirbayer & Mische, 1998) helps extend the work of Hansen and Flyverbom (2014) on how digital technologies afford transparency with a temporal orientation, while it also helps expand our understanding of material-discursive performativity (Orlikowski & Scott, 2014).

Furthermore, the study contributes to the studies in organizations that take a performative perspective (Gond, Cabantous, Harding, & Learmonth, 2015), and particularly to studies of technology in organizations (Orlikowski & Scott, 2014, 2015), by highlighting the temporality that is inherent in the notion of performativity. The study at TelCo shows that sociomaterial practices reconfigure reality along a temporal dimension. In other words, the enactments of sociomaterial practices can draw the attention towards the past, present, or future and perform different consequentialities. For example, the interaction of account managers and sales managers with the weekly report on sales opportunities draws the attention to the account managers with substantially high opportunities, increases the pressure on them, and thus influences how the account managers interact with the system in the future, e.g. by choosing to store a lower value in the system to “stay under the radar”.

The insights of the study also provide implications for practitioners seeking to use digital technologies to increase transparency in their organization, suggesting that the materiality of these technologies, combined with the way they evaluate their employees, will have a significant impact on how the employees will enact the technology, and thus render their actions transparent or opaque to the organization. Thus, the digital technology that they choose should be designed while considering how the practices of performance evaluation may influence the way people will use it. For example, if the CRM system at TelCo generated a digital trace every time an account manager would edit the

sales opportunity in the system, it would probably limit the opaqueness in the system, as account managers would know that their changes would be monitored.

Despite the aforementioned contributions, our study involves certain limitations: First of all, we were not able to follow the account managers in their visits to the customers, due to confidentiality reasons. Since we could not observe this part of their practice, we had to rely on their accounts and compare the descriptions amongst multiple respondents. In addition, our limited encounters with the directors of TelCo (two interviews in total) made it difficult for us to illustrate their involvement in the numbers games, although our data often implied that to some extent opaqueness was tolerated by higher management. This also restricted us in analyzing the interplay between the performance management system and the CRM system, since we were able to investigate how the materialized practices of performance evaluation (and specifically the estimation of targets) influenced the employees' practices of visibility, but we could not give a detailed account of why those performance management practices were formed in this way in the first place. Finally, the bureaucratic structure and the culture of TelCo set a boundary condition for the generalizability of our findings. More specifically, the numbers games might emerge differently in a smaller organization with a flat structure, in which the higher management may be situated closer to the employees and evaluate them more by observing them in their work rather than by using quantifications.