

Into the black box of a nursing burden, a comparative analysis of administrative tasks in French and American hospitals

Lucie Michel

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Présentée par

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Résumé

Le travail administratif est bien souvent vécu comme un fardeau par les infirmières hospitalières qui ont le sentiment qu'une accumulation de paperasse les empêchent de passer plus de temps auprès du patient. Ce sentiment est d'autant plus fort que les soignants doivent sans cesse s'adapter aux contraintes gestionnaires qui pèsent sur les hôpitaux. La nécessité de rendre des comptes, les nouveaux modes de financement, les logiques qualités, les raccourcissement des durées de séjour et plus largement la complexification des parcours de soin, sont autant de facteurs qui appellent les soignants à participer à un large panel d'activités dites administratives. Ainsi, l'implication du personnel soignant dans ces tâches constitue un enjeu majeur de management des ressources humaines dans les hôpitaux. Pourtant, il existe peu de description de cette part oubliée du travail infirmier, de ces tâches peu valorisées. Les recherches sur la profession infirmière interrogent l'évolution du soin clinique laissant dans l'ombre une partie importante de la journée de travail.

Cette thèse s'est donc attachée à ouvrir la boite noire du travail administratif infirmier à travers divers contextes de soins dans deux pays : la France et les Etats-Unis. Une étude ethnographique a été réalisée, impliquant plus de 50 infirmières et près de 700 heures d'observation. Les résultats ont permis l'identification de 6 grandes activités administratives et organisationnelles appelées DOA (*Documentation and organizational activities*) :

- 1. Remplir le dossier médical du patient
- 2. Coordonner les activités et les examens: communication avec d'autres soignants, organisation d'examen et prise de rendez-vous.
- 3. Manager les flux de patients: gestion des entrées et des sorties, commande de brancard, ambulance, écriture des dossiers de sortie
- 4. Transmission d'informations: transmission orales et écrites avec ces collègues infirmiers ou d'autres soignants.
- 5. Reporting et suivis d'indicateurs qualité: reporting interne et externe, exemple:la douleur, hygiène des mains, suivis transfusion de sang etc
- 6. Commande de matériel et gestion des stock: vérifier les fournitures, en commander, faire des commandes de pharmacie

Ces DOA sont symptomatiques d'une adaptation aux nouvelles complexités des parcours de soin et prennent trois formes : le reporting d'indicateurs et de suivis de l'activité, les activités organisationnelles liées notamment aux besoins croissants de coordination et enfin, l'implication dans la vie institutionnelle de l'établissement.

Ces activités se retrouvent d'un service à l'autre, mais leur contenu et la perception que les infirmières en ont sont différents. L'analyse fine du temps passé à faire ces activités mais aussi leur contenu, a révélé que le temps passé n'est pas le principal problème. Le sentiment de fardeau administratif serait plutôt lié à la manière dont ces tâches sont intégrées ou non à la pratique. La délégation de tâche, le dossier médical informatisé, la pertinence des informations collectées, la reconnaissance des DOA dans les calculs des ratios infirmières-patients sont autant de facteurs d'intégration du travail administratif révélés par le terrain. Le dossier médical partagé peut être un levier d'intégration important mais une informatisation excessive et trop uniformisée peut conduire à des pratiques peu éthiques et dommageables pour la qualité des informations collectées mais aussi et surtout la qualité des soins. La création d'échelles de compétences cliniques incluant les DOA peut constituer une opportunité de délégation des activités des managers créant une meilleure synergie dans l'organisation des soins.

Enfin, les ambiguïtés et contradictions révélées dans cette thèse nous apprennent qu'il existe plusieurs registres de perception du travail. Comme il est légitime de regarder et valoriser le travail infirmier toujours sous le prisme d'un registre de soin direct au patient, il est légitime de se plaindre de ce qui en éloigne. Cette plainte reprise par la profession toute entière ne se vit pas toujours comme telle sur le terrain. Il y a parfois des moments où le travail administratif aide à objectiver le soin et à se rassurer sur des bonnes pratiques, notamment dans un contexte de complexification des parcours de soin. Il y a parfois des moments où l'on préfère s'installer auprès de ses collègues et écrire une note plutôt que de faire face à une situation émotionnellement éprouvante. Il y a parfois des moments où l'on se précipite sur l'ordinateur pour rendre compte d'une situation et faciliter le travail de l'équipe suivante, ou tout simplement de se protéger face à de possibles complications ou recours de patients insatisfaits.

Les institutions hospitalières et les leaders infirmiers ne considèrent pas ces différents registres dans leur vision de l'idéal du métier. Tant qu'ils ne seront pas prêts à les reconnaitre, alors subsisteront toujours des distorsions parfois violentes menant à un épuisement du personnel soignant.

Abstract

Administrative work is often perceived as a burden by hospital nurses, who have the impression that the accumulation of paperwork prevents them from spending more time with patients. This feeling becomes yet more pronounced as caregivers are expected to ceaselessly adapt to managing constraints affecting hospital work. The need to report, new funding methods, quality rationales, the shortening of stays, and more generally the increasing complexity of treatment, are all factors that beg the increasing participation of caregivers in so-called administrative activities. As a result, the implication of caregivers in these tasks constitutes a major challenge for the management of hospitals' human resources. And yet, precious few descriptions exist of this forsaken aspect of nursing work, of these under-valued responsibilities. Existing research about the nursing profession focuses on the evolution of clinical care, which often contributes to obfuscating an important part of the nurse's workday.

Thus, this thesis seeks to open the black box of nurses' administrative activities throughout various care contexts in two countries: France and the United States. An ethnographic study provided the basis for this research, involving nearly 50 nurses and 700 hours of observation. The results allowed for the identification of 6 categories of administrative and organizational activities, called DOA (Documentation and Organizational Activities):

- 1. Filling out the patient's medical record
- 2. Coordinating activities and exams: communicating with other caregivers, organizing exams and setting up appointments
- 3. Managing patient flow: administrating admission and discharge, scheduling stretchers, ambulances, writing up discharge records
- 4. Transmission of information: oral and written communication with other nursing and caregiving colleagues
- 5. Reporting and following up on quality indicators: internal and external reporting. For example: pain, hand hygiene, follow-up for blood transfusion, etc.
- 6. Ordering supplies and managing stocks: verifying and ordering supplies, placing orders for the pharmacy

These DOA are symptomatic of an adaptation to new complexities of care, and manifest themselves in three ways: the reporting of indicators and the monitoring of caregiving, organizational activities particularly related to increasing coordination requirements, and finally, involvement in the establishment's institutional life.

These activities are found from one ward to another, but their content and the perception nurses have of them are different. A refined analysis of the time spent on these activities, as well as their content, has revealed that time consumed is not the main issue in and of itself. Rather, the impression of an administrative burden is linked to the ways in which these tasks are integrated (or not) into practice. The delegation of tasks, the computerization of medical records, the relevance of collected information, the recognition of DOA in calculating patient-to-nurse ratios; all are integration factors of administrative work revealed in the field. Computerized and shared medical records may also act as an important means of integration, but excessive and standardized digitization can also lead to unethical practices that may harm the quality of collected information as well as, more importantly, the quality of care. The elaboration of clinical proficiency scales, including these DOA, could provide an opportunity for the delegation of managers' activities, thus contributing to greater synergy in the organization of care.

Finally, the ambiguities and contradictions revealed by this thesis demonstrate that perceptions of administrative work are indeed quite varied. If the study and valorization of nursing work through the lens of direct patient care is legitimate, then so is complaining about what distances caregivers from it. This kind of complaint, echoed by the profession's entirety, is not always experienced as such in practice. There are times when administrative work helps to objectivize care and to reassure caregivers that their practices are correct, especially in the context of increasing complexity of care. There are times when sitting next to a colleague and providing hand-written notes is preferable to facing emotionally difficult situations. There are also moments when computers provide an opportunity to report on situations and facilitate ensuing teamwork, as well as acting as a means to protect oneself against eventual complications or actions by unsatisfied patients.

Hospital managers and nursing leaders do not take into account these different perceptions in their ideal vision of the profession. As long as they are not ready to recognize them, sometimes extreme distortions will continue to contribute to the weariness and exhaustion of caregivers.

Into the black box of a nursing burden,

A comparative analysis of administrative tasks in French and American hospitals.

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Introduction

New York, on a hot day in May 2013, I was accompanying Mary¹, a registered nurse (RN) with 4 years' experience. She was sitting in front of a wheel table looking at her computer screen. Jack, her colleague, stopped by: "Hi Jack, what's up?", "I'm fine, I had to help a patient who was falling over there, so I'm working...unlike you, sitting there doing nothing." Mary smiled, quickly turned back to her screen, and said, "Damn, they added two more subdivisions to this part. It's 10:30 am and I still have 3 more patients to document, it's driving me crazy! It takes so much time and, you know what, it's just so that the hospital doesn't get sued!" We then heard an old man screaming from the last room. A housekeeper stopped by and told us that the elderly patient was pulling out his urine tube; Mary looked at me: "Pfff, first I need to finish this documentation." The old man kept screaming, "Help, help..."

This particular scene of nursing life has been etched into my memory as a constant reminder of the contradictions and paradoxes surrounding nurses' administrative tasks. Jack's comment about Mary "sitting there doing nothing" is not at all anodyne. Such irony is a direct testament to the consideration afforded by nurses to "bureaucratic" tasks and to "paperwork." This scene also begs the question of what pushed Mary to prioritize computer documentation work over her primary job of treating a patient. Yet, this snapshot is also constitutive of the diversity of integration and appropriation of this work according to the context of care.

More often than not, these thankless tasks are made invisible – a set of little chores and hassles that represent a considerable amount of work when they are all put together. As Norbert Alter² explains, insurance company employees spend a majority of their time attending to administrative issues linked to inadequate procedures, and managers will work days on end to perfectly satisfy quality policies. We could even add that researchers also spend increasing amounts of time satisfying the administrative ordinances of their funders. In much the same way, Mary sees this reporting of clinical and administrative information as taking up too much of her time. This invisible labor is hard to detect, and often has little intrinsic value. Moreover, and interestingly enough, the sociology of gender has used this

¹ All names are given names in order to respect participants' anonymity.

² Donner et Prendre, p.93

notion of invisible work to characterize women's domestic tasks, as well as to describe the nature of secretarial jobs. In nursing, these invisible tasks often relate to organizational work (Allen 2014).

Frustrations over these "invisible" activities are readily observed among nurses in France, and they have been more publicly discussed following several suicides in the summer of 2016. A Le Monde article from the 2nd of November, 2016³, examined the issue directly: "the proliferation of tasks, especially of administrative nature, that do not directly relate to the work of care. 'We find ourselves having to manage schedules and to place orders for more stock, which has a direct impact on the time we spend with residents,' explains Gwendoline, a 26 year old nurse in an establishment for dependent elderly persons in Saint-Etienne (Loire, France). Another nurse lamented the 'amount of time spent coding everything she does.' That is, indexing procedures in order to allow the hospital to receive Social Security funds for treatment provided." The negative perception of time spent by nurses on "administrative work" is also an issue shared broadly by nurses in most of the developed countries as highlighted by these publication: "Disillusioned with paperwork" (Galvin 2013), "Nurses drowning in sea of paperwork" (Royal College of Nursing 2013). In the field, the question of reporting's place in nursing work is an important issue that goes beyond national borders (Draper et al. 2008). Cross-national studies have shown that "nurses around the world face similar issues despite cultural, economic, and social differences as well as variations in healthcare systems" (Poghosyan 2010). Nurses are increasingly busy with writing tasks that are not subject to strong attention, and that are not even seen as work in themselves, even though they can necessitate time and particular skills (Acker 1999).

These issues are made all the more important by the fact that they partake in a particular evolutionary context of healthcare systems. Indeed, the principles of New Public Management in the healthcare sector reinforce the necessity of holding health care organizations to account. The trend that has affected France for the past twenty years was initially developed in other countries; in particular the United States as forerunner since the 1980s. It is particularly characterized by the requirement to justify all costs related to a given activity, in accordance with financing methods (T2A in France, DRG-based payment and performance-based payment in the United States) and with quality, by developing markers

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 $^{^3 \}qquad \text{http://www.lemonde.fr/sante/article/2016/11/07/des-journees-sans-boire-sans-manger-le-ras-le-bolinfirmier} \ 5026497 \ 1651302.html$

and certification methods. In consequence healthcare management becomes increasingly dependent on artifacts structured around mechanisms and tools (Moisdon, 2005) that generate additional work in the field. More specifically, while nurses are being asked to develop increasingly complex clinical capabilities (IOM 2011; Hénard Berland Cadet Report, 2011), they must also participate in a large swath of other activities The rising demands for accountability, efficiency, safety and quality in health care also explain increased administrative activity and its negative perception (Healy 2009; Dent & Whitehead 2002). Complex admission and discharge forms, risk assessments, policy documents, audits and evaluation sheets are now part of a nurse's daily routine. Such administrative tasks are often perceived as not directly relating to care and as preventing nurses from interacting with their patients (Tyler *et al.* 2006). These complexities are combined with a new democratic impulse that require health care professionals to deliver user-centered service and to manage customization of care (Minvielle *et al.* 2014). This context pushes nurses to develop new skills to face these reporting, accountability and organizational needs.

Indeed, qualitative analyses have underlined the need to move beyond research predicated on essentialist assumptions about the 'true' work of nurses, and have focused instead on the work that nurses actually do. Allen (2014b), for example, has advanced this agenda with an in-depth description and analysis of hospital nurses' organizing work, then building on this analysis to marshal an argument for expanding "patient-centered" formulations of nursing to include "organizing work". This research highlights the organizational elements of nursing roles and has opened up important debates about the future of nursing. We build on this work to examine the difference between the perception and reality of nurses' administrative work in two different contexts of activity.

In this evolving context, what qualifies as "administrative work", its relationship to the wider nursing role and where/when/why it is considered a "burden" remains insufficiently explored (Allen 2014 a). Therefore, one of the aims of this thesis is to describe these tasks and open the "black box" that still surrounds them in two cross-national contexts.

Furthermore, very few studies looked at nursing practices using a cross-national comparative lens. But all together, these types of knowledge have the potential to provide valuable analytical insights into a range of nursing care practices problems (Chen 2012). They are necessary to articulate and describe nursing work in sufficient detail (Morris et al. 2007) especially given that the evolving health care system is likely to provide opportunities that

will extend nurses' activities far beyond the direct bedside care. Following up on a Master's thesis work this thesis relies on a cross-national comparative research as an innovative way to look at nursing work and contribute to the body of knowledge about France and the United-States but surely reflecting global challenges facing the nursing profession (Poghosyan 2010).

The present investigation sits at the crossroads of several fields of study – from the sociology of professions, to nursing science and management. Our theoretical frame will start from the activities themselves, in order to examine how nurses perceive them, as well as to study their perception of management tools. Following the foundational work of Hughes (1951), the idea is first and foremost to study the ways in which nursing work reconfigures itself, to study the tasks at hand, and to identify who completes these tasks. This also implies studying the work itself: what it is made of, the interactions and constraints at play in everyday practices, as well as actors' relationships to their own work. The issue is both subjective and objective: it concerns work conditions themselves, and how nurses interact with their work. This study is based on a comparative ethnographic method.

Ethnographic field does not necessarily rely on the reproduction of theories, invariants or even "models." Rather, its objective is to reveal the complexity, the contradictions, and the multidimensionality of phenomena and situations. Our fieldwork is fully imbued with this approach; fine analysis of the literature helped us to contextualize the research and provide first intuition to better inquire in the field. These intuitions can be considered as flexible hypothesis (Peneff 1992).

As such, it is particularly interesting to ask what ideal nursing work consists of, and to question the importance of organizational duties for care (Allen 2014). How is this often-derided and invisible work not an integral part of producing and providing care? Do all these administrative activities affecting nurses relate to organizational work? How do they contrast with ideal practices? Finally, has the nursing profession and its ideals evolved, implying a need to redefine certain nursing tasks and to make other aspects more visible?

All in all, this thesis will therefore question how is nursing evolving considering the rising demands for accountability, efficiency, safety and quality in health care, all of which come together to help explain both increased administrative activity and its negative perception?

This pivotal concern has sparked a number of inquiries: what does administrative work actually consist of for nurses? What is its place in nursing practices? It also invites us to ponder the objective and subjective impacts of reinforcing accountability measures on caregivers in a hospital, but also the kinds of regulation (formal /informal, individual/collective, none) that are developed to manage these activities. How does the evolution of nurses' activities and practices impact the relationship with other healthcare professionals? And finally, it examines how digital evolutions, such as electronic medical records, influence relations with administrative work.

As a result, it is crucial to understand how administrative and organizational activities linked to the production and coordination of care, to the requirement of collecting data, and to the evaluation and the certification of practices, are perceived by caregiving personnel, and what their impact is on everyday practices (Derujinsky-Laguecir *et al.* 2011).

The thesis, resting on comparative field studies conducted in France and in the United States, will aim at two objectives:

- 1. To understand perceptions and integration of administrative work, of the time dedicated to it, and of its tangible content in different care contexts.
- 2. To allow, within the limits of the comparative method, the identification of cross-sectional phenomena and of specific variation factors, and to contrast the French case with a situation where the phenomenon is more advanced, allowing us to deduce a certain number of potential evolutions.

The chosen approach

In order to achieve these objectives we will present the results of our progression during this ethnographic adventure. Indeed, this thesis is supported by six case studies, in two French hospitals and one American hospital. The three French units were first selected according to the major differences they presented, allowing for a "polar case" study of administrative work (Flyvbjerg 2006). These three wards, the ICU, long-term geriatric care, and hepatology, were then compared to three similar units in the United States.

Our research focuses more specifically on the perceptions nurses have of their administrative work in varying contexts. It also seeks to precisely describe the different means by which nurses approach these activities, and how they are articulated with and integrated to more visible duties of the profession. This analysis also addresses the appropriation by use of electronic health records, since it appeared indispensable to our work, especially in the American wards.

The general layout

With respect to research constraints in public health, and especially the necessary publication of scientific articles, this manuscript has been elaborated around three articles, two of which have already been published, and which are referenced in the appendix, and one ready for submission.

However, as this study is first and foremost an experience in ethnographic research, its development will be particularly geared towards presenting the evolution of the research subject through different field experiences.

Accordingly, this thesis will be articulated around two major parts.

In our **first section**, we will present the research's context and design. Consequently, we will explore the state of () the evolution of nursing work in France and the United States, after which we will present the methodological tools used to observe the work being done.

As a result, the **first chapter** of this thesis will be dedicated to presenting the key issues at stake in the nursing profession of both countries, and especially in the context of healthcare reforms specific to each nation. It will then investigate the practices, functions and roles of nurses in the division of hospital labor in both countries, bringing to light comparable elements between France's state-certified nurses (*infirmière diplômées d'Etat*, IDE) and the United States' Registered Nurses (RN).

The **second chapter** will also show the tools necessary to opening the black box of nursing administrative work. That is, it will unravel the existing literature on the subject, showing first how "reporting" and "documenting" activities have the reputation of being time consuming and keeping nurses away from the bedside. Then, a close look at the nursing literature will highlight the importance of studying nursing use of their time mainly through time and motion studies. We will present a field of study mainly based on the sociology of medicine, seeking to provide a better understanding of nursing work and of all its constitute "invisible" activities. Finally, we will show the recent implication surronging electronic helath records. From this state of the art we highlighted three intuitions also called flexible hypothesis.

The prospects suggested by the literature call for particular methodological considerations that will be examined in our **third chapter**. There, we will present our choice of an ethnographic posture, and we will describe the way in which the research subject was constructed and the methodology applied. Finally, we will devote a section to the researcher's particular position in the immersive study of hospital services. This reflective effort has yielded the publication of a first article, written in the narrative form (appendix 1).

We will present the results of the study in the **second section** of this thesis. These outcomes are articulated around three chapters that follow the ethnographic study's progression: first, the French case studies; second, a comparison with the United States; finally, a focus on the use of electronic health records.

The **fourth chapter** will present our fieldwork in the three French units. We will first explaine the manner in which we constructed our categorization of nursing activities, as well as the timing of task before describing the perceptions nurses had of their administrative duties. The results of this dual methodology (the comparison of perceptions with time spent) will reveal the ambiguity surrounding administrative work: that the issue is not necessarily the time spent on given tasks, but rather the situational meaning afforded to them. These elements will provide the analytical frame necessary to the international comparison described in the following chapter. This chapter is an extended version of a published article (Appendix 1).

The **fifth chapter** will contrast the French studies with the three American cases. As a result, we will first analyze the American nurses' perceptions before suggesting a comparison of cases based on a very fine-grained analysis of each activity. These descriptive elements will help us construct an analytical frame concerning the integration of administrative work. These simultaneous case-to-case and country-to-country comparisons allowed us to better understand the organizational and managerial elements that help nurses integrate their administrative duties. The involvement of the nursing hierarchy and of the profession itself in understanding this invisible aspect of their work will also be addressed. This chapter will be later published as a third article.

We will close our second section with a **sixth chapter** dedicated to electronic health records. Indeed, chapter six will demonstrate the appropriation of digital tools as a principal vector of American nurses' administrative activities. The necessity of this close-up shot of electronic health records was borne of the fieldwork itself, and provides an opportunity to observe the strengths and weaknesses of the computerization process also at work in France.

Finally, we will **conclude** this work by resituating and discussing the principal results provided by this thesis, as well as by suggesting certain implications that this study has for management, nursing practices, and public policy. We will also present the limits of this study and the questions left unresolved that beg for further inquiry.

PART 1

Understanding nurses' *in situ* activities and their evolving work

Chapter 1 Nursing, a profession in motion

"Although the supply of nurses is likely to meet overall demand, the nature of a nurse's job is changing dramatically. In redesigned health care systems, nurses are assuming expanded roles for a broad range of patients in ambulatory settings and community-based care. These roles involve new responsibilities for population health, care coordination and interprofessional collaboration. Nursing education needs to impart new skills and regulatory frameworks need to be updated to optimize the contributions of nurses in transformed care delivery models". (Fraher et al. 2015)

This key message extracted from a recent research brief provides excellent insight into the actual problems related to the evolution of healthcare systems, and the need to rethink the roles and capabilities of nurses. Although these issues are symptomatic of the situation in the United States, they translate well to the French healthcare context, since the development of outpatient care and aging populations are phenomena shared by both countries. As a result, this research project takes its place within the extremely challenging context of the evolution of healthcare systems and work. This chapter first seeks to present the healthcare contexts in France and the United States, as well as the challenges related to the evolution of the nursing profession (1). In a second part, we will more specifically revisit the characterization of nursing work in each country, in order to demonstrate the similarity of nurses' roles in the division of labor albeit with differing prerogatives. We will also focus on American specificities relative to Magnet recognition and the clinical ladder, but also the diversity of non-clinical and administrative work (2).

1. Two national contexts of healthcare, common challenges

In this section, we will first investigate the involvment of nurses within an evolving health care system (1.1). Subsequently, we will describe the reconfigurations of nursing practices (1.2).

1.1 Involvment of nurses in evolving health care systems

In France and the United States, modern healthcare systems are undergoing profound changes linked to the organization of health care delivery but also to quality and safety. The United States precede France in terms of evaluation tools and quality control. The usage of quality control measures and indicators reflects the American socio-political context, and the importance afforded to accountability (Joannidès & Jaumier 2013).

The analysis of the chronological element (see figure 1) highlights the fact that in the past 50 years, American healthcare professionals have put into place these methods of evaluation and accreditation of their own practices. Here, self-regulation supports the ethical instinct to question the quality of their work and the results obtained. Up until the 1980s, the American government tended to partly delegate the regulation of care quality to care producers themselves, emphasizing minimum requirements. Public authorities act as a bulwark, gently inciting healthcare professionals to go from a learning role to the public reporting of their accountability. This self-supervision is also supported by other mechanisms, such as regulation by litigation, public dissemination, and economic incentives (Askin & Moore 2012). The search for better quality is not only a question of ethics, it is also strategic. Today, the customer is partly responsible for the quality of care received. This system makes nursing accountability all the more essential, since nurses have ultimately become responsible for reimbursement or for penalties (White *et al.* 2015).

In France, healthcare professionals are also in the process of developing indicators to focus their clinical work. As of the 1990s, the French government began to develop indicators on healthcare quality. Consequently, we can observe the "progressive institutionalization" of new means of planning through indicators (Fache *et al.* 2014). Nevertheless, this institutionalization does not seem to include or integrate nurses well, as they are poorly taken into account by the mechanisms of their own accountability.

As we mentioned in the general introduction, the French healthcare system is currently undergoing an evolution influenced by the principles of new public management. Since the 1980s, several large-scale projects have been developed, including reforms aimed at a better management of healthcare costs, such as the PMSI (medicalization program of information systems), the T2A (tarification of activity) and the Ondam (national spending objective for health insurance). Other reforms have focused more on the organization of care, such as clinical poles within hospitals and, more recently, the GHT (territorial hospital grouping).

In the United-Sates, upon his re-election in November of 2012, President Obama made assurances that the Affordable Care Act (ACA) was here to stay. Indeed, the ACA has initiated comprehensive new reforms that have improved access to affordable health coverage. This project aimed to protect consumers, to develop better access to care, and to strengthen Medicare (the national insurance program administered by the US Federal Government since 1965, guaranteeing access to health insurance for the elderly and people suffering from certain disabilities) through the development of lower-cost prescription drugs, free preventive services, fighting fraud, the improvement of care coordination and quality, and providing choice while lowering costs (ACA 2010). The ACA provided healthcare coverage for 23 million more citizens. Although the recent election of President Donald Trump will clearly challenge the ACA, many reforms have already been passed and our research project took place during Obama's term. This shift in the healthcare system has notably emphasized the importance of monitoring and evaluating the activities of care. Pressure on both public and private insurance sources has increased proportionally as reimbursement rates have grown. Hospitals must be increasingly precise about the costs and safety of their activities in order to be compensated.

United-States of America

1912 Dr Goldman started the first medical evaluation

1917 Publication of « The minimum standard » by the American College of Surgeons : first handbook about the evaluation of care quality. **1918** Hospital Standardization Program, 1st accreditation process.

1950 The AMA, AHA, ACP and ACS gather and create the Joint Commission on Accreditation of Healthcare Organizations, JCAHO: qn independent and non-profit organization that accredits voluntary health care institutions.

1986 Emergency Medical Treatment and Active Labor Act

1986 Health Care Financial Administration, now the CMS: Centers for Medicare and Medicaid services. The first official institution that published mortality data.

1994 The Health Plan Employer Data and Information Set (HEDIS) was launched with the objective of giving patients and buyers information to compare health care performance across institutions. There are also a number of State level initiatives: such as the 1987 Maryland Hospital Association's Quality Indicator Project.

1996 Health Insurance Portability and Accountability Act

1998 JCAHO launched ORYX : the first national performance measurement initiative.

2002 Financial penalty by CMS for hospitals that don't provide performance measures.

2002 Independence Blue Cross offers to raise the annual reimbursement rate based on quality indicators.

2003 Medicare Prescription Drug, Improvement, and Modernization Act 2005 Patient Safety and Quality Improvement Act

2009 Health Information Technology for Economic and Clinical Health Act **2010** Patient Protection and Affordable Care Act, Obama Care.

2011 CMS proposed the initial set of guidelines for Accountable Care Organization (healthcare organization that ties payments to quality metrics and the cost of care) under the Medicare Shared Savings Program.

France

1970 Loi Boulin, notion of hospital public services

1991 Loi Evin-Durieux

1990 Creation of the national agency for medical valuation (ANDEM)

1992 Creation of the office for the evaluation of health care organizations

1996 Ordonnances Juppé : compulsory hospital accreditation and creation of a regional agency for hospitalization (ARH)

1997 ANDEM morphed into ANAES **1998** Publication of hospital rankings in

1998 Publication of hospital rankings in newspapers (Sciences et avenir, le Point).

2002 Loi Kouchner: introduction of new patients and users. Creation of care quality directors within hospitals

2003 Plan Mattei, simplification of the health care system and strong political input: hospitals are asked to give indicators of nosocomial infection. Launching of the COMPAQH project.

2003 New financial system: T2A (tarification of activity).

2004 Loi Douste Blazy: creation of personal medical records and of the High authority for health care (HAS) (former ANAES).

2005 Nouvelle Gouvernance : Creation of « poles » and of a new executive council to pilot hospitals.

2009 Loi HPST, creation of the health care regional agencies (ARS).

2016 Loi LMSS : creation of territorial hospital groups (GHT).

Figure 1 Summary of landmark health care reforms and laws in France and in the U.S.A⁴

⁴Major sources: https://documentation.ehesp.fr/wpcontent/uploads/2016/02/DD_RéformesSanté_201602.pdf Askin et al. 2012, The Health Care Handbook: A Clear and Concise Guide to the United States Health Care System, 1st Edition 1st Edition, Washington

Although these transformations may be seen as making considerable progress in hospital management (De Kervasdoué 2004), in France, numerous criticisms have been expressed with regards to certain procedures, portraying them as mere "smoke and mirrors", contributing to a loss of purpose in caregivers' work (Jean-Pierre Claveranne, 2004).

More generally, these reforms are related to profound structural, technical, political, and demographic evolutions and they impact the pace of nursing practices. The delivery of care is becoming more complex as patients are more acutely ill than before, while service costs are contain (Latimer 2000). From a managing perspective, this complexity refers to a productive process represented by taking responsibility for the patient. This translates into a diversity of methods of care, the variability of means by which to take responsibility for the patient, and the intensification of this process (Minvielle 1996, 2000). As we explained earlier, this complexity takes place in a context where hospitals are paid on the basis of DRG (Diagnosis Related Group) or DRG-like systems. Therfore, in order to be efficient, hospitals must provide faster care, which results in lower average lengths of stay for patients. In fact, the average length of stay has dropped from 9.2 days in 2000 to 7.3 in 2010, in most of the OECD member states (OECD 2015). This trend has been widely criticized (Porter & Lee 2013) and, in reponse to increasing dissatisfaction with DRG-type payment systems, alternative models such as bundled payments and accountable care arrangements have emerged. From this point on, the driver of complexity is not only the pressure to do more andfaster but also the need to coordinate care within a high quality frame and at an acceptable cost, all while taking into account the patient's needs.

Three additional forces can be added as new challenges for health care professionals. The first is linked to the advent of information technologies and "big data," creating new possibilities in medical decision-making both inside and outside hospitals. Then, the demand-side pressures from an aging population together with new technological possibilities have pushed care outside of hospital ward settings (Topol 2012). This decentralization of care creates more complex needs for coordination that require new skills for professionals to efficiently work together. Last, but not least, democratic inputs to consider and incorporate patients' preferences into the processes of care, also known as "care customization" (Minvielle *et al.* 2014), are also a driver of complexity. Hence, the role and influence of nurses in these efforts to participate in a wide range of improvements to quality and efficacy is on the rise. (Draper *et al.* 2008).

The work of Jack Needleman and Susan Hassmiller helps us understand the role of nurses in these discussions concerning hospital quality, cost control, safety, and patient satisfaction (2009). They underscored the importance of the 1996 Institute of Medicine report on nursing, stating: "little empirical evidence is available to support the anecdotal and other informal information that hospital quality of care is being adversely affected by hospital restructuration changes in (nurse) staffing patterns." (IOM 1996) Indeed, following its publication, and likely in response to this particular statement, more and more studies began examining new associations between nurse staffing and patient outcomes (Aiken et al. 2002; Mark et al. 2004; Seago 2001; Heinz 2004). Researchers began to focus on new patient outcomes, including "length-of-stay, mortality, pressure ulcers, deep vein thrombosis, and hospital-acquired pneumonia," and associated them to levels of nurse staffing. Then, following their chronological explanation of this evolution, Needleman and Hassmiller showed that the 2004 IOM report concluded that "research is now beginning to document what physicians, patients, other health care providers, and nurses themselves have long known; how well we are cared for by nurses affects our health, and sometimes can be a matter of life or death." (IOM 2004) This emphasizes the importance of nurses' work inside the hospital and their role as key actors in hospital safety and quality improvement.

However, the involvement of nurses has been described as a challenge for hospitals, which have to face "scarcity of nursing resources; difficulty engaging nurses at all levels; growing demands to participate in more, often duplicative, quality improvement activities; and the burdensome nature of data collection and reporting." (Draper et al. 2008) Hence, quality improvement is not a new concept in hospital management. What is new is the proliferation of these activities and the escalating pressure on hospitals to participate.

1.2 Reconfiguration of nursing practices

"The unique function of nurses in caring for individuals, sick or well, is to assess their responses to their health status and to assist them in the performance of those activities contributing to health or recovery or to dignified death that they would perform unaided if they had the necessary strength, will, or knowledge and to do this

in such a way as to help them gain full of partial independence as rapidly as possible." (Henderson, 1966, p.15).

This citation of Virginia Henderson is still used nowadays by the International Council of Nurses to define nursing. It illustrates the trend of the past 40 years in which nursing has only been defined according to care-giving functions. The ideal that constitutes nursing relies at once on a holistic vision of care - wherein patients are taken care of not only to treat physical illnesses, but also to bring moral and emotional relief - and on a vision of the quality and security of its procedures.

But more often than not, the effects of the managerial policies previously exposed can create a gap between professional ideals and the reality of practice. When these mismatches become too strong, they can result in dysfunctional mandates (Becker 1970). Some illustrations of these gaps have been already outlined. From the "disquiet of caregivers" singled out by various social institutions and diverse imperatives, notably those linked to flexibility (Sainsaulieu 2003), to the study of hospital governance (Belorgey 2010), several field investigations shed light on the evolution of this profession. Nurses hold down the frontlines of care, and they are often those most directly affected by reforms and by the "pressures" they endure (Sainsaulieu, 2003).

Consequently, difficulties linked to nursing practices in hospitals are well known and their story of "everyday ambiguity" has been recounted (Vega 2000). This ambiguity, or rather ambiguities, as described by Anne Vega, take place within an entanglement of sometimes contradictory professional imagery, but also within the complexity of the caregiver's profession. Nurses and caregivers in general are often met with feelings of guilt concerning the patient, especially when they have to "betray" them in order to fulfill the injunctive and normative obligations of the hospital. In this context, nurses must also be able to juggle their available time and their various chores:

"The issue of time spent with the patient conceals yet more problems of another order. Between the relational ideal and the valorization of technical operations – seen as the foundation of nursing expertise on the model of medical proficiency - there is "dirty work": like the bathing of patients, often the purview of lower staff. Yet, there is also

the day's "paperwork", the distribution of medicine, and meeting with other healthcare professionals."⁵ (Vega, 2000 p.61)

This quote provides an accurate illustration of the difficulties faced by the nursing profession in the past few decades. These hospital reforms lead to the multiplication of administrative tasks linked to patient admission and discharge, to increasingly complex quality control, and to audits and evaluations that are now an everyday aspect of the nursing profession. Moreover, the problem of the articulation between care and cure is now at the heart of reforming the nursing profession, sparking a number of claims for increased professional autonomy. Indeed, the idea is to move from models of action where nurses work for, or make do with, a model where "we commit to giving others the capacity to do, for themselves, that which we have been mandated to do." (Rothier Bautzer 2014).

In this context of evolving healthcare systems and of difficulties faced by caregiving activities in hospitals, the need for reconfiguring the nursing profession is increasingly gaining traction. This work often consists of the "forgotten part of hospital reorganization" (Raveyre & Ughetto, 2003). And yet, it is imperative that the nursing corps reorganize itself in order to adapt to new requirements of caregiving. This reconfiguration is a complex affair since it takes place in the context of a permanent tension between daily obligations preordained by the medical profession and the tasks inherent to medical-technical and logistical operating requirements (Acker 2005). These challenges are once again related to time constraints arising from the patient's and the hospital's different temporalities. The shortening of stays and the importance afforded to outpatient activities only serve to accentuate this discrepancy.

This necessary reconfiguration of practices takes place within a frame of evolving training methods for French nurses. Indeed, a radical modification to nursing education in France was instituted in 2009, implementing a system of university training, which allowed for a Europe-wide harmonization of the profession following the Bologna accords. Although this reform was widely supported by the nursing community, seeing in it an opportunity to elevate the status of their profession, it was passed all too summarily and without sufficient time for concerned actors to prepare themselves. The wide gap between representations of the

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⁵ All the French quotations and book extracts have been translated into English with under the supervision of Tristan Wettstein, professional translator.

nursing profession and the reality of work in the field is one of the major challenges facing the establishment of these new curricula (Petit dit Dariel *et al.* 2014). In the United States, questions also arose concerning nursing training and the evolution of diplomas. Hospitals have pushed nurses to obtain Bachelor degrees, which certainly create evolutions in their training and in the roles of community colleges vs. universities (see the following section). American nurses now also have the possibility to obtain a Doctorate in Nursing Practice, but the issue of integrating these new professionals into the hospital hierarchy is still at stake.

Consequently, the evolutionary context of healthcare systems reflects the necessary reconfiguration of the nursing profession, which, as we will see in the following section (2), still has much room for development, especially in France as concerns the creation of advanced practices.

2. French nurses vs. American nurses: are we talking about the same thing?

This section will be divided in three parts. The first will compare nurses' diplomas, training, and professional evolution in both countries (2.1). The second will focus on two American specificities developed to retain nurses in hospital settings and to valorize their professional evolution: the Magnet Recognition Programs and the clinical ladder (2.2). Finally, we will describe the non-clinical and administrative jobs that support nursing and medical practices in both countries (2.3).

2.1 The division of medical labor - similar roles, different prerogatives

When asked about nursing work in their own country, both French and American caregivers tended to wonder about how their profession functions elsewhere. French nurses were often convinced that nurses in the USA have it better, since they have a more important standing and higher salaries. However, the American healthcare system has a reputation for being less egalitarian than in France, as this ICU nurse explains:

But how is it over there? I have the impression that they're paid better, but there are so many people that don't have access to healthcare. At least we take care of everyone here. (Coralie, ICU nurse for 1 year).

In the United States, however, nurses generally had a positive opinion of the "European style" of healthcare system. During our conversations, several of them asked me about work conditions and salaries, saying that they wanted to go work in England, for example. The stereotype about vacation time was often a source of lively discussion.

The importance afforded to these preconceived and sometimes caricatured impressions invites us to study in detail the substance of nursing work in each country, and the context in which it functions. Although nurses in both countries perform a similar role in the division of medical labor, they do not benefit from the same prerogatives. Their level of independence and professional organization are not the same at all. As Isabelle Feroni and Anémone Kober (1995) reminds us in their comparative work on France and Great Britain, that it is important to evaluate the comparability of the nursing profession from one country to another. It is essential to study the structure of the nursing profession in each case, and to ensure that the reality of the field corresponds to the designations given.

First of all, the term *nurse* and *infirmière* do not designate exactly the same professional categories in the United States and France.In France, nurses (called infirmières) are a distinct professional category: they are certified as such by the state (infirmières diplômées d'État – IDE). Following a competitive exam and integration into the Institute for training in nursing care (Institut de formation de soins infirmiers – IFSI), nursing studies are split between theoretical and clinical training for 3 years. Thanks to the LMD reforms (licence/master/doctorat), the State-nursing diploma is now the equivalent of a licence (equivalent to a bachelor's degree). There are also sub-categories of state-certified nurses according to specialization: anesthetist nurses (IADE), operating room nurses (IBODE), and childcare nurses (PDE). Special training and selective examinations are required in order to acquire these specializations. The same applies to nurse managers: they must pass competitive exams and be specially trained for their position.

In the United States, one can attain the official title of Registered Nurse through a variety of different training and certification programs:

- Licensed Practical Nurses (LPN) are certified with an Associate Degree in Nursing (AND), an approximately 2-year long training program, often awarded by community colleges (public universities that deliver licenses and that are managed by the county). After obtaining an AND, they can take the National Council Licensure Examination (NCLEX) to obtain the title of RN.
 - Registered Nurses (RN) are certified with a Bachelor of Science in Nursing (BSN), the equivalent of a *licence* in France. This program lasts about three years in either a private or public university. BSN holders must also pass the NCLEX exam.

Thus, it is possible to become a Registered Nurse in two different ways, although salaries and responsibilities may vary according to the program one was certified by.

The construction of professional identity partly takes place during initial training. This training provides a structural mechanism for representing oneself and others within the company or organization for which they work. Some employees will have a tendency to define themselves according to their diploma, rather than according to their work (Dubar 1991). In this sense, it is interesting to study training models in both countries. Although both have adopted university certifications for nursing work, the United States has developed a much more broad training system than in France, where it is still rare to have a Master's degree in nursing.

In the USA, a nursing diploma is not only the key to entering the profession, it is also essential for unlocking an entire series of certifications that allow for more training and specialization. Hospitals promote the Bachelor's level as only the first among many others. Most university hospitals do not hire nurses with less than a Bachelor's level of certification anymore. Moreover, nurses with an Associate Degree are strongly encouraged to pass their BSN. Clearly, American hospitals are demanding increasingly superior qualifications to respond to demands of quality linked to certification or to Magnet accreditation.

The control that the profession exerts on training programs allows for the creation of favorable conditions for its social advancement (Dubar 1991). For this reason, the nursing profession is very well organized and has been able to develop training programs that reach the highest level of university certification: the PhD

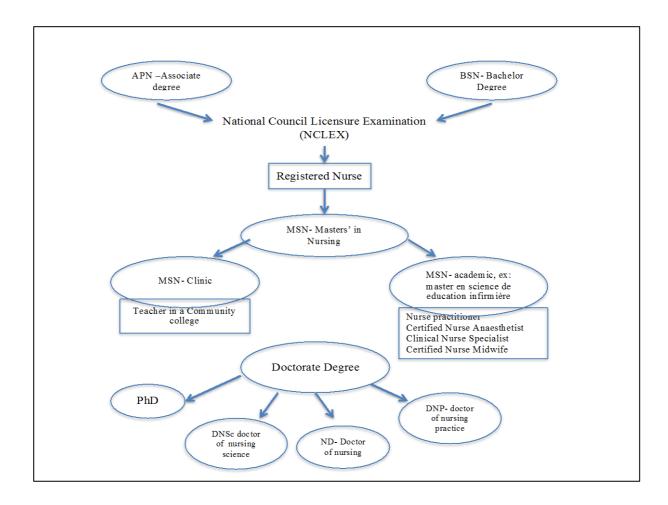


Figure 2 Diagram representing nursing education in the U.S.A⁶

This figure demonstrates the extent of training possibilities for nurses. For example, a nurse would need a Master's degree (often a Master's in health administration or a Master's in business administration), and then a certification (Nurse Management certification) in order to become a manager. There are many certifications and specializations for each level.

⁶ Source : Scheme created following several discussion with nursing student and Professor Cheryl B. Jones, University of North Carolina.

Examples:

- A Registered Nurse may be certified for pediatrics, rheumatology, pain management, etc.
- A Nurse Practitioner may be certified in acute care, gerontology, family medicine, etc.
- A Clinical Nurse Specialist may be certified in home health, adult-gerontology CNS, etc.

Nurses are very proud of their diplomas and often identify themselves through them. During interviews, the level of training or their determination to obtain more certifications was often the first thing brought up by the nurses.

Hi, nice to meet you, I'm Clara, a Registered Nurse since 5 years, but I'm preparing my Master's to become a family nurse practitioner. (Clara, nurse for 5 years).

Ok, well I'll introduce myself: I've been an RN for about 10 years, I have a Master's and my Nurse Manager certification, but for now I prefer hands-on work at the patient's bedside. (Tom, nurse in intensive care for 10 years).

French nurses also take great pride in recounting their professional path, often referring to the city they trained in, as well as their first internship, which is often a deciding factor in their first posting.

I'm 27 years old; I was born in '87. I've wanted to be a nurse since I was 11 years old. So yeah, right after high school I passed the nursing exam. I'm from the country, but I still went to Paris to take the exam, and I passed. So I left Narbonne in my first year after high school, which was a big change. I was trained at the Ambroise Paré hospital in Boulogne – so, three years of nursing school. I was already interested in intensive care, so I did my first internship in an ICU, and I liked it, so here I am. I applied here, they were hiring, and I got accepted. So I got here at the beginning of 2008, although it was tough and impressive at the start, since we had some pretty heavy cases. There it is. I tried pediatric intensive care about a year and a half ago, and went to Necker because that's what I wanted to try, but I didn't like it at all, so I'm glad they took me back here. (Camille, nurse for 4 years).

Nurses that were once orderlies insist on the importance of this evolution. Going back to school and sometimes sacrificing their family life is a subject of pride for the fruits it has borne.

I've got almost 40 years behind me. I've been an *ASH*, an orderly, then, in 2003, I became a nurse. I'm preparing a university diploma in gerontology. I love the challenge! (Sylvette, geriatric nurse for 11 years)

Since professional evolution through obtaining more diplomas is rather limited in France, despite the recent increase in university programs, higher-education diplomas and continuing education are often highly-prized by caregivers.

KEY FIGURES in 2013	France	USA
Median Salary	€1,820 /month in 2011	\$4,061/month in 2011 (or €3,633
	Compulsory deduction: 0%,	euros)
	Source: Insee	Compulsory deduction: 22%, Source:
		USdeptLabor
Number of nurses (per 1000 people)	8.2	10.8
Source: OECD		
Ratio of nurses to physicians Source:	2.5	4.2
OECD		
Nursing graduates in 2013 (per 100 000	39	63.4
people) Source: OECD		
Cost of a day in Medical Intensive Care		
Unit, Source:, Interviews of Chief	Approximately €1,400	Approximately €5,500 euros
Medical Officers in two hospitals		(\$6,100)

Table 1 Synthesis of nurses' principal characteristics in France and in the United States

The table presented here highlights several figures chosen to represent these differences. While a French nurse earns on average €1,820 before tax, an American nurse earns on average €3,633, but 22% of this amount is taxable. American nurses also deduct expenses such as insurance and health care coverage, while French nurses will have social security programs included. The biggest difference lies in opportunities for career development: an American nurse can take on other functions and earn much more if she works as a nurse practitioner, a family nurse, or if she is specialized in oncology, as we have seen. Moreover, the figures document a higher density of nurses per 1000 people in the

United States. The comparison of both systems always boils back down to financial issues and, according to interviews with chief officers in several hospitals in both countries, one figure stands out above all: the cost of a day in a medical intensive care unit (ICU). Comparing two intensive care units is particularly interesting since these are very technical wards using the same type of resources. The cost of a day in an ICU is much higher in the United States than in France. These comparisons are interesting to keep in mind, but no generalization can be made, especially as comparable figures are difficult to find.

2.2 American specificities: the clinical ladder and magnet recognition

In the United States, where institutions are facing challenges of nursing shortages but also, as we have seen, financial and organizational constraints, healthcare organizations have worked toward retaining clinically competent nurses at the bedside. Two tools are particularly used to attract nurses: magnet recognition and the clinical ladder.

The concept of Magnet hospitals refers to a hospital identified as excellent place to work for nurses. The Magnet Recognition Program was formalized in the 1990s and, through voluntary participation, highlighted hospitals with good work environments and nurse outcomes, such as a lower burnout level and higher job satisfaction (Aiken *et al.* 2000). The number of Magnet recognized hospitals has grown but they are mainly big university hospitals. This recognition is now an indicator for national rankings and quality benchmarks. The Magnet Recognition Program does not give advice for nursing staffing levels, specificities in training, or certification requirement for nurses, but it requires hospitals to actively reform their work environment through evidence-based processes, and according to desired patient outcomes (McHugh et al. 2013). Therefore, hospitals attract considerably more nurses through achieving goals in five areas: transformational leadership, structural empowerment, exemplary professional practice, new knowledge innovations, and improvements and empirical outcomes (McHugh et al. 2013).

As we have already seen, a nurse can validate specific knowledge and skills through certification. However, alongside these certifications, another clinical advancement program exists: the clinical ladder. It was developed in 1972 by Marie Zimmer as a recognition tool to motivate nurses to remain at the bedside (Watts 2010). The ladder, usually containing a rating of 1 to 4, rewards nurses for education and certification as well as research and leadership skills, and it is designed as a motivational advancement. Usually, levels 1 and 2 are achieved according to one's diploma and years of experience. To reach levels 3 and 4, nurses must defend a portfolio of their project and involvement in the hospital in front of a jury. Clinical nurses 3 and 4 are also called assistant managers.

2.3 Diversity of non-clinical and administrative jobs alongside nurses

As Hughes explains, it is important to understand a professional role according to its surroundings and to the frontiers between several jobs (1951). In healthcare facilities there are a number of other non-clinical and administrative jobs working hand-in-hand with nurses and doctors that are important to keep in mind while studying the nursing profession.

There are three common non-clinical administrative posts that can be found in both countries:

Title	Job Description
Certified Nurse Assistant (CNA) Aides Soignantes (AS)	 Provides routine direct and indirect care, performed under the direct supervision of a registered nurse or physician. Duties include bathing, dressing, serving and collecting food trays, feeding patients requiring help, ambulating patients, turning/repositioning patients, changing sheets, running errands, directing visitors, Clerical duties: answering the telephone, preparing charts and maintaining the confidentiality of all patient information
Hospital Equipment cleaning technician (HECT), Agent des services Hospitaliers Qualifiés (ASHQ)	 Provides a variety of floor care services and performs a variety of other housekeeping services. They are in charge of equipment maintenance and supply management, routine and specialized patient room cleaning to include isolation, terminal care, discharges, and transfers. They also collect and transport trash, do routine daily maintenance of equipment, as well as cleaning, recharging, and safety inspections.

	TD1: 11 14 C 41 4 1 1 1 1 1
	• This job consists of greeting patients and scheduling
	appointments and meetings.
	• In France, medical secretaries usually work with physicians, they
	assist them with their correspondence and they bill patients and
Medical secretaries	insurance companies.
	• In the USA, this position also involves recording medical
	histories and performing basic laboratory procedures, such as
	collecting blood and urine samples for analysis. However, in
	large hospital facilities a ladder exists among medical secretaries,
(Medical	
Administrative	ranging from:
	o The medical administrative representative: performs
specialists)	general office support functions and other tasks as
	directed, according to established processes, policies and
Secrétaires	schedules.
Médicales	o The medical administrative associate: may perform
	duties of an administrative representative but with
	greater autonomy and discretion. Work involves a
	greater knowledge of office/clinical procedures and
	practices, independent judgments and problem-solving
	skills.
	o The medical administrative specialists: performs
	duties of an Administrative Associate but with some
	authority to step outside the confines of established
	procedures.

Table 2 Description of non-clinical and administrative jobs in French and American hospitals

In the U.S.A, the division of labor in healthcare is somewhat more complex, as several administrative jobs have been created to adapt to new needs in terms of accountability measures and insurance company constraints. Table 2 shows a non-exhaustive list of the main functions that are specific to the United-States:

Title	Job Description
Medical transcriptionist	 Transcribing audio recorded by a medical professional during patient consultation. Writing discharge summaries, or patient histories. Need to have a strong understanding of medical jargon and organizational skills to file documentation efficiently.
Patient services representative	 The first person a patient interacts with in a healthcare facility. Responsible for checking in patients, collecting relevant insurance information, scheduling appointments, and more. Can be a hectic job for larger and busier healthcare facilities that handle a heavy patient load.
Patient account representative	 Works closely with insurance claims, payments, and any issues that might arise with a patient's account at a healthcare facility. Answers patient questions about bills or payments. Tracks down patients for payments if they have lapsed on a bill.

Medical biller	•	Responsible for ensuring that bills are issued and collected in a timely manner every time a patient receives treatment.
Certified professional coder (CDC)	•	Oversees medical coding at a healthcare facility and ensures all coding remains within applicable laws and regulations.

Table 3 Description of non-clinical and administrative jobs specific to American hospitals

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As a result, we can see that this similar denomination of "nurse" hides two distinct professional realities, and two very different evolutions of the profession. The possibilities for career advancement are much less present in France than in the United States. In the latter country, the division of labor is more complex, with a variety of new administrative or non-clinical positions, but also with different ladders existing within the nursing profession.

However, it is important to note that the participants in this study had the same positions in the field as staff nurses. In France, they were IDE (*Infirmières diplomées d'Etat*) with no particular specialty, and in the USA they were RNs (Registered Nurses), working as clinical nurses 1, 2, 3 or 4.

Chapter 2 Opening the Black Box of Nurses' Administrative Work

"What kind of nurse does administrative work?" 7

This quote from the title of an article published on a well-known American nursing blog is by no means innocuous: it demonstrates the paradox that seems to exist between the caregiving and administrative duties of nurses. The mere idea that they may be called away from the patient's bedside for something as trivial as "paperwork" is quite unsatisfying to them. However, we will see that administrative work is indeed an integral part of their job. We will first show how "reporting" and "documenting" activities have a bad reputation as time-consuming tasks that take nurses away from bedside care (1). The question of time spent on given tasks is important to the study of nursing science, as we will describe in the second part (2). These studies also emphasize the increase in time spent on so-called indirect care. However, although these investigations focus on nursing work, they do not facilitate the definition of certain tasks and roles. Consequently, we will present studies inspired by the sociology of medicine, which seek to provide a better understanding of nursing work and of all the "invisible" activities constituting it (3).

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⁷ Title of an article posted on the blog Allnurses, retrieved on March 11th, 2017. http://allnurses.com/nursing-career-advice/what-kind-of-553753.html

1. Documenting - Just a time-consuming activity keeping nurses away from the bedside?

1.1 The burdensome perception of administrative work

Today, the involvement of nursing personnel in reporting activities is a major challenge for human resources management in hospitals (Draper et al. 2008). The term "administrative burden" has become a common term to denote problems in the managerial equilibrium of increasingly burdensome bureaucratic work (Draper et al., 2008). In France, the PRESS-NEXT study (Estryn-Behar, 2004), resulting from the European "Nurses Early Exit Study," had already insisted on the existence of this phenomenon nearly fifteen years ago. Surveying 5376 caregivers in 55 French institutions, this investigation showed that the increase in *reporting* tasks was ranked foremost as "very disruptive" to their profession. Similarly, of a sample of 2074 caregivers working in the Public Hospitals of Paris, one half considered the increase in "administrative" tasks as "significantly disruptive" or "very disruptive." As a result, issues linked to the meaning of work and to caregiving (Acker 2004) were particularly salient, and, in France, a lack of forethought afforded to reorganization efforts and to the integration of New Public Management could have amplified or even provoked managerial tension (Raveyre-Ughetto 2003).

A literature search about documentation and paperwork yields a variety of studies demonstrating a general increase in the time spent on such indirect activities. But the question of how nurses spend their time has been of particular interest for decades; a question that seems to be a major factor in determining "how nurses work and how they feel about their work" (Kiekkas et al. 2005). Since the 1990s, Anglo-Saxon researchers have embraced the dominant rhetoric of holistic direct patient care. Several studies exhibit a link between the decreasing amounts of time nurses spend with patients and a decrease in nurses' satisfaction, a rise in negative events, and higher patient mortality (Aiken et al. 2002, Estabrooks et al. 2005, Rafferty et al. 2007).

A reduction in time spent at the bedside is also associated with less patient satisfaction (Westbrook et al. 2011). In parallel, one of the major changes and challenges that the

literature describes as impacting nurses' work is the increasing time afforded to documentation (Duffield et al. 2008, Fitzgerald et al. 2003, Korst et al. 2003). Not only are they accused of spending too little time at the bedside, but nurses themselves often feel as though they spend too much time on non-nursing activities of a service type (Lundgren & Segesten, 2001). For example, in one American hospital, 81% of the nurses interviewed about writing activities felt that documentation was directly and negatively impacting their time spent with patients (Grugerty et al. 2007).

An analysis of the literature over time shows that nurses have negatively perceived these reporting activities for more than two decades. Many healthcare providers do not see nursing documentation as important, especially as it is often lost or discarded after discharge and is perceived as taking time away from nursing care rather than as an integral part of nursing practices (Meuth 1999). Yet, Moloney and Maggs (1999, p.51) have pointed out that "the fundamental importance of record-keeping as a foundation of care cannot be emphasized too strongly. Accurate, complete and up-to-date records represent a vital component of high quality care." Even though it is frequently acknowledged as a legal representation of nursing work, many nurses do not always perceive it as critical to the quality of care (Sullivan 2000). McKenna (1994) found that documentation was undervalued by nurses, who placed greater value on the contribution of verbal communication to care quality. Although this impression has held true for a long time, it seems that nurses increasingly tend to understand the importance of valid documentation more than befor. They seem to recognize the necessity of good nursing documentation, but they remain critical and concerned about how it plays out in their daily activities.

The 2007 Maryland Nursing Workforce Group Commission report did an excellent job of expressing these major concerns linked to paperwork and documentation. Their survey entitled, "Challenges and Opportunities in Documentation of the Nursing Care of Patients" expressed disquietude about:

- Redundant documentation,
- Excessive time spent documenting, which takes nurses away from direct patient care,
- More than 1/3 of nurses reported routinely staying beyond their scheduled work hours to complete documentation (and almost 2/3 of them were paid for this overtime),

- Routine documenting for reasons other than recording and communicating pertinent clinical information (e.g. regulatory requirements and third party reimbursement).

Research focused on nurses' use of their time also points to a significant change: the increase in time spent filling out medical-legal documentation (Fitzgerald et al. 2003, Korst et al. 2003, Pelletier et al. 2005), the complexity of cases, a reduction in the time patients stay, and new medical-legal necessities are described as contributing to the increase (and redundancy) of information required in the patient's file, and are seen as a source of discontent among nurses (Gugerty et al. 2007).

1.2. Time and motion studies to understand nurses' use of their time

In addition to aforementioned studies on nurses' opinions and perceptions, there exists a wealth of literature analyzing nursing work. This kind of analysis is usually carried out via quantitative methods known as "time and motion" or "work-sampling" studies. The time and motion method consists in recording the time spent by a worker on particular tasks using electronic devises such as a stopwhatch or electronic diaries. The work sampling method is a statistical technique determining the proportion of time spent by workers in various predefined ativity categories. A large number of observations are made at random times over an extended period of time. These kinds of work analyses have been used in various industries, providing a useful basis for important human resources decisions (Pelletier & Duffield 2003).

The time and motion studies we have found employ various methods for registering and recording how nurses spend their time (Lundgren 2001). First, the time covered by studies may differ considerably: from only a few hours, to 24-hour shifts or several days. Heindrickson et al. (1990) used a stratified random sampling method to study six different units, using observation and work sampling collected every 15 minutes. For each unit, observations were made over a seven-day period, on randomly selected floors of observation. Duffield et al. (2005) also carried out a work sampling study over eight weeks, where they measured 25 different activities at 10-minute intervals, while one member of the staff

recorded only observed bedside activities. The Pelletier et al. (2005) study also used the work sampling method, but their observations took place over several months, at a rate of four days per week and per unit. Fitzgerald et al. (2003) used interviews and observation through work sampling, allowing for the comparison of observations with nurses' answers. As we can see, the most common method used in nursing work analysis is work-sampling.

Most time and motion studies reveal a common result: the time spent on indirect care (nursing activities performed away from, but on behalf of, the patient (White et al. 2015)) seems to be increasing, and documentation/paperwork leaves less time for patient care and other activities (Forbes et al. 2008). Nurses are also accused of "spending limited time with their patients and too much time at their desk." (Lundegren 2001)

Several studies in the 1990s had already pointed towards the negative consequences of limited time at the patient's bedside. An Australian study (Hovenga & Hindmarsh 1996) found that nurses were spending "only 21%" of their time on direct patient care, whereas another study found that nurses spent 60% of their time engaged in documenting or charting various components of the nursing process (Windel 1994). Martin et al. (1999) found that nurses averaged 56 minutes per shift, or 12% of their working day, on documentation. Other estimates ranged from 13.7 to 50% (Pabst et al. 1996).

More recently, Pelletier et al. (2005) studied the frequency of documentation and the transfer of clinical documentation that occurred in a one-day shift in two aged care settings. They found that documentation did not take place in specific sequences, but "whenever the opportunities arose, rather than as a structured part of a nurse's working day." This may be one reason why nurses do not consider these activities highly valuable. While this study concluded that less time was spent on documenting than was found in other studies, the authors point out that documentation activities were also embedded in other tasks, such as the administration of medicine. According to the author, reporting is devalued when it is seen as pulling nurses away from patients.

Forbes et al. (2005) showed that nurses spent 9.78% of their time working on progress notes – twice the time afforded to patient and family interactions (4.03%). A 2001 Swedish study based on two observations of one ward, with a 2-year interval, showed an increase in the time

dedicated to direct care and to administrative activities, but a decrease in indirect care as well as personal activities (Lundgren 2001). Studies in the United States mainly focus on time and motion methods. In fact, the 1990 "How do nurses use their time?" study, by Hendrickson et al., was one of the first to describe how nurses spend their time. Previous studies, as Hendrickson et al. explain, "used work sampling techniques to assess distribution among tasks for purposes of analyzing nursing staff productivity, assessing staffing needs, or analyzing the impact of computers." They found that 38% of nurses' time was spent on communicating information, 10% on non-clinical activities, and 10% on therapy preparation. These findings led the authors to suggest three ways by which to reduce the time spent by nurses on non-essential nursing functions: 1) delegate tasks to support personnel, 2) make greater use of pharmacy personnel in a decentralized setting, and 3) make greater use of computers.

A more recent American time and motion study, following in the footsteps of Hendrickson et al., sought to understand "How do medical-surgical nurses spend their time?" (Hendrich & Chow 2008) This large-scale study, conducted in over 36 hospital-medical surgical units in 15 different states, obtained the consenting participating of 763 nurses. This investigation into how nurses spend their time, the largest of its kind, is also the first to make use of complex technological tools to measure and observe nurses' work environments. During the study, nurses carried a personal digital assistant (PDA) that vibrated 25 random times during a 13-hour shift. Each time the PDA vibrated, nurses would stop to record whatever activity they were doing. The nurses also wore radio frequency identification tags to track their movements. As a result, the investigator noted that, on an average day shift of 10 hours, a nurse's average distance of travel was 3.4 miles. Their results demonstrated that nurses spent more than 3/4 of their time on activities linked to the nursing practice, but less that 1/5 of their time on tasks defined as patient care activities.

The final findings of the study corroborated previous inquiries by noting that documenting accounted for the largest proportion of nursing time. In fact, this category alone accounts for 27.5% of all reported time, more than unit-related functions, non-clinical activities, and wasted time combined (Hendrich & Chow 2008). In addition to documenting tasks, two other activities accounted for a majority of nursing practice time: care coordination and the administration of medicine. A considerable section is dedicated to "documentation": an essential part of nursing practice, which accounts for a major portion of nurses' time, but

which is portrayed as rife with inefficiency (re-transcribing, duplicates). These inefficiencies are, in many circumstances, due to evolving regulatory and public policy requirements for documentation (such as "present on admission"). Of all reported time, 6.6% was categorized as waste. Substantial time is wasted on transferring information between different data collection systems, and document duplication can result in the fragmentation of care, the duplication of data sets, and the inability to quantify the outcome of care provided.

Fitzgerald et al. (2003) once again demonstrated that one of the most important developments in nursing work is the increasingly time-consuming activity of documentation. Their study was based on the observation of 144 Australian staff, with 432 hours of observed nursing time, and interviews with 96 nurses. The authors list the types of activities observed according to categories based on a literature review of studies using work sampling: direct care, indirect care, personal time, professional interaction, family interaction, documentation, unit-related, and other. These broad categories are used in several relatively recent studies (Cardona et al. 1997, Urden & Roode 1997, Wise & Duffield 2003, Chaboyer & Blake 2008).

Nursing literature tends to focus on time spent directly at the patient's bedside as a way to analyze and valorize nursing work, as recent research demonstrates (Dearmon et al. 2013, Antinaho et al. 1015). An in-depth analysis reveals that almost all of these studies have at least one common category of work – direct patient care. This concept is defined as all the activities in which the patient is present. Interestingly, the time nurses spend with patients has remained stable over the years, at approximately 37% of total nursing time (Duffield et al. 2005, Heindrickson et al. 1990, Hendrich et al. 2009, Pelletier et al. 2005). Moreover, several authors point out that the time spent on documentation is not so disproportionate: 10% of the time in a British study (Fargurharson et al. 2013), 9.3% in Greece (Kiekkas et al. 2005), and 13% in Australia (Fitzgerald et al. 2003). Lundgren and Segesten (2001) concluded, "nurses had a feeling of spending too much time on non-nursing activities of a service type (...) but no objective basis justifying this feeling was found." Furthermore, Westbrook et al. (2011) found, in a 3 year long Australian study, that nurses spent 37% of their time with patients, or approximately 3.1 hours per 8.5-hour shift. In this same study, the authors found that other activities (indirect care, medication, professional communication, etc.) increased from 76% to 81% over the three years. Time spent on documentation was found to have decreased, which was explained by an increase in the use of electronic health records.

While perception-based studies demonstrate the idea of an "administrative burden," several time-based investigations have shown that nurses still spend approximately 37% of their time on direct patient care – a constant since the 1990s (Duffield et al. 2005, Heindrickson et al. 1990, Hendrich et al. 2009, Pelletier et al. 2005, Westbrook et al. 2011). This figure should be handle carefully as, as we have seen in the chapter 1, acuity is higher and workload have intensified over the years, and some of nurses' activities may have shifted to other healthcare workers.

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For our perspective, this implies a **first flexible hypothesis**: the issue is not necessarily about nurses spending too much time on administrative work, but rather about how these activities are integrated into the practice.

2. Studying the invisible activities

This section will analyse the existing literature to adress difficulties in studying certain aspects of nursing work (2.1), and will highlight a body of sociological studies that calls for a new way of studying nursing (2.2).

2.1 The difficulties in observing complex and dynamic activities

The nature of nursing work is dynamic, non-linear, and complex (Potter & Grant 2004). Nursing documentation has increased, but analysis of the scope and time spent on this activity has been lacking. The impact of administrative activities and their effect on the nursing workload, the time left for direct patient care, and how clinicians make sense of these activities are all aspects that have been insufficiently investigated.

As shown in the previous section, certain broad categories are used throughout different studies, but with variations in the activities falling under certain categories, as well as in their definition. The Australian literature generally uses the Urdena & Roode categorization tool developed in 1997. This categorization classifies activities into four predefined categories: direct care, indirect care, unit-related activities, and personal time. Inside these categories there are several sub-categories. For instance, indirect care consists of the coordination of care: care planning/critical pathways, coordination of care, rounds, team meetings, communication/ information; computer: data entry/retrieval; medication/IV preparation; progress notes/ discharge notes; room/equipment setup/ cleaning; verbal report/handover. And six items are listed as "clerical; errands off-unit; environmental cleaning; meetings and administration; supplies, check, re-stock; teaching/In-service" in the unit-related categories.

Across all of these subcategories, those most related to administrative work and documentation are:

- Communication/information
- Computer: data entry/retrieval
- Progress notes/discharge
- Clerical
- Meetings and administration

Yet, it is not easy to understand exactly what the authors mean by "documentation," as defined in these categories (Pelletier et al. 2005, Fitzgerald et al. 2003). Does documentation consist of the time spent working at a computer and with pen-and-paper, doing clerical work? Is it only one of these tasks? Moreover, what exactly does "meetings and administration" cover? This classification has the weakness of not clearly defining what administrative work actually is.

What's more, these classifications also differ in the other studies. The ways in which activities are categorized lead to very different understandings of documentation and administrative activities. In their 1990 study, Heindrickson et al. defined the activity according to a scrupulously specified set of categories. All the activities related to administrative work and documentation are contained in "patient charts; checking physician's orders; paperwork;

phone communication; supplies." (Appendix 5) Yet, no distinction is made according to whether the activity is directly or indirectly linked to patient care (Heindrickson et al. 1990). In 1996, Pabst et al. integrated the notion of "unit care" into their definition of work sampling categories, which was described as "activities necessary for the general coordination of the unit or well-being of the patient population, activities that cannot be assigned to a specific patient." However, they entirely failed to specify aspects of administrative work such as documenting and charting (Pabst et al. 1996).

In their table of nursing activity categories, Korst et al. (2003) propose the following definition of documentation:

- "Paper charting," for example "both bedside and non-bedside documentation of patient care."
- "Computer charting," for example "both bedside and non-bedside documentation of patient care."
- "Supervising," for example "assisting others with computer charting."

We also find "reports: giving reports during shift changes" within the category of non-bedside care (Korst et al. 2003). Once again, the categorization lacks precision. Documentation is defined as paper and computer charting, and no distinction is made between the bedside or non-bedside nature of this activity. In Poissant et al.'s literature review, documentation is considered as "all notes, orders, and referrals that are part of the care plan of a patient and documented in a patient's medical chart." (Poissant et al. 2005) Thus, the studies reviewed excluded all documentation not directly related to a patient's medical chart, meaning that clerical and administrative reports linked to the unit were not taken into account. Likewise, Catherine Des Roches (2008) wrote in her study of "patient-related notes and documentation." The Swedish study by Lundgren et al. (2001) developed a categorization consisting of "shift reports, work schedules, general staff meetings" and "patient administration and general management: report writing, nursing care plans, paperwork, phone, and communications with visitors." In this case, administrative work is separated from direct patient care, which is defined by Lundgren et al. as "[occurring] in the presence of the patient", as well as from "indirect care," defined as "activities that occur away from the patient. Preparing for nursing interventions, medications and therapies."

We can clearly see that activities linked to paperwork, administrative duties, documenting and charting are not so easily defined. They are sometimes included in indirect patient care, and other times are linked to communication and charting patients' vitals. And at yet other times, they are linked only to the work going on within the unit, and not to the patient. Besides, there is no single acceptable interpretation of these duties: what do "patient charting" and "documenting" mean? What do we include as "clerical" versus "paperwork"?

Notwithstanding these considerations, one categorization in particular draws a clearer picture of the differences between administrative tasks, patient care, documentation, housekeeping, indirect patient care and personal activities. Banner and Olney, in their study of Automated Clinical Documentation (2009) describe the tasks of a progressive cardiac unit (PCU). Their categorization helpfully illuminates the difference between administrative tasks. It includes a wide range of activities, from "management of patient belongings", "checking supplies", "updating the patient chart", "answering the telephone", "staff meetings", "picking up blood", to "charge nurse unit reports", documentation including "admission database, care plan, clinical path, discharge process, plan of care, recording vital signs", etc. Moreover, "indirect patient care" includes "report patient information."

In their previously presented time and motion study from 2003, Fitzgerald et al. found that there were differences between nurses' espoused patterns of care (holistic patient-centered care, which is the dominant rhetoric) and actual patterns (33% of the time observed was spent in direct care). Moreover, a relatively large amount of time was expended on activities that were not regarded as important by the staff (documentation, unit-based activities not directly related to caregiving and personal time). The authors state that nurses need to reappraise their current practices and reconsider their roles and duties. This dissonance between espoused philosophy and practice is widely recognized, and its precise nature must be identified in order to be able to address the problems at its core.

Previous work analysis studies provide data about how nurses spend, and should be spending, their time, based on the underlying assumption that care providers should be spending more time in direct care activities.

However, this kind of thinking has been challenged. Upenieks et al. (2008) suggested a reframing of nursing activity categories in terms of value-added care, which they define as

patient-centered actions, such as meditation, that directly benefit the patient but that are traditionally categorized into direct and/or indirect care. They also add "necessary activities" as a category in which documentation is included, since it is essential but does not directly benefit the patient. Finally, "non-value added activities" are those that are neither beneficial nor necessary to the patient. This change in the way nursing activities are categorized has the benefit of highlighting some indirect activities that are valuable, such as communication with other team members. However, a gap remains in terms of articulating these activities (White et al. 2015).

2.2 The invisibility of administrative and organizational tasks

In chapter 1 we have seen that the actual context of health care reforms was leading to considerable complexities in the delivery of nursing care, creating tension between professional ideal and practice. These kinds of tensions are constitutive of the creation or evolution of professions. As Hughes (1951) explains, certain technical or organizational innovations have more prestige than those that are more ingrained, and they may offer further career opportunities. Therefore, in the process of converting an art or line of work into a veritable profession, the higher status tasks are more sought after. A gratifying profession such as nursing will keep for itself a more prestigious set of tasks. On the other hand, tasks of lower status are distributed to a variety of professional actors or to positions yet to be determined. As a result, in a context of growing concern for deterioration of basic nursing care, arguments about the negative effects of bureaucratic and non-clinical tasks are common and participate in the notion of burden as see previously.

Yet, and against these negative perceptions, a body of sociological studies has emerged challenging this holistic view of nursing work (Acker 2005, Allen 1998). These studies question the role of "artifacts", like paper folders and electronic records, surrounding the "activity of writing." They point to a need for redefining the nursing mandate to include organizational work (Allen 1998, 2004, 2012; Nadot 2013). These authors claim that a large part of nursing work remains hidden by dominant patient-centered care rhetoric, and argue that it is necessary to expand the perception and reality of the nursing mandate in order to better recognize and include "organizing work" performed by nurses in healthcare organizations. Indeed, Allen develops and describes organizing work according to four

domains of practice (2014). She entitles the first as the "trajectory narrative", highlighting the tremendous contribution of nurses to creating working knowledge that supports and participates in the delivery of care. Second, nurses have a fundamental role in articulating the trajectory of care. They are key actors in the healthcare team, since they have leading roles in coordinating everyone involved in patient care. Third, Allen reveals nurses' contribution to bed management, which is a substantial element of good patient care; especially as concerns rapid turnover and shorter hospital stays. Fourth, but not least, nurses have an important role in transferring patients from one unit to another, with respect for the quality and security of care.

In a context where the pace of nursing is rapidly changing, administrative activities appear to be an important part of nurses' duties. The examination of this context of health care reforms (chapter 1) as well as the inventory of new sociological studies, suggests a **second flexible hypothesis**:

Administrative work is a big component of nursing work, which seems to be constituted by activities of a reporting nature, but also of various organizational tasks necessary to the coordination and articulation of care.

3. Electronic health record in review

As the first part of our literature review suggests, the amount of time spent on administrative work and reports has been increasing over time. However, one other major aspect linked to communicating information and to collecting data is the modifications brought by new technologies. Technology, as we have seen, is seen as a way to reduce paperwork. Indeed, as explained Pabst et al. (1996) explain, we can observe an increase in the consideration being afforded to technological supports as a way to increase productivity.

The literature on the impact of computerized documentation and the implementation of electronic health records is quite considerable, but three significant systematic reviews were

particularly useful for understanding related and ongoing issues.

The first systematic review we based our analysis on was published in 2005, and concerns the *Impact of electronic health records on time efficiency of physicians and nurses* (Poissant et al. 2005). The author emphasized the importance of understanding and measuring the impact of EHR on nursing and its efficiency in the documenting process, since the main stated barrier to its successful implementation is usually the increased time it requires. The 11 studies reported in the review (and fitting the criteria of computing the 95% confidence interval), are mainly favorable to EHR and show that using this tool saved nurses time in their shifts. But three studies assessing the impact of EHR on nurses' time efficiency, with the patient as sampling unit, demonstrated that no matter how documentation was performed (bedside terminals, central stations, or personal digital assistant) the impact on time spent documenting per patient was unfavorable (Poissant et al. 2005). It is important to note that, in the context of this review, documentation only includes notes, orders and referrals that are part of a patient's care plan and which are documented in a patient's medical chart.

A second and more recent literature review, by Waneka and Spetz (2010) attempted to determine the impact of Health Information Technologies (HIT) on nurses' activities and nursing care. 74 articles were selected for review, showing the interest researchers have for the use of technology.

The results of the review are positive and the findings suggest four major results:

- HIT improves the quality of nursing documentation;
- HIT reduces medication administration errors:
- Nurses are generally satisfied with HIT and have positive attitudes about it; and
- Nurse involvement in all stages of HIT design and implementation, and effective leadership throughout these processes, can improve HIT.

Finally, the 2013 "Nursing Informatics Year in Review" (Carrington and Tiase 2013) looked at all the articles published between August 2011 and August 2013 and pointed out the trend in research about nursing and informatics. The emergence of themes such as "medication administration, interdisciplinary communication, technology interventions, the use of decision support tools and nursing terminology, patient engagement and nursing workflow efficiencies" is highlighted, as well as the preponderance of articles about how technology is a

means toward the increase of patient safety as well as cost-efficient care.

Besides these three relevant articles, other publications were reviewed, including a 2009 study in Florida that explored the impact of "automated clinical documentation" (Banner and Olney 2009). In fact, Banner and Olney tried to answer to the questions of whether "the move toward automation increases the time at the bedside, decreases the time nurses spent on documentation, and decreases time spent on administrative tasks." The results indicated a "significant increase in the time nurses spent documenting". According to them, the time spent on charting was 23%, rising to 35% after the implementation of the EHR. However, they also found that the time spent with patients increased after this implementation. Unfortunately, no explanation is given as to why the EHR contributed to an increase in the time nurses spent documenting. However, Catherine Des Roches, in a finding from a national survey about RNs' use of HER, showed that with "a minimal functional EHR", RNs do not spend significantly more time in notes or documentation related to the patient (Des Roches 2008). According to her, the increased amount of documentation may come from the development of quality improvement programs inside the hospital, and "any efficiencies gained in the time spent in documentation could be confounded by the greater overall volume of documentation taking place at these organizations."

A 2011 study found out that over the 316 hospitals in the sample, only 7% were equipped with a basic EHR system in their patient care units. These figures reflect the national situation at that time (2008), when less than 10% of the American hospitals were fully equipped with EHRs. The second important finding of the study is that the EHR clearly decreases negative outcomes of nursing practice, as nurses "were less likely to fall between the cracks when transferring a patient between units." This suggests that the level of detail available in the EHR allows for better communication and better reliability of shared information (Hendrich et al 2008). Finally, Simpson (2012) explains that technology helps bring along better practice (not necessarily the best practice) and evidence-based research.

But, while the literature highlights possible positive outcomes, nurses' technological acceptance is still relatively feeble, since this recognition is influenced by the context and environment of care (Strudwich & McGillis Hall, 2015).

Therefore, reviewing the EHR literature suggests inquiring into a **third flexible hypothesis.** That is, the possible positive influence of the EHR and the way they ease the integration of nurses' administrative and organizational activities into practice

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Throughout this chapter, we have explored the nagging questions surrounding nurses' administrative work. As we have seen, the notion of administrative duties is still unclear, and remains weakly recognized by nurses. The literature has not allowed us to devise a precise definition of administrative work, but it has guided us along the tracks of certain activities, such as documenting. We were also able to understand different means by which to categorize and sort various nursing activities.

Three intuitions, or flexible hypotheses (Peneff 1992), have emerged from this literature review. The first is an invitation to inquire about the time spent on paperwork, and especially to question the perceptions and meanings of these activities for nurses. The second relies on more recent investigations that seek to open the black box within which little-known activities still reside, and to really look at organizational work. From this point, the literature encourages us to study the "work being done" more closely, in order to describe and detail said administrative work through (as we will see in the following chapter) an adapted qualitative methodology. The third invites us to look closely at a particular administrative tool (the electronic health record) and to analyze how it plays out within nursing practice.

Chapter 3: Research Methodology and Design

The context and subject of our study, as presented in the first two chapters of this thesis, call for the establishment of a specific methodology. This chapter will seek to present the methodological considerations that have contributed to building and guiding this research project. This research utilizes a reflective and qualitative perspective, mobilizing a wealth of various methods and meanings. Qualitative research methodologies are often presented as a kind of "tinkering" (Giordano 2003, p13). Yet, they follow a rigorous logic imbued with reflexivity and solid methods. In this chapter, we will present our methodological progression and its phases, so that the reader may evaluate the final result accordingly.

As such, we will first explain the phases establishing the research subject (1), from the exploratory fieldwork at its origin to the back-and-forth exchange of various field experiences and the method itself. Next, we will present the methodological implications and the means of collecting data (2). The final section will reflectively revisit the researcher's position in the ethnographic study of both countries, that led to publishing a first article (3).

1. Establishing the research subject

In this section, we will demonstrate how the research subject emerged and evolved along with the data collected, particularly during our initial exploratory fieldwork.

The present research stems from an exploratory field study that I led during a sixmonth internship at New York's Columbia University. Initially, I went to the United States with the goal of studying the state of nursing work, and what I called the "psycho-social risks" associated to it. This formula was vague at best, but after some reading and my initial insights into the fieldwork, I was able to elaborate a first proposal (see frame 1 below). Although this project appears rather distant from the current thesis, especially in terms of the emphasis on work-related stress, it seems important to present its broad outlines. Indeed, this initial proposal provided a gateway into literature about caregivers, especially Freidson's work, Profession of Medicine. With this framework in mind, I began making certain field observations, and though I did not really know what to observe, I nevertheless discovered an entire world that, until then, had been unfamiliar to me. This fieldwork was truly exploratory in nature, and provided a sort of double acculturation to both the medical/hospital world and American university culture. Without this experience, the comparison with France would have been exceedingly complicated, especially in the short time allowed for the thesis. Indeed, I have the feeling that I really was "learning by doing" during these six months, by becoming versed in bibliographic research, in observation, and in interview techniques.

Frame 1. First Cut at a Proposal – Healthcare professionals may be expected to enjoy a high degree of autonomy (and perhaps satisfaction) in their work – precisely because, as "professionals", they enjoy a distinct code of ethics, deference to their expertise, and various other advantages that are correlative to the very definition of professionalism. [Cite Freidson and/or others]. This autonomy and sense of "mastery" may in turn be expected to insulate medical professionals from the psycho-social strains that accompany the "routine" roles played out within highly hierarchical settings. (Cf. Michael Marmot on relations between lack of control at work, stress and poor health.)

In practice, however, physicians, nurses and hospital managers (the main types of "medicine professionals" discussed here) find themselves increasingly subject to psycho-social stress from a variety of sources, including, in the US, the following:

1) Time consuming reporting requirements have multiplied as a consequence of efforts by public and private bodies to assess and control the quality of care, promote patient

- safety, reduce medical errors, and protect the privacy of patients and their medical records (HIPAA).
- 2) Longer and tougher accreditation requirements imposed by JAHCO accreditors constrain both hospital managers and providers.
- 3) Moves to slow the rise of healthcare costs have led insurers (increasingly in the form of managed care organizations) to impose administrative controls and financial discipline, to require authorization for certain procedures, and to squeeze payments to physicians and hospitals.
- 4) Dissatisfaction with inexplicable variations in patterns of practice (as documented, for example, by John Wennberg and the researchers who produced the Dartmouth Atlas) has encouraged efforts to generate and enforce practice guidelines, which come from multiple sources and which often conflict.
- 5) Highly hyped organizational innovations e.g. accountable care organizations and patient-centered medical homes entail new divisions of professional labor (and payment) to which providers are expected to adjust.
- 6) Physicians and other staff of academic medical centers, community hospitals, and physician groups may nowadays find increases in their salaries subject to "performance" reviews and pay-for-performance schemes.
- 7) Well-intended changes in organizational processes may have troubling ripple effects for instance, efforts to cut costs by reducing nursing staff in medical wards may lead to back-ups in emergency rooms and more stress for ER doctors and nurses.
- 8) Changes in the characteristics and needs of patients may be stressful to providers e.g. more patients with dementia and multiple morbidities, and more single patients (without supportive caregivers at home).
- 9) Threats of litigation for malpractice loom over caregiving if things go wrong.
- 10) Changes in payment policies e.g. Medicare will no longer pay for "never events" that compromise patient safety and will penalize hospitals that have excessive patient readmission put pressure on providers and managers to change the status quo.

Medical professionals stand, as it were, at the center of concentric circles of imposing forces emanating from patients and communities, payers (MCOs, Medicare, Medicaid), regulators, hospitals, and would-be integrators, such as ACOs and medical homes. Both the number and intensity of impingements are, arguably, increasing over time. But not much is known about how these sources of stress are perceived and addressed by medical professionals in diverse settings. The present project aims to explore patterns of psychological stress in medical professionals by interviewing a sample of providers – general practitioners, specialists, hospital managers and nurses – in two New York healthcare institutions: the New York Presbyterian and Mount Sinai hospitals. The three central questions are: 1) What do healthcare professionals cite as the major sources and causes of stress in their work? 2) What effects do they perceive stress to have on the quality of their practices and performance? And 3) How best, in their view, might harmful stress be reduced?

This thesis grew and evolved within a research frame initiated by Etienne Minvielle. With 13 years of research on hospital indicator production (COMPAQ Project) and more generally on the healthcare management field, as well as his experience as a hospital quality manager, he wondered what effects this production of quality reporting could have on front

liners. The manager and researcher thus asked the ethnographer, Mathias Waelli, to ponder the means by which to observe these phenomena in the field, through a qualitative and comprehensive methodology. They shared this frame with me while I was starting my fieldwork in New York. Yet, my path was anything but linear — I wanted to observe psychosocial risks and well being at work but the questions they raised did remain at the back of my mind.

The field provided me with numerous illustrations of Etienne and Mathias's frame, which allowed me to make sense of my experience. Thus, this thesis is not inductive as many ethnographic inquiry, since the field confirmed one of our initial impressions: that a whole part of nursing remained undiscovered and unaddressed – the conundrum of administrative work.

Our discussions and my first impressions in the field allowed for reorienting the initial proposal towards the black box of administrative work. Ultimately, the research question that emerged from this first exploratory fieldwork in four American wards was the following:

How do nurses perceive the impact of documenting activities on nursing practices? Could the efficiency gained by technology be offset by the growing volume of information to collect?

By drawing on nurses' perceptions, the qualitative method aims to:

- 1) Characterize documenting activities;
- 2) Assess the costs and benefits of nurses' reporting requirements;
- 3) Offer recommendations for managerial improvements.

The conclusions resulting from the fieldwork allowed me to begin this thesis with many questions in mind, and with the proof that the administrative issue was pertinent, and that the question is, in a sense, international. Indeed, my interrogations about defining nurses' administrative activities led me to elaborate the following categorization:

- **Direct patient care:** all activities occurring in the presence of the patient, such as:
 - o Administering medication
 - o Physical care
 - o Hygiene
 - o Patient education

- **Indirect patient care:** activities directly related to the patient, but that do not need to occur in their presence, such as:
 - o Documenting (admission, patient care plans, medication, discharge)
 - o Preparing medication
 - o Interaction with physicians and residents
 - o Supplies
 - o Housekeeping
 - Ordering food
 - Interaction with family members.

• Administrative work:

- o Calling the lab for results
- Answering the phone
- o Clerical duties

• Unit-related activities

• Personal time

This initial categorization, though imperfect, allowed for a better presentation of nursing tasks, and it especially sowed the seeds for the idea of task-timing, which, as we will see later, is an important aspects of the French study.

This exploratory work has also provided the opportunity to understand the origins of certain requirements, and to discern nurses' feelings about documenting activities. These perceptions raise a series of interesting discussion points:

• The nurses we interviewed seemed to consider documenting activities as a kind of indirect task for patient care. As a result, they included it as part of care itself, and did not view it as a solely administrative task. But when queried about the reasons for documenting, the principal purpose stated was for self-protection - a kind of "defensive charting." According to the nursing director, this results from the fact that nurses have a tendency to chart for themselves instead of for the patient's care plan, even though they know that it is useful for patient care. Nurses experiencing difficulties in combining documenting with other activities would resultantly be those who consider documenting as a task-based activity rather than as part of a global care

plan. This first contradiction and ambiguity towards administrative duties appeared as an interesting vector for further inquiry.

- Nurses were not always clear about the primary purpose of documentation. Historically and pragmatically, it is a way to facilitate information flow, which supports the continuity, quality and safety of care. Yet, as the study highlights, recordkeeping has come to serve a multitude of purposes, which begs the question: are medical records becoming a brain dump? This question came back like a boomerang in the American portion of our research project's fieldwork, mainly when inquiring about the use of Electronic Health Records.
- The activity of reporting was perceived as redundant and growing. Nurses do not respond to redundancy and increasing amounts of charting in the same ways. Each adapts in their own way. Some tend to chart everything, even if that means writing the same information twice. Some do not chart what they consider useless. Others may even chart something about which they did not ask the patient. This leads to an ethical question: do nurses do everything they chart?
- The increasing amount of documenting begs the question of the negative effects of monitoring. Does asking nurses to report more affect their time spent with patients? Reduced bedside time does not improve quality. This question is raised by the literature, and the notion of time consumption became increasingly important in the research, leading to recording the time spent by nurses on each activity in order to quantifiably study this issue.
- Finally, one conclusion of the study was that the time nurses spent doing non-nursing tasks merited further investigation, and that a study of the relationship between nurses and patient care support (also called nurses' assistants) would be valuable because their roles are not always clear-cut in every unit. This element remained important in the next phase of the study, where fragmentation and shifting was observed.

Thus, this preliminary study not only allowed me to gain a better general understanding of nursing work as a whole, but also pointed to certain issues and ambiguities linked to reporting and documenting activities, as well as anticipating certain biases and methodological

limitations. This experience was particularly salient as concerns the last point. Here is a list of the central elements that I kept in mind during the ensuing establishment of my methodology:

- The choice of a given unit to observe is linked to the willingness of managers to let us enter the field. That is, the nature of the fieldwork does not result from a wholly rational and coherent choice. This element is important, and I carefully planned which unit to study and how to negotiate the channels allowing me to do so.
- The choice of employing field-study methods involves a commitment to closeness with the observed subject in their natural setting for a considerable period of time. Access to the field proved rather difficult in this study: it took more than three of the five total months available to be allowed into the field. The result was a shorter observation time than expected. The time left after observation was therefore shorter, limiting the ability to lead a complete analysis. However, I intimately discovered the ethical requirements of American universities, which proved an invaluable asset for the actual research project.
- We were unable to cite any internal documents. As a result, data triangulation was sometimes complicated, and I learnt to anticipate the possible authorization needed to quote certain internal documents.

It was on the basis of these learning experiences and these interrogations that we established the present research subject. This preliminary study has played a fundamental role in providing for the emergence of an international comparison in the correct conditions, in particular by anticipating a certain number of biases and obstacles.

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Thus it is that the object and design of the research progressively emerged from this work, thanks to a back-and-forth exchange (Allard-Poesi & Maréchal 2003, p.36) between litterature, data collection phases, and the analysis of these phases. Let us now examine the research design and data collection methodology that we mobilized in this study.

2. Methodological issues and data collection

Before beginning the study, we sought to emphasize the iterative character of our research. In this section, we will demonstrate the methodological construction of the research through its design around a comparative ethnographic inquiry (2.1). Then, we will explain the reasoning that brought us to choose our fields of study, and how these choices also participated in the construction of the research methodology (2.2).

2.1 Cross-national ethnographic case study

This sub-section will seek to demonstrate how the ethnographic approach was revealed to be the most relevant method in studying nursing work (2.1.1), and why we decided to introduce a cross-national study to this project (2.1.2).

2.1.1 Ethnography: observing the "work being done" and collecting views

As was partly revealed in the preparatory study, the research subject moved us in the direction of studying both the formal and informal aspects of nursing. The ambiguities we had already observed, concerning difficulties in defining and characterizing administrative work, confirmed our choice of a qualitative methodology based on *in situ* observation, semi-structured interviews, and the collection of data. Opening the black box of administrative work led us to investigate the formalized dynamics of data collection, as well as its more informal adaptations. As Bréchet (2000) explains, access to informal data is a delicate process in any organization, and even more so in a medical context. Adopting a quantitative methodology would have been difficult, if possible at all, given that our research consisted in

characterizing and defining a particular phenomenon. The qualitative method thus appeared better suited for the task.

Besides, our approach was aimed at practices themselves from the very beginning. As such, it beckoned us to visit the field in order to comprehend the work's true nature, and to understand it within a thick historical context. The case study method, situated at the crossroads of ethnography and documentary analysis, is an established and valued approach to studying nursing science, management, and the sociology of nursing work (Allen 2001; Divay 2012). We thus decided to adopt the assertions of Brink and Edgecombe (2003), preferring the observation of nurses working within their own environment, and the understanding of this environment by the analysis of institutional documents and interviews with different organizational actors, through discussion groups or interviews outside of their work context.

We settled on the obvious choice of non-participatory observation, that we can also call shadowing, since I did not have any training as a nurse. Wacheux (1996) calls this approach "passive" (p.209), and states that this method will provide the observer with less immersion than when actively participating. Observation is an affair made all the more delicate by the fact that the observer does not always have the necessary knowledge to correctly understand certain things. However, we sought to compensate for this bias by leading semi-directed interviews in order to fill in the gaps of our observations, and to answer certain questions that arose from the situations experienced.

Consequently, our investigations consisted in:

- Shadowing nurses and observing their work on-site by following one caregiver at a
 time, from the beginning to the end of their shift. The total length of investigation was
 prone to variation according to discoveries in the field and research opportunities.
- Carrying out in-depth interviews with caregivers as well as with doctors and noncaregivers (administrators, social workers, etc.) with whom they share these activities, and actors who participate in the establishment of the organization.

• Collecting institutional documents (reports, regulations, contracts, second-hand statistics, service protocols, etc.) with qualitative and quantitative data from different actors, allowing for a certain contextual reconstitution of observations and interviews.

2.1.2 Cross-national case study

With the objective of qualifying administrative work and its impact on the field, we decided to rely on several complete case studies. According to Yin's (1994, p.39) typology, we chose to study a "multiplicity of cases." Although this choice was not without its pitfalls, we saw it as an opportunity to study a phenomenon that, according to the literature, was international.

We chose wards and hospitals with comparable activities and shared characteristics (size, university hospital or not, placement, specialized or generalist, etc.).

This idea of a cross-national comparison of nurses' work emerged, as we have seen, from our exploratory fieldwork in the United States. Moreover, the literature demonstrated that very few studies compared nurses' work cross-nationally. The comparison emerged from a large survey using a conceptual framework derived from the work of Aiken, Sochalski & Lake (1997). These frameworks show that organizational factors such as the environment of nursing practices, and individual factors such as gender, influence burnout levels. These surveys examine the quantification of the organizational variation of nurses' activities. Other comparative surveys study nurses' perceptions on a single issue, such as individualized care (Suhonen et al. 2011) or the caring behavior of nurses (Papastavrou 2012). These have the benefit of providing information about organizational and cultural features in various national contexts, but they do not describe nursing work deeply enough. As Morris et al. (2007) explain, nursing work is too often described in simplistic and sometimes contradictory ways: "It is acknowledged among experts in the field of nursing that difficulties exist in articulating and describing nursing work in sufficient detail" (p.470). Cross-national ethnographic case studies have the particular advantage of drawing upon the practices observed during nurses' daily work.

France and the United States are interesting cases for comparison, since both countries have witnessed the diffusion of New Public Management (NPM) principles in the health care sector, and have recently reinforced new needs for accountability. The United States has been a forerunner in the implementation of NPM measures in the care sector since the 1980s (Halgand 2003). In France, the phenomenon is rather more recent, having been in development for 20 years. Nurses in both countries are now asked to participate in a large swath of activities linked to performance improvement (IOM 2011; Acker 2005).

By multiplying field experiences, the design of the study could now better be described as "ethnographic case studies", since six different cases in two countries are examined. Following Yin's (1994, p.18) definition of a case study, this investigation is an "indepth" empirical inquiry into a phenomenon "within its real life context." According to Yin, case studies draw their strength from relying on "multiple sources of evidence." As a result, the comparison of two cases allows us to draw on similarities and differences across the sites in order to produce concrete and context-dependent knowledge (Flyvbjerg 2006). Comparing cases from two national contexts also provides a better account of nurses' everyday practices, by facilitating the "zooming in and out", as explained and advocated by Nicolini (2009, p.1411).

"Just as the global can be explained as a nexus of locality, the local is itself fragmented and multiplied, a node in a complex nexus of actions that enter into it and traverse it. Practice (including the practice of organizing) is the result of this complex interplay between the local and global."

The use of cross-national ethnography increases the possibilities of drawing comparisons within, between and beyond the cases themselves (Jørgensen 2007). The strength of this study resides in its examination of six cases, through nurses' everyday activities, in order to draw organizational comparisons. Contrary to a global multi-sited ethnography, the aim here is to understand local processes through a comparative lens.

2.1.3 Data triangulation

The examination first consisted in the triangulation of data in order to understand them in the specific context of each case. Then, the data were systematically put into perspective with the other case studies in order to encourage the ability to generalize this study's conclusions. This way, *in vivo* line-by-line coding was formalized and the comparison of codes against one another allowed us to draw out similar phenomena (Strauss & Corbin 1990).

The triangulation phase became particularly important for our research subject, as it repeatedly allowed us to acknowledge the ambiguities in nurses' perceptions and opinions when compared to their actions and situational realities. As Yves Clot (2010) explains, this provides an opportunity to identify lacunae and "impediments" to certain work situations. Moreover, as Yin (1994) describes particularly well, triangulation is a necessary step in the process of understanding non-visible elements, as well as for increasing the validity of the analysis. Indeed, confronting a variety of sources allows the verification of their very own coherence.

2.2 Fieldwork and data collection

In this section we will first explain the choice of fields and their coherence with our research questions (2.2.1). We will also describe our methods of data collection (2.2.2) and their analysis (2.2.3).

2.2.1 The choice of fields

a. Three French units

As we have already mentioned, the exploratory fieldwork in the United States allowed us to isolate principal issues for future research. It also allowed us to begin reflecting on field

characteristics in and of themselves. Four units were observed during the preparatory fieldwork: a neonatology intensive care unit, a cardiology unit, the ER, and a medical intensive care unit. Both intensive care units emphasized technical and highly-regulated work, where administrative tasks were quite important. This realization encouraged us to select an ICU as our first unit studied in France. Integrating the field proved rather easy, but it took a bit of time, as hospital administrative services required a certain number of credentials and documents. It was after a few weeks in this unit, and following a surprising observation (which we will discuss in part 2), that the idea arose of opening up a completely opposite second field.

Consequently, we decided to include a so-called "polar" case (Flyvbjerg 2006). This choice was coherent with the chosen case study methodology, and with the idea of identifying similarities and differences between observation sites. This would lead to producing concrete and context-dependent analytical elements. The polar analysis cases were meant to provide contrasted cross-case thematic analyses (Mills et al. 2009), revealing phenomena that would not otherwise have been observed in comparing similar cases. The ICU and geriatric long-term care unit can be characterized as polar cases, given the kinds of care they provide, and, as we will see later on, by their very different nurse-to-patient ratios (1 to 3 in ICU, versus 1 to 40 in LTC).

It is with these issues in mind that we led the first phase of the study from January 2014 to February 2015:

The first investigation took place in a 30-bed ICU at a large teaching hospital with a team of 20 day-shift nurses. The department cares for patients with very serious conditions, who often require respiratory assistance and depend on medical and nursing care. ICU nurses provide intensive technical care and respond quickly to emergencies.

The second investigation took place in a 40-bed LTC unit with a team of 5 day-shift nurses who provide end-of-life nursing care. LTC nurses mainly focus on comfort care and often provide relational and emotional assistance to patients and their families. In both units, nurses generate documentation and undertake communication using both pen and paper, and Electronic Health Records (EHR).

The intensive care unit (ICU) is a critical care unit for patients with severe and life-threatening illnesses or injuries. These patients are constantly monitored very closely and the support of specialist equipment is needed. The ICU is usually staffed by highly trained doctors and nurses and the staff-to-patient ratio is higher that in regular hospital wards. In France, laws exist to regulate ICU staffing, requiring 2 nurses for every 5 patients.

The unit counts 20 beds and 40 nurses working day and night shifts. There are also 20 nurse's assistants. The ward is divided into 3 sections, each with one senior physician in charge and one or two additional fellow physicians.

Most of the patients are transferred directly from the emergency department or from ambulances. They can also be transferred from a regular ward if the patient's state rapidly deteriorates. Some patients may also have a quick stay in the ICU after invasive surgery. So the length of stay can go from a day or two to several months, according to the seriousness of the injuries or illnesses, but the aim of the medical team is to rapidly transfer the patient to a regular ward.

Nurses work with highly technical equipment including mechanical ventilators, cardiac monitors, external pacemakers, defibrillators, dialysis equipment, a web of intravenous lines, feeding tubes, suction pumps, drains and catheters. Many patients undergo medically induced comas and induced sedation. It was therefore very interesting to start the fieldwork with this very technical ward.

The LTC cares for 40 residents (here, they are not referred to as patients). They are all over 60 years old and can no longer live on their own. Compared to an EHPAD (Home for dependent elderly persons), residents have several pathologies and are often in an unstable condition, requiring significant medical supervision. The staffing average is one nurse per 40 residents. As such, five nurses work the day shift. There are 7 orderlies (nurse assistants) and hospital service employees (HSEs) in the morning, and 4 in the afternoon. The average number of deaths every year is 40 per unit.

This ward follows much the same rules as traditional geriatric housing institutions. Moreover, there is a life project, a very long continuity of care, and each decision is discussed by the entire team. Everyone has their say, including orderlies and HSEs. As a result, the temporality of care is significantly different

The principal participants in this study were, of course, nurses. The following inclusion criteria had to be fulfilled: having a French diploma in nursing and having been with the unit for more than 6 months (newly hired nurses are still in orientation and may be disturbed by the presence of a researcher shadowing them). The sample included 15 nurses in the ICU and 5 in LTC.

The disparity in the number of nurses participating in the study can be explained by the ratio of nurses in each unit. In LTC, the number of nurses working the day shift was six. Five of them took part in the study, the sixth being on sick leave at the time of data collection. The ICU was composed of twenty nurses during the study, fifteen of which participated, while the five others were either newly hired or on vacation. The nurses' managers and head physicians were interviewed in both units, in order to answer questions about the general organization of the wards. In total, 20 nurses were shadowed and interviewed and 7 interviews were conducted with nurse managers and head physicians.

Following both of these field studies, we realized that it was necessary to examine a more "neutral" or "in-between" case, since both of these cases were so different that it might be considered a methodological *faux-pas*.

Indeed, the findings resulting from the comparison of two polar cases enabled the emergence of analytical elements concerning nursing work, as well as the ability to define administrative work according, as we will see, to six realms of activity. However, despite being interesting in and of itself, the study of these polar cases highlighted the need for further research by comparing the results with other services in France and abroad, as discussed in the limits of article 2 (see Appendix 1). As such, this section will present results from a third field study: a Parisian hepatology unit.

This study was conducted in January 2015, directly prior to our 6-month study in the United States. This explains why it was rather rushed and brief, and why it was not included in article 2. Despite all the vagaries of field work, a number of elements were highlighted during these two weeks of observation. These results give us the ideal opportunity to discuss and contrast article 2.

The hepatology unit is of particular interest as an intermediary service between intensive and long-term care. It is a more traditional unit, where patients never stay too long. Many of its

patients are subject to chronic illnesses; suffering from cirrhosis, tumors, hepatic impairment, or viral hepatitis. Since the chronicity of these ailments demands that they return regularly, some patients are well-known by the nurses.

There are about 10 patients per nurse, which is considered a rather "burdensome" ratio. This is especially the case since, of the 30 being attended to, 6 patients require palliative and personalized care.

As we can see, the field choices resulted from a largely inductive back-and-forth process between collected data and existing literature. Consequently, the French study was particularly rich in methodological instruction, and allowed us to create a fixed frame of observation (as we will see in the creation of the nursing activity categorization scheme) and of analysis. Henceforth, the frame became much clearer, and the ensuing American fieldwork was naturally and symmetrically prepared according to the French experience.

b. Three similar American units

Accessing the American fields required much more administrative planning and preparation, which did not leave much room for induction. Having learned a great deal from our exploratory study, we were able to more precisely prepare the ethics application to the Internal Review Board of the University of North Carolina at Chapel Hill. The framing of the French study helped us considerably in writing the application, but the extremely precise questions asked of us (see Appendix 3: Internal Review Board) sometimes contradicted the methodology itself, which forced us to be that much more rigorous (which turned out to be rather beneficent, in the end).

As a result, we were able to select three American wards corresponding to the French ones. These were chosen within the same hospital, which was about the same size as the French institution we examined (800-bed capacity). The following table presents the three American units in symmetry with the French units.

	French Units	American Units
2 Intensive Care Units	Hospital A. Medical Intensive Care Unit (MICU) 20 beds, 2 to 3 patients for 1 nurse	Hospital D. Medical Intensive Care Unit (MICU) 30 beds, 1 to 2 patients for 1 nurse
2 Units specialized in Oncology	Hospital B. Hepatology/oncology 28 beds, 10 patients for 1 nurse	Hospital D. Oncology 34 beds, 4 patients for 1 nurse
2 Units specialized in Geriatrics	Hospital C. Geriatric Long-Term Care Unit (LTC) 40 beds, 40 patients for 1 nurse	Hospital D. Geriatrics and Internal Medicine Unit 31 beds, 5 patients for 1 nurse

Table 4 Presentation of the six case studies by hospital ward

All in all, the sample of cases allowed for building what Yin (1994) calls a multiple-case design. The three types of units were very different in terms of their activities. They ranged from a medical intensive care unit (MICU) caring for patients with very serious conditions (sepsis, renal failure, liver failure, pneumonia, pancreatitis or intracranial hemorrhage), to oncology/hepatology units where nurses are highly skilled in managing not only the technical aspects of caring for patients with tumors and hematological malignancies, but in providing emotional support as well. Finally, both geriatric units care for patients requiring medical treatment and diagnostic evaluation of both acute and chronic diseases, as well as cognitive age-related changes. The French unit differs from the American one in that it provides long-term care facilities.

In each unit, one or several gatekeepers (Hammersley & Atkinson 2007) were identified and helped introduce the PI to the field. In France, the first gatekeeper was the head physician. They presented the PI to the nurse manager, who would then become the primary contact for ensuing fieldwork. In the United States, the gatekeeper was always the nurse manager. Nurses were selected to ensure a certain amount of profile variability, ranging from the newly graduated to those with high levels of experience. The following inclusion criteria had to be fulfilled: the participant had to be registered and working as a staff nurse in the ward, a position and role common to both countries. They also had to have been part of the unit for more than 6 months (newly hired nurses are usually still in their orientation period, and may be disturbed by the presence of a researcher shadowing them).

The selection of various cases allowed us to extend the spectrum of our analysis, and especially of our comparison. By this point, the comparison was to take place of two levels: by case and by national context. Our selected methodology (the ethnographic method) allowed us to continually analyze and compare our data as we were triangulating it. This triangulation of different data collection methods was essential in our case comparisons.

2.2.2 Three methods of data collection

This ethnographic study employed three methods of data collection: shadowing (qualitative data gathering method), semi-structured interviews, and collecting internal documentation. In order to maximize the consistency of the data collected cross-nationally, this fieldwork was conducted only by me, acting as a solo researcher (Chen 2012).

Consequently, I shadowed (McDonald 2005) each of the 47 nurses for at least one entire shift, and took descriptive hand-written notes about various situations and discussions in a journal. The result was 766 hours of detailed documentation about nurses' activities, discussions and situations in the six wards.

I also conducted and recorded semi-structured interviews with each of the 47 nurses who had been shadowed, via dictaphone. An interview guide was developed, based on the literature review and on observational results, which I thoroughly discussed with my two supervisors, Mathias Waelli and Etienne Minvielle. In addition, I also conducted 23 semi-structured interviews with chief nurses, physicians, clinical nurses, and directors of quality improvement. I also interviewed each unit's nurse manager, as well as head physicians (in France). The aim of these interviews was to answer preliminary questions about the general organization of the wards, as well as to provide reflective opportunities along the entire process of data collection.

Finally, I collected various internal documents. In France, a certain amount of paper documentation was collected in order to keep a precise track of all the information recorded by nurses. In the United States, hospital policy dictated that documentation be 100% paper-free, which meant that I had to learn about electronic documentation requirements in order to

be able to follow nurses during their shift and to understand their computer activities. I also took descriptive notes concerning information collected in the EHR.

French Units	American Units
Hospital A. Medical Intensive Care Unit (MICU) - 10 nurses shadowed and interviewed - 2 interviews with nurse managers - 2 interviews with physicians Hospital B. Hepatology/oncology - 7 nurses shadowed and interviewed - 2 interviews with nurse managers	Hospital D. Medical Intensive Care Unit (MICU) - 8 nurses shadowed and interviewed - 1 interview with clinical nurse - 2 interview with nurse managers Hospital D. Oncology - 8 nurses shadowed and interviewed - 2 interviews with clinical nurses - 2 interviews with nurse managers
Hospital C. Geriatric Long-Term Care Unit - 5 nurses shadowed and interviewed - 2 interviews with nurse managers - 2 interviews with physicians	Hospital D. Geriatrics and Internal Medicine Unit - 9 nurses shadowed and interviewed - 2 interviews with clinical nurses - 2 interviews with nurse managers
Comprehensive interviews -1 focus group with 5 nurses -1 interview with the chief nurses officer	Comprehensive interviews - 1 interview with the hospital's director of quality improvement - 1 interview with the director of nurses' professional development
Total 22 nurses shadowed for a total of 406 observation hours 34 Interviews	Total 25 nurses shadowed for a total of 360 observation hours 38 interviews

Table 5 Detailed presentation of data collection through interview and observation

a. Shadowing

I shadowed each of the 47 nurses during their daily shifts, and took low-inference descriptive hand-written notes of situations and discussions in a notebook (McDonald 2005). I chose to shadow nurses during their day shift for two very pragmatic reasons: conducting observations at night would have made the study more complex, and I certainly did not feel that I had the strength to work only night shifts. As a result, the daily shadowing included all the activities undertaken by staff nurses during an ordinary shift, with a particular emphasis on indirect care activities involving handwriting or Electronic Health Records, as well as team interactions and communication. I systematically recorded field notes and organized them into two main categories: the objective, low-inference, description of nurses' daily activities (taking notes on what nurses were doing, without interpretation), and researcher interpretations of these observations (documenting personal comments on the meaning of

data). This enabled me to retain a critical distance from the data and from my own interpretations (Hammersley & Atkinson 2007).

b. Interviews

The notes gathered from shadowing were to be analyzed later on, and formed the basis of the interview topics. I paid particularly close attention to interviewing the nurses I had previously shadowed. In this way, I would be able to use my field notes to ask valuable questions about our shared shadowing experiences, and about the things that particularly struck me at the time. I ended up conducting 34 semi-structured and audio-recorded interviews with each of the shadowed nurses, as well as with chief nursing officers and physicians (see Table 3).

I was correspondingly able to develop an interview guide based on the different themes that had emerged from shadowing. These themes helped to maintain focus on the study's objective, that is "what is nurses' administrative work and how do nurses perceive and understand such work?", all while creating space for in-depth conversation. The themes we discussed included: describing daily routines, defining administrative work, detailing the content of specific tasks, general perceptions of administrative activities, more precise opinions on observed situations, etc. In addition, seven semi-structured interviews were conducted with chief nurses and physicians. These interviews aimed at collecting data about the general organization of the ward. All audio files were anonymized and transcribed by the PI. All names used in interviews and fieldwork have been changed.

c. Collecting documentation

As we saw during our exploratory fieldwork, there are certain inherent difficulties in collecting documentation: namely, how to gain access to it. Whereas French caregivers were rather forthcoming in providing me with their reporting documents (mostly untouched) - explanatory sheets, strategic plans for the wards and the establishment, etc. – the American

experience proved to be a true administrative marathon. Moreover, the digitization and 100% paper-free hospital policy meant that access to data was much more difficult. I had to adapt to these circumstances, which meant that I began taking photographs and screenshots of everything I could (with the consent of caregivers and managers). When doing so was impossible, I compensated by taking exhaustive notes about what I saw on the screens. These materials were to prove essential, especially in the United States, since they represented a veritable wealth of knowledge about how the institution operates. As explained, gaining access to the field was very difficult in the United-States, given the complexities and length of IRB processes.

2.2.3 Data analysis

As described above, this study and its analysis relied on qualitative reasoning and the triangulation of data. We conducted data sampling and analysis until it was possible to describe and understand the perception and content of administrative activities, according to the principle of data saturation.

First, we read field notes and interview transcripts as a whole, and we stored the coded phrases using qualitative data analysis software (Max-Qda 11). In this first phase, the data was examined with the research question in mind – nurses' perception of their administrative activities. Special attention was paid to identify meaningful themes reflecting nurses' opinions (such as: the burdensome nature of activities, their utility, the time taken, etc.) via inductive analysis. The final step was to triangulate the data. Field notes and interview transcripts were pored over once again in light of findings from the time-and-motion study. The specific aim was to analyze the data more closely by looking at each activity in detail and creating codes for each one: relative to the time spent, nurses' perceptions, activity content, and precise descriptions of each task.

All along this process, I regularly met with Etienne Minvielle and Mathias Waelli once every two months or so, in order to elaborate and analyze the themes, results and coding system I would apply. The first theme that emerged concerned the various ambiguities in nurses' perceptions of their administrative duties. I created several sub-themes revealing two major perceptual categories. In discussing all of these things, we came up with the idea of creating a categorization of administrative and organizational nursing activities. I returned to the data and carefully selected all the activities that could fit into this category according to

the literature analysis. We then decided to confront this first categorization to nurses' perceptions during a focus group. With these categories in mind, and influenced by time and motion studies in the existing literature, the three of us agreed that it would be particularly interesting to record nursing time. I returned to the field. Having acknowledged the importance of timing, a second theme appeared as essential: the content of each activity. With this in mind I returned to my field notes in order to find adequate descriptions of each task. This arduous process resulted in creating new sub-themes relating to how these activities were integrated into nursing work. Finally, the subject of EHRs appeared quite clearly during the American fieldwork, as I was confronted with the difficulty of timing nurses' administrative tasks, as they were all gathered in one digital tool.

It is important to note that in France, the interviews I conducted were in French. Relevant quotes cited in this thesis have been translated from French to English under the supervision of Tristan Wettstein, an external professional translator.

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Subsequently, we saw that the choice of fields and of data collection methods was linked to the methodology used for observing our subject. The case studies created themselves as we led our French investigations, revealing the power of comparing three different cases. From this point, we were able to extend our comparison to the cross-national level. This inductive yet pragmatic construction was not without its own difficulties. Resultingly, the following section will provide a reflective discussion of our relation to the fields themselves, especially as concerns the salience of cultural differences.

3. The researcher and the peculiarity of hospitals

As highlighted in the introduction of this manuscript, my encounter with Mary and Jack while roaming through the corridors of a New York hospital provoked within me a number of questions concerning the burden of "paperwork" in their daily routines.

Ever since then, this scene has been a constant reminder to me about the importance of studying this often-invisible aspect of nursing work. Opening the black box of administrative work is an exercise in understanding the issues that kept Mary in her computer seat while an elderly person called for help from the next room over. It is an exercise in questioning the

content of this work and how nurses perceive it. But Jack's reaction also reveals the difficulty of grasping this subject. The challenges of ethnographic study are further exacerbated by being embedded in a team of hospital workers who do not value the task being examined.

In this section we will take a reflexive standpoint to better describe the challenges of the ethnographic method in integrating the units (3.1), but also in the limited acculturation that the position of observer makes possible (3.2), and how interviews provided a great counterpoint to observations (3.3). These reflexive outcomes resulted in a first published article (Appendix 1).

3.1 Integrating the units

Integrating the subject environment is a fundamental preoccupation of ethnographic field work. Embedding the hospital teams varied from one institution to another. The role of gatekeepers was important and strongly influenced the researcher's insertion into the field. As a result, the description and analysis of each field study highlighted the differences between France and the United States, especially in terms of work organization. The reflexive exercise that consists in examining the researcher's role in the field allows us to begin reflecting on the variability of contexts of care.

3.1.1 Gaining access to the field and learning about the nursing hierarchy

The way the researcher introduces themself and enters the field is an important aspect influencing their independence and their freedom to conduct research. Being officially introduced to a field and clearly explaining the research title and topic may have injected some bias into the project. I confronted these questions all along my research, particularly in the United States.

I landed in North Carolina on a bright and cold March day. It was time for me to wear scrubs again. Eager to start my fieldwork, I had, alas, neglected the importance of American

bureaucracy. France is well known for its bureaucratic tendencies, but research-wise the USA takes the cake. After addressing a long list of questions posed by the Ethical Review Board to determine whether or not there were "human subjects" in my research, I was asked by the board to precisely "describe my efforts to ensure equal access to participation among women". I wondered if they had bothered to read my application at all. After much back and forth with the board, my Internal Review Board application was finally accepted and I was ready to get to work. But there remained a background check, a tuberculosis test, a drug screening test, and a flu shot. After all of that, my project still had to be approved by the Nursing Research Council, which must expressly agree to any research involving nurses in the hospital.

Two months after I arrived, I finally collected my shiny red "shadow visitor" badge, and resumed my lonely inquiry into the way nurses actually work. These two months were less time in the field that I expected, and particularly highlighted how long and tiresome the administrative process can be. The IRB forms are not well conceived for qualitative studies, especially when the purpose of the research is to clarify a subject. It is becoming very difficult for researchers to avoid these administrative requirements unless they decide to work in a hospital and do undercover research, which brings into question many other methodological issues (Peneff 1992). Interestingly enough, from these various bureaucratic preliminaries, I learned that research "involving" nurses is often not "about" nurses. Indeed, I found to my surprise that few researchers were interested in nurses themselves, in their work environment, or in their professional evolution. Instead, I kept hearing about "patient safety", "evidence-based management", "critical thinking", "leadership" and, of course, the ubiquitous "teamwork".

Moreover, the choice of entering the field through official hospital and university hierarchies was an obvious one, allowing me to gain access to certain documents and to interview various actors (from nurses to nursing senior executive officers or physicians). Interestingly, I learned a great deal about the nursing hierarchy while struggling to gain access to the field.

Before beginning my fieldwork in France, I presented the project during an initial meeting with the head doctor. Once the project was accepted, the head doctor presented me to the nurse managers and helped me with administrative procedures. It was with seriousness

that the doctor took on this role, never hesitating to invite me to certain meetings and always fretting over my integration in the field. On each first day in the field, the nurse manager introduced me to the entire team: medical secretaries, nurse assistants, nurses, residents, and physicians. After a day or two in the French field, people were already saying "Bonjour Mademoiselle" (Hello Miss) each time I ran into them, and some physicians inquired about how my research was going. Naturally, I was invited to physician staff meetings, so that I could "understand all the ward's dynamics". Each time I went to a meeting I was briefly introduced by a physician, and I would sit at the table with the whole group.

Pondering these experiences I realized that things were very different in North Carolina and New York. There, the nursing council approved my research, and I met with each nurse manager. All of them agreed to welcome me into their units and took responsibility for my experience. On my first day, the nurse manager would usually give me a tour of the unit so that I could orient myself. But I was only ever introduced to the nurses, and never to administrative support, nurse assistants, or to physicians, who usually tended to stay in their offices. It never seemed to occur to anyone that the physicians could be interested in this research taking place right under their noses. I concluded that the difference with France derives from the existence of a stronger nursing hierarchy in the United States. Nurse managers often offered me the option to select the nurses I would shadow, which I refused as their selection would have imposed considerable bias on my research, since some managers said that they would select the nurses who were "the most compliant and effective with their documentation." Instead, as I did in France, I chose to walk around the unit and randomly pick a nurse for a day or two before moving on to another one. In this way I could shadow as many nurses as I wanted and I could observe their increasing willingness to participate over time.

3.1.2 Integrating nursing teams

Furthermore, the difficulties in meeting nurses and integrating into their teams varied considerably between the two countries. In France, where relations between doctors and nurses were slack or distant, being introduced by the doctor made integration a more delicate

affair. The doctors' benevolence sometimes put me in an uncomfortable position, and demonstrated the distance between doctors and nurses, as shown in the following description.

I'm standing with Julie in front of the medicine cabinet. The head doctor passes by, smiling and nodding at me as he goes along. Julie elbows me: "wow you're pretty lucky, you got a smile from the big boss. Me, he doesn't even know my name. I hope you won't tell him everything I've said!" (Field notes, March 2014, French ICU)

After several such situations during my initial field work, I understood that in order to better integrate the nursing team, I had to "choose sides" and present my project alone, without indicating those responsible for my access to the field. This strategy seemed to pay off when, several months later, in LTC, a nurse told me the following while stirring her coffee:

"Well, you see, that's just another one of the head doctor's antics. Anyways, he's never here, he never comes to see us." Note to self: phew, am I relieved not to have been introduced by the doctor. (Fieldnotes, July 2014, LTC).

As I advanced in my fieldwork, introducing myself became increasingly inevitable and allowed me to take control over my relationship with nurses. As a matter of fact, the introductions made by nurse managers or by doctors were often very quick and clumsy. Sometimes all they said was "This is Lucie, she's here to observe." Dealing with such reactions is common and demands a lot of work to gain the trust of participants (Peneff 1992). Justifying my presence was sometimes a trying experience in French wards. Nurses are not used to meeting social science researchers. Sociology is often confused with psychology, and for them the mention of a thesis refers more to the final stage of medical school students than anything else. This confusion often made me simplify my reasons for observing; presenting myself simply as a student writing a dissertation on nursing work. The real challenge was getting myself accepted by the nurses, and reassuring them that my intention was neither to audit nor to evaluate them.

In his book *The Fieldworker as Watcher and Witness*, Charles Bosk describes the difficulties of integration:

On the one hand, in day-to-day interactions, my subjects had no expectations of me. I was ornamental, decorative, extraneous. [...] On the other hand, I was constantly tested, made the butt of group jokes, and accepted very slowly in the setting.

Like him, I sometimes felt the discomfort of being a decorative feature, relegated to a prop in the hospital's grand play. But I also felt that I was being tested and evaluated before being slowly accepted.

The American experience was very different; introducing myself and integrating into nursing teams seemed easy, almost natural. My many hours spent in French hospitals had definitely allowed me to build confidence, but my experience was all the more serene as a result of all the efforts put forth in integrating me. Indeed, after having cleared the administrative hurdles, I could go introduce myself directly to each service with my badge in hand. The nurse managers were always expecting me, having been informed of my arrival by the Nursing Research Council. We would often prepare a note of introduction together for the service's newsletter, and on the day of arrival my name and photograph were shown on the dashboard. The manager would often give me some time to introduce myself during transmissions, and by the end of the first morning, all personnel in the unit knew that "a French girl" was there. It was common to meet nurses studying at the Masters level who were familiar with qualitative research methods. In order to avoid the bias of integration through a very formal access (Peneff 2004) I played out the card of the naïve French student who wanted to understand nurses' work. In this way, I quickly ended up being very welcomed by nurses who did not see me as a threat since I was a foreigner and an outsider.

Wearing the white or blue scrubs was a choice, and at times an obligation, presented to me in both countries. Donning the uniform helped me integrate and adapt to the hospital environment. It gave me an air of professionalism and a sense of legitimacy during my presence in different units. I remember in the mornings during the summer of 2015 in North Carolina, I would take the 6:00 am bus wearing my sky blue scrubs. I felt a certain sense of pride traveling to the hospital among other medical staff wearing their uniforms. The scrubs allowed me to feel comfortable around patients, since they always associated me with the nurses.

My days at the hospital played to the rhythm of each unit's daily rituals. While all different, these rituals often took place around a first transmission, by team or individually

with a colleague. They were then followed by the organization of care and the reporting of information, and always ended by a final oral transmission. At the onset of my fieldwork, I persisted in accompanying the nurses "until the very end" for the entire work day. But when the day lasted 12 hours, my work began to become increasingly difficult and less fruitful in terms of gathering data. After a while I decided to loosen up and adjust my pace of work. As a result, I decided to divide my days in two, following nurses in the morning of one day, and then on the afternoon of the next day.

3.2 Limited acculturation

3.2.1. Facing my own fear and learning from it

All along my experience in the field, I was emotionally confronted with and exposed to my own anxieties about sickness and death. As Theresa Brown writes¹, each profession has its own initiatory rites, and for nurses the first death is a rite of passage. It was along these lines that I had my first confrontation with death in the summer of 2014. An elderly lady in the geriatric ward did not wake up, when just hours earlier I had spoken with her and helped her put on her slippers. The ensuing and lengthy last rites were an intense emotional trial. In this sense, ethnographic work in hospitals is difficult, especially when the researcher is not trained as nurses are to deal with sickness and pain. Indeed, the researcher is often totally powerless. Writing in my notebook was an important outlet during work in wards such as intensive care units, where exposure to severe situations was a daily occurrence. I remember meeting an old ballet dancer who had lost her fingers and one of her legs following a particularly severe bout of cancer. Coming home that night, I felt the need to note "my sadness before this devastated body, a body I pictured dancing in the Paris Opera." An American nurse once told me about what she calls "soul jumps", those times when she can no longer maintain the emotional distance necessary to protect herself, and where the soul and anxieties of the patient literally jump on her without her being able to do anything about it. As my experience grew, I eventually began to get used to the various situations I witnessed. This recalls a description by R. Fox about medical students that learn to objectify their feelings during an autopsy: "Simply because they know more about what to expect, the second autopsy is likely to have less of an emotional impact on them."

These thoughts and fears are all quite normal, but in order to be relevant to my research, they need to constantly be underlined and analyzed according to a reflexive

viewpoint (Arborio 2007). For instance, I realized that I slowly developed a set of mechanisms to protect myself. In fact, I noticed a certain similarity of behavior between the nurses and me. When patients' looks of despair were too heavy or when families cried in the room, I would dive into my notebook and feign concentration in order to avoid this "soul jump," or because my role as an observer gave me little legitimacy for expressing compassion. Nurses sometimes behaved similarly, focusing on their computer or sneaking into the treatment room on the arrival of a family or of a particularly insistent patient. This is a tangible reality in both France and the United States, and it became an important point for my results, as we will see in Chapter 5. Therefore, from a reflexive analysis of my own behavior, I could think about nurses' behaviors, which opened up more issues for inquiry.

3.2.2 When the fields highlight cultural differences

Walking around hospitals in both countries provided an excellent opportunity for the researcher to observe various behaviors and record cultural differences. One that sticks with me the most is the relationship with the patient. It is somewhat different in the United States, where I was sometimes astounded by the casual way in which nurses or doctors addressed patients. In France, this interaction is often very courteous and professional - a nurse would never embrace or hug a patient. You would never hear a nurse say "don't worry honey, you're going to survive, we're going to save you," like you would in the United States. This familiarity and flow of good feelings made me uncomfortable at times, but it also allowed me to understand the importance of positive discourse from medical staff, particularly in oncology. Indeed, I have witnessed how this flow of positive words supported suffering patients and gave them strength to fight a disease. We could argue that a too-close relationship could betray the professional nature of the relationship between the patient, physician and health care team, but it never felt that way, since it was all based around mutual respect.

Another observation concerns the interplay between professional and cultural differences. In France, we are well known for our love of croissants and our long coffee breaks. This stereotype is not completely mistaken and was readily observed in the French hospitals where I worked. In each unit I visited, the break room was open to everybody. It was customary to sit down to have coffee together, among doctors, nurses, and other staff. Even if

break time is very limited, it is a setting where nurses' assistants, secretaries, nurses, residents, and sometimes the attending physicians and fellows stop by to take a little break with each other. It is during these breaks that (for instance) a nurse in Long Term Care liked to gauge what had happened the previous day while she was not working. It is where the medical resident came to inquire about the family history of a lonely patient, and where nurse managers gave informal feedback about the latest institutional meeting. Those clinical professionals and their coworkers have a shared space in which to laugh, chat, and express themselves freely. It is, I believe, a valuable resource for communication and team-building. I have yet to see anything like it in the USA. Of course, sometimes one finds a big box of donuts a physician has brought for the team. But everyone tends to take the donuts and eat them in front of their screens, looking at Facebook while drinking a huge, very un-French coffee.

3.3 Interviews as counterpoints to observation

Interviews served a dual purpose of completing our understanding of nurses' feelings about administrative work, and better comprehending certain specific practices. Interviews were also an opportunity to collectively reflect on relevant events, and as such I made a point of interviewing each of the nurses I had spent the day with. These interviews would often take place some days after the shadowing, which allowed me to think clearly about the points I wanted to go over. Even though similar subjects were discussed, each interview was unique since it was partly based on prior observation.

My customary first step was to ask the nurse if she could describe her average work day. This question often elicited a certain amount of surprise and comments such as "Oh my, I could go on forever." But this exercise served to ease the atmosphere and to then ask questions about more specific tasks. It also allowed me to analyze the kinds of activities nurses preferred describing and those they did not.

The second step was to ask the participants to define administrative work in their own words, and to give examples of such administrative activities. This question often provoked interesting discussions and sometimes gave nurses the opportunity to take a step back from their own practices. I recall several French nurses saying: "now that I'm telling you about it, I

realize that we complain a lot about paperwork, but we really don't have that much to do," or even "yes, in fact, I don't like doing it but it's important."

Third, I would try to gauge the nurses' understanding about the utility of reported information. The answers to this question were generally brief and did not really interest the participants.

My fourth step was to question nurses about their feelings concerning the organization of their unit and of administrative work, as well as about how they would like to see things change.

Finally, the relationship with information technology became an increasing preoccupation as my study progressed. This was especially the case in the United States, where the EHR is a lynchpin of reporting work.

Interviews were not always easy: nurses have precious little free time, and it can be very difficult to set up a meeting on a day off. Organizing interviews sometimes became tedious, as I had to be diplomatic and even negotiate with my colleagues for them to do it on their work time. When time could indeed be found, the difficulty became finding a place to do the interview. At times, no rooms were free, and I remember one interview taking place among crates in the reserve room, and another on the floor of an empty room. Generally, nurses were enthusiastic when it came to talking about their work. The interviews were particularly long in France, as nurses spoke at length about their experiences. In the United States, on the other hand, nurses had a more scholarly approach to answering questions. There were often interruptions that broke our concentration, such as the phone vibrating or repeated calls on the intercom, especially in the United States. I remember the famous "code blue" going off during one of the conversations. These constant interruptions complicated interviews and made me nervous, since I did not want to postpone the discussion.

Interviewing people in a language that is not one's own is an additional challenge, as Chen (2012) explains. Yet, I never had any difficulties in being understood or in understanding my interlocutors. I was often surprised by the very direct and even coarse language I heard, such as this intensive care nurse who answered my question about administrative work in the following way: "Hey honey, I ain't know fucking shit about that";

or another nurse talking about her superior, not hesitating one second to say that "he is such an asshole." I was surprise by these words, since I never experienced them in France. But it revealed the ease with which nurses would open up to me and how they did not feel the need to censor themselves. This could be interpreted as a sign of good integration.

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These thoughts, and several others, resulted in the publication of a first article as follows: Michel L. (2017) A Failure to Communicate? Doctors and Nurses in American Hospitals. *Journal of Health Politics, Policy and Law*, 42: 4. (Appendix 1).

PART 2

The perception and content of nurses' administrative work: between ambiguity and integration.

Chapter 4 The perception and time spent on administrative work in three French units

As part 1 has highlighted, the definition of administrative work is no easy task. Yet, it is quite common to hear caregivers complain about the suffocating amount of administrative work and papers they have to deal with. When I began my fieldwork, my main goal was to open the infamous black box of administrative work, and to extract from it the most accurate description possible in order to better characterize or define it. However, the reality of comparative work did little to facilitate this task. In the first unit, nurses told me that they did not have any administrative work. These accounts directly challenged the essence of the research question. In the second unit, nurses said they were absolutely invaded by paperwork. And yet, both units seemed to perform the same types of administrative tasks. This observation initially encouraged me to push the analysis further into the details of daily work in order to understand the symbols of administrative tasks, before even settling on a definition. Together with nurses, we then created a categorization system which became an essential element for making comparisons. Indeed, after the observation of the two first polar cases, I chose to investigate a third French ward to broaden the comparison.

The following chapters will present results from these three French field studies, following the research process and experience, and highlighting the evolution of our findings and analyses. It will first present the creation of a categorization of nursing administrative tasks called documentation and organizational activities (DOA) (1), before highlighting nurses' perception of their administrative work (2), and then providing results from the time and motion study (3).

This chapter is the extended and enriched version of a second article published in the Journal of Advanced Nursing (appendix 2).

1. Reflecting nursing work through classification

This section will revisit the reasons that push us to define administrative activities more objectively (1.1) and how our classification of activities was constructed (1.2).

1.1 The necessary definition of administrative activities

During the first few weeks of my intensive care unit fieldwork, I presented myself as studying nurses' administrative duties. Initially, nurses had trouble understanding the research project. When I expressed interest in studying administrative work, their reaction was often punctuated by a little smile or by an inquisitive raise of the eyebrows. These nurses very quickly insisted on the importance of their clinical labor in this highly specialized and careoriented unit. It was as if the idea of administrative work was somehow pejorative and did not concern them.

Observation days went by and my findings became increasingly bewildering – could we consider the reporting of constants as administrative work? What about transmissions? What about writing up care plans? What about quality indicators? The nurses' responses were giving us very interesting feedback regarding their representation and their conception of administrative work, but were too diverse to help us properly define it. For some of them, administrative work was "everything on paper," while for others it was "everything not directly linked to the patient," or even "everything that wastes time" and especially "that takes us away from the patient." I quickly realized that the absence of a feeling of doing administrative work did not mean that nurses did none; instead, it may mean that these activities are integrated to their work and somehow delegated to other health care workers.

From this first finding it appeared that a more objective grasp of nurses' work was necessary to build a good comparison of cases. Following this idea, I stepped out from the field and back into the literature in order to figure out how to classify nurses' activities and to better define the administrative work they do.

1.2 Building a classification of nurses' administrative activities.

The classification is based on a careful analysis of the literature – most notably of Time-and-Motion and Work-Sampling studies. We decided to base our categorization on nursing activities, following Williams et al. (2009), Duffield et al. (2000), and adapted by Pelletier (2003). This typology defines four major categories:

- 1. Direct care: all the work done in the patient's presence, or in the presence of their family, as well as the observation and compilation of clinical data (not necessarily at the patient's bedside).
- 2. Indirect care: all the activities concerning the patent that do not require the patient's presence in the unit.
- 3. Activities linked to the unit: are not specific to patients and generally concern the well-being of the unit itself.
- 4. Personal time.

Inspired by the Australian study "Documenting and the transfer of clinical information in two aged care settings," published in 2005, we decided not to create a specific classification for writing tasks, but rather to represent these activities in every category they exist. That is, indirect care and activities linked to the unit.

This typology gives us a general frame, but it does not detail nurses' activities in a precise-enough way. Consequently, we used Appendix 1 of the 31st of July, 2009, Decree relative to the State nursing diploma in France. This annex provides a detailed referral of nursing activities, as well as a definition of nursing work. It was a particularly useful basis through which to understand the French context. We also referred to the SIIPS (*Soins infirmiers individualisés à la personne soignée*), a set of statistical tools and evaluation methods for nursing activities.

Therefore, basing ourselves on these inventories of defined typologies, we devised the following classification:

	Table 6 Classification of direct care activities translated in ICU and LTC					
ITEM	EXAMPLE	TRANSLATION IN ICU		TRANSLATION IN LTC		
COMFORT AND WELL-BEING	Patient hygiene, nutrition	- cleaning patients with the orderly - repositioning in the bed - mobilization - massage/well-being treatment	a	- cleaning patients with the orderly - repositioning in the bed - mobilization - massage/well-being treatment		
INFORMING/EDUCATING THE PATIENT AND OTHERS	Reception, listening, information and advice	Reception and information about the service (with the reception booklet) Talking with families, post-mortem support, telephone Specific reception and support for children NB: The nurse helps families make appointments with the doctor.	b	Specific reception, first appointment with the family and the manager one week before arrival, nurses introduce themselves Arrival: the resident is immediately taken care of by a nurse who will evaluate their level of dependence during the first week Talking with families, post-mortem support		
MONITORING HEALTH STATUS	Monitoring vital functions, situations of risk (falls, suicides), difficult situations (pregnancy, end of life)	 Monitoring constants, Monitoring nutrition and syringe pumps Monitoring ventilation Fall risks Monitoring catheters, probes, drains Cutaneous state Monitoring dialysis 	С	 Blood pressure measurement Check temperature Blood-sugar levels Monitoring breathing when the patient is under aerosol Cutaneous state (with orderly) Monitoring catheters, inhalation masks, and sometimes tracheotomies 		
PREVENTIVE, DIAGNOSTIC, THERAPEUTIC CARE/ACTIVITIES	Nurse interviews, administering treatment, caring for wounds	- All clinical treatment	d	- Administering medicine - Treating wounds - Insulin		
OBSERVING AND RECORDING CLINICAL DATA (for simplicity, will be added to j)	Measuring parameters, recording data	- Very precise recording of all constants on the white sheet of paper at the foot of the patient's bed	e	- Recording parameters on Dxcare : blood pressure, temperature, blood-sugar levels		

ITEM	TEM EXAMPLE TRANSLATION IN THE ICU		TRANSLATION IN THE LTC		
Transmissions between teams	Oral and written, clinical nursing summaries	Oral transmissions at the change of shift, written transmissions on Dxcare	f	Oral transmissions at the change of shift, written transmissions on Dxcare	f
Relationship with doctors/coordinating activities	Visits, counter-visits, coordination with the lab and medical-social services	The nurse does not follow the visit, but she is at the staff meeting. She communicates with the interns all day. Lab: lots of time on phone.	g	The nurse follows the doctor during his rounds, has a notebook in which she writes issues to talk to the doctor about.	g
Telephone Activity transferred to m		A fixed-line phone at the center of the nursing station; there's almost always someone to answer it; the nurse calls often because she can't always change her clothes to leave the unit.	h	The nurse has the phone with her; it's a subject of complaints; she is often interrupted and has to call back.	h
Administrative management of patients	Recording the patients' movements, formalities of death, bed management	These formalities are completed with an orderly, who has to deal with most of this work. Ex: formalities for the deceased, bed management. Nurses take care of entry forms, but the orderly writes up the labels, etc.	i	The nurse takes care of all these elements.	i
Recording data in the patient's file and in other treatment records	Clinical and administrative data	-Writing data on the whiteboard - Dxcare - Administrative data about the patient; often taken care of by the orderly on the patient's arrival - Examination slip - Targeted transmissions	j	Everything is on Dxcare, recording data on the patient's arrival, then about the patient's state during the entire stay Examination slip	j
Monitoring and traceability of operations aiming at the quality of practices	Recording and monitoring data on the quality of practices, on the specific traceability of certain activities, detailed reporting of emergency care and of analgesics	See list	k	NA	k
Evaluating the saturation of care		NA	1	NA	1
Administrative tasks, telephone	Appointments, file research	Internal appointments for the scanner, the unit, etc.	m	Appointments with external services: takes a lot of time	m
Preparing medicine		From the electronic medicine cabinet, pre-filled by the pharmacist. The manager does inventory, sometimes have to go get the meds directly	n	Very long preparation. Have to prepare everything and put the medicine in acetabular cups. Tidying up the medicine cabinet and placing orders.	n

Table 8 Classification of the unit's organization activities in ICU and LTC					
ITEM	EXAMPLE	TRANSLATION IN THE FIELD 1		TRANSLATION IN THE FIELD 2	
Monitoring and managing materials, supplies and medical devices	Disinfecting, monitoring hygiene, placing orders, and maintenance of materials	Maintaining the emergency cart. Orderlies manage stocks, nurses fill their cart, managers fill out orders and also manage stocks. Maintenance of commonly used materials; the machines are maintained by an external service provider.	0	Ordering materials, maintaining the emergency cart, monitoring the refrigerator. There is a referral nurse for the pharmacy	О
Training and informing new personnel and interns		Managing nursing students; the manager details their planning and their attribution to a unit. New personnel: an important time, 6 weeks of training where they are coached by colleagues	p	Nursing students. A referral nurse manages their planning and their evaluation, etc., with the help of a manager.	p

Table 9 Classification of personnal time in ICU and LTC					
ITEMS	EXAMPLE	TRANSLATION IN THE ICU		TRANSLATION IN THE LTC	
Break time	Meal, smoking, phone calls	Meal, smoking, phone calls	q	Meal, smoking, phone calls	q
Personal training	NA	NA	r	NA	r
Professional monitoring and research		Professional magazines are on the nurses' counter; especially orderlies that read them when all is calm	S	NA	S

Thanks to this categorization, we were able to denote each activity with an alphabetic code, which then allowed us to calculate the time spent by each nurse for each broad category (direct care, indirect care, unit activities, and personal time). The time spent on writing work was calculated by adding up the "e", "i", "j", "k", and "m" activities in the direct, indirect and unit activities, which correspond respectively to:

- Observing and recording clinical data
- Administrative management of patients
- Recording data on the patient's file and on other treatment platforms
- Follow-up and traceability of operations aimed at the quality of care
- Administrative tasks

This first classification was readjusted as the observations went on, and in reaction to the focus groups during which we tested the validity of these categories before a panel of nurses. We presented a simplified version of the previous categorization as followed:

Α.	Observation and collection of clinical information	В.	Care and prevention, diagnosis or therapeutic activity
1.	Observation of global situation of an individual or	8.	Prevention (vaccines)
	group	9.	Diagnosis
2.	Observation of relational and social behaviour	10.	Therapeutic (medication administration, respiratory
3.	Measure of physiological parameters		therapy, stoma)
4.	Measure of autonomy or dependency	11.	Psychological
5.	Measure of pain		Pain relief
6.	Data collection about general information	13.	Emergency or crisis management
7.	Data collection of epidemiologic information		
C.	Care and comfort	D.	Coordination and organisation of care
14.	Personal hygiene	22.	
15.	Feeding	23.	Coordination of activities and examination,
16.	Output	24.	Management of patient flow (bed management,
17.	Rest and sleep		admission, discharge)
18.	Moving	25.	Documenting the patient record
19.	Awareness	26.	Tracing and reporting of quality indicators
20.	Physical and psychological pain management	27.	Updating care protocols
21.	Occupational therapy	28.	Transmission of information
		29.	Intervention in institutional meetings
E.	Information and education of the patient and	F.	Control and management of medical products and
	his family		supplies
30.	Welcoming	32.	Preparation of material and cleaning
31.	Listening, informing, educating and counselling	33.	Disinfection or sterilisation
		34.	Hygiene control
		35.	Ordering supplies, stock management
G.	Monitoring the patient's condition		
	After special exams or treatment	H.	38. Training of new grads or students
	Special conditions or potential harm to	I.	39. Research
	themselves	1.	57. 110000000
38.	Specific risk linked to cycle of life (pregnancy,		
	youth, aging)		

Table 10 Simplified and translated version of the French referential of nurses' professional activities.

As a result, the categories evolved and some activities were combined in order to create 6 larger activities, which we termed DOA. The following table gives a clear vision of these activities and how we defined them:

Name of activity	Definition of activity		
Documenting the patient record	Documentation of the first assessment, all the written entries in the record, all clinical notes, observation charts, documentation of medication, data collection of epidemiological information, organization and elaboration of the care plan.		
Coordination of activities and examinations, clinical/therapeutic interventions	Communication with the physician and other health care professionals, organization of exams, and therapeutic appointments and other scheduling communications.		
Management of patient flow	Managing the patient's admission and discharge, and making sure the proper documentation is done for these purposes.		
Transmission of information	Written or oral handover during and at the end of the shift with nurses and other healthcare workers.		
Tracing and reporting of quality indicators	Documenting data for quality reports, both internal and external quality management (documenting pain assessment, documenting hand hygiene).		
Ordering supplies and stock management	Checking supplies, and ordering stocks of pharmaceutical products and medical materials and equipment.		

Table 11 Categorization of Documentation and Organizational Activities

This categorization became an activity sheet through which it became easier to closely observe nurses' activities and to better understand their perception of administrative tasks.

2. Perception and time spent on administrative work

This section will present results from each of the three French case studies, starting with the Intensive Care Unit (2.1), then the contrasting Long Term Care Unit (2.2), and finally the Hepatology Unit (2.3). Nurses' perceptions were collected for each field, and this section highlights their variability and the ambiguities surrounding the notion of administrative work.

2.1 The Intensive Care Unit

As explained in the previous section, ICU nurses did not seem to view their administrative responsibilities negatively, since they did not feel that it was of their concern. When asked about their opinion of administrative work, they often described it as a chore or as not being part of their duties. As the following excerpt demonstrates, they considered it the business of managers and bureaucrats, rather than that of caregivers:

Do you have the feeling of doing lots of administrative work?

Mmm, not much and we kind of see it as a chore, but... Well, administrative work to me is everything related to, umm...it's complicated...for example, cataloguing a patient that has just come in, and having to send the paperwork to the management office that takes care of deposit values, things like that. Umm, it's hard to define because we do so little of it that it's just absent. (Laura, ICU nurse for 7 years).

Why do you see it as a chore?

Because for me, it's more of a manager's job, and managing is a chore! [Laughing] It's really quite separate from care, even if we have oversight where we have to enter in numbers, provide data or make transmissions, etc. That's all part of care. For me, that isn't administrative work. Administrative work to me is like having to report to someone, a lot like a school nurse that has a certain number of objectives in their mission, you see? We're more in the business of providing technical care, things like that, and the school nurse has to write a lot, and report often. But it's true that for us, administrative work is basically absent. (Chloe ICU nurse for 10 years,).

After several weeks of observation, and a number of interviews, I was able to draw up a diagram to better understand various types of administrative activities and their traceability. Through the elaboration of this analytical tool, together with the classification of nurses' administrative activities - the DOA - it became clear that certain writing activities could be more positively perceived and integrated to caregiving. Sometimes, they even helped to objectify the task of care; as long, of course, as these tasks were not expressly termed "administrative." A facet we once thought a burden emerged in a more positive light, shaking

up our initial research question and the results of the literature. This diagram was especially useful during the comparative analysis phase, where we could clearly see the importance of task delegation developed later on.

Caregiver-patient bond	Traceability	Institutional level			
Temporality of care	Traceability	Administrative temporality			
"for me, administrative work is everything on paper, everything that's traceable"					
Administrative work allows to	Medical-legal necessity +	Reporting: accounting to an external			
objectivize the care given	relationship with families	third party			
- Filling out the whiteboard, followed by noting constants: a nearly automatic habit, totally integrated to caregiving. - "through writing, I can visualize my patient's well-being, that they have normal signs, which visually reassures me" - "Caregiving takes place before, during, and after. And the after is traceability."	- Continuous renal replacement therapy - Requesting examinations and transfusions - Checking slides, drains and stomata - Testing T tube connectors - Hemodialysis - Respiratory dialysis - Written transmission - "you protect yourself according to what you do, according to what was asked, and according to the families." Strong levels of delegation Delegation to orderlies of certain tasks, linked to the admission and discharge of patients: - Admissions: they have a checklist for everything that needs to be done - The deposit of belongings. Has to be done with 2 people, one of which is generally a nurse. If it is an emergency, the nurse will simply sign the slip Designating a trustee - Checklist for the room - Discharge checklist	- Cutaneous examination (eschar: every 12 hours, renewed in the ensuing 72 hours. If eschar, note on the appropriate scale.) - Blood transfusion: date and time of the transfusion; name and identifier, beginning and end of transfusion, check if bloods are compatible (by color). The document must immediately be faxed to the EFS (French blood service), which is not always the case (necessitates monitoring from the managers). - Ranking pain. - Falls: OSIRIS, declaring and undesirable event. - Traceability: Kit Kalinox (pain relieving laughing gas) is not often used.			

Figure 3 Diagram of nurses' administrative duties derived from observation⁸

As shown by this original diagram, nurses use several paper- and computer-based reporting strategies. ICU nurses did not seem to view these administrative responsibilities as a burden. One nurse even remarked that:

We have so little administrative work to do that, um, I don't know. Anyway, it doesn't bother me. (Clara ICU nurse for 6 years)

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⁸ The original version in French can be found in Appendix 4- La version originale en français se trouve en Annexe 4.

These nurses tended to use the terms "documenting" or "reporting", to describe their administrative work, and they considered it as "part of the job".

This concept was made apparent by one ICU nurse who explained:

Care is a whole process; it's before, during and after, and the after part is the reporting. (Chloe ICU nurse for 10 years)

Other nurses described it as integral to the practice; one even declared that the documentation she has to fill out "helps to see what I have to do and how the patient is doing". They are also highly aware of the legal importance of paperwork. The old adage "if you didn't document it you didn't do it" was repeated several times by different nurses. The nurses in this unit did not feel that they were drowning in administrative work. They understood that paperwork is an obligation, that it is related to patient care, and that it is considered a necessary and helpful activity. Interestingly enough, nurses seemed to think that they did not have much administrative work to do, but, as we will see in the following sections, they did the same kind of activities as other units.

2.2 Geriatric Long-Term Care Unit

After the initial experience in intensive care, where reporting and organizational activities seemed to be integrated into caregivers' daily activities, I conducted a second study in a polar case, the Geriatric Long Term Care (LTC) (July 1st to August 6th, 2015).

Several key elements can be highlighted as a result of the various interviews and observations conducted. First, I had the opportunity to introduce myself individually to each nurse and nurse assistant during coffee breaks. Their reaction to my research subject was similar across the board: after expressing surprise, accompanied by a grin and/or a frown, they would mostly say "well you're sure going to see some useless paperwork here", "you should see all the paperwork we have!" or even "yeah, yeah, we've got a whole lot of administrative work." And after these spontaneous reactions, three of the four nurses were quick to ask: "but what do you mean by administrative work?"

I was then able to meet all the nurse assistants and HSEs during one morning coffee break. I explained that I was a student working on the administrative work of caregivers. After a short silence that seemed very long indeed, one of the orderlies looked at me and said "yeah, that's what really bugs all of us, but the ones it bothers the most are the nurses. They're the ones that do most of the administrative work." This excerpt is a good summary of how orderlies and HSEs feel, and they would explain to me later on that much of their traceability accounting is done digitally. The same sentiment was expressed during the course of the study. When paperwork was necessary during the usual flow of their duties, it was viewed as an interruption that contributed to the fragmentation of their activity. Administrative work tended to get done at the end of the day because nurses considered it to be just "one more thing to do", away from the bedside and from the patient as clearly shown by the following fieldwork extract:

It's 9 pm, Emilie is getting tired. She pulls a dirty sheet of paper with her day's notes out of her pocket. She starts completing the patients' folders. She yawns and seems to be struggling to remember some information. She looks at me and asks "do you remember if Mr. H finally took his pills tonight? I forgot to write it down". After completing all the folders and the handover she starts preparing the examination planning. She tells me "You see? This is the work of a secretary. (Fieldwork Diary, LTC, 13th of July 2014).

The observation of DOA shows that a negative association exists when nurses are responsible for paperwork that they do not consider to be a legitimate part of their duties. In LTC, the preparing of examination folders, documentation, or making appointment phone calls appears very disconnected from nurses' own perception of their legitimate work.

After the first 5 days of observation, I still had questions concerning how nurses felt about administrative work, and about their conception of it. As the days went on, I began to observe a certain routine:

Mornings are organized around preparing the cart, the first rounds of taking blood and glucose levels, then the preparing of medicine for noon and for 24 hours, interspersed with visits by the manager and the intern. The second rounds start at 10:00am with bandages, more blood-sugar testing, and the distribution of medicine with meals. Throughout it all, the nurses pull along a cart with a computer in which they note and

check off the various treatments administered. They also make targeted transmissions, according to need:

7:15pm – Sylvette begins her last rounds. I've taken the habit of helping her push one of the carts, which isn't easy to handle. She starts in the B wing. She has to make a targeted transmission and explains that she only does it when there's something to report. She writes in the data, it is added to the planning, and later she or a colleague will write up the results.

For example, she wrote the following for the woman who had an onset of pulmonary edema (PE): "data: onset of PE, congestion of respiratory tract; action: lasilix and aerosols; result: decongestion of tract, loss of liquid etc." When I asked Sylvette if this was a kind of administrative work, she frowned and answered: "well no, it's for the patient's treatment!" (Fieldwork Diary, LTC, 25th of July 2014).

With the DOA classification in mind, I decided to test nurses' representations of these activities and how they play out in their daily routine. The interviews, however, were just the opportunity I needed to know more. During these interviews, I decided to play a little game that I had elaborated along with Mathias Waelli during a focus group at another hospital in Paris (during which the DOA classification was challenged by nurses).

After asking the nurses to tell me about their average workday, I would ask them to take a pile of post-its and to write an administrative task on each one. Then, I drew up two axes, the vertical representing their appreciation of the given activity (+5 if they like it, -5 if they do not) and the horizontal representing how closely linked the task is to caring for the patient (very linked to the patient is +5, not at all linked is -5).

Here are two examples of the results obtained:

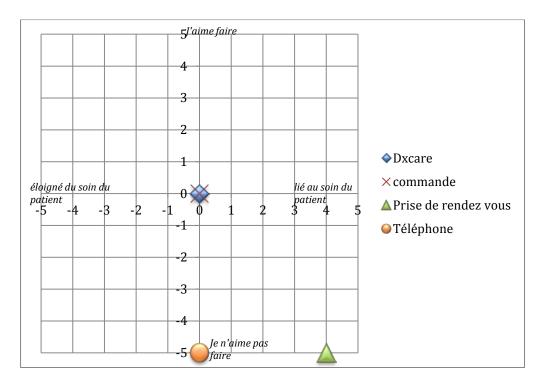


Figure 4 Diagram of the post-it game number 1

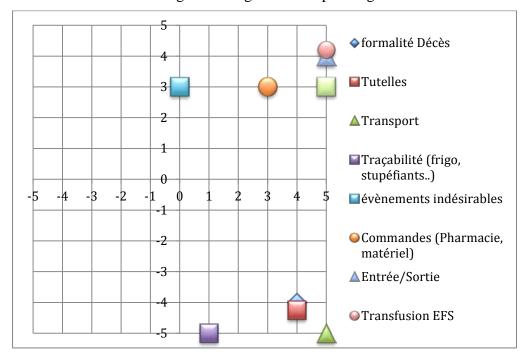


Figure 5 Diagram of the post-it game number 2

This exercise brings to light several elements. The first is that the exercise itself initially seemed to have been problematic for the nurses: they initially had "no idea" and were often unsure of themselves. Listing these activities provoked reflection about what they considered as administrative, and, as these diagrams illustrate, the list was often rather short.

The following interview excerpts are significant in that they portray the difficulty that

nurses had in elaborating a list of their administrative activities. They also illustrate the state

of general confusion around the definition of administrative work.

Nurses tended to link administrative work to writing, but also to sitting at a computer.

It is also administrative "if it takes up time." Moreover, activities such as traceability or

written transmissions are not considered administrative "since it is part of [their] job," or, as

Sylvette and Nathalie explain: "it's not really administrative because it's all necessarily linked

to caring for the patient."

Whoa, administrative, let's see... (thinking), pfff well I'm not really sure if it's

administrative, so I did the list anyways, and yeah, it's administrative but at the same

time it isn't because everything is necessarily linked to caring for the patient, and even

if it's boring someone has to do it. There's no one else, so someone has to deal with it.

(Nathalie, LTC nurse for 20 years).

It's not easy

Me: Oh yeah?

Well, I keep thinking that it's administrative work, but it's linked to care, so

everything we do is linked to the treatment we give, and that's pretty normal, it's not

really administrative.

So what is administrative work for you?

Well, it's like scribbling, umm writing, writing, writing, and well, now we barely do

any of that anymore, and we could do even less. Take for example our transmission

sheets; usually we shouldn't have any; everything is on Dxcare⁹. I don't like saying it,

but we're giving ourselves more work. When I re-wrote everything I did earlier, I

shouldn't have to do it, because I've got everything on Dxcare. If transmissions are

made, if prescriptions are filled out normally, then I have everything, but we, uhhh,

shouldn't have to write it. Just like now, I noted something in the assessment agenda,

but we usually shouldn't have to write it down because it's all in Dxcare. We could

free up some time, but that's how it is! (Sylvette, LTC nurse for 20 years);

9 Dxcare is the electronic health records used in both the LTC and ICU in France. It is the equivalent of the

EPIC system in the USA but less detailed.

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That's it. For me that's basically what administrative work is; it's not much. So, Dxcare, ummm I'd put that in the middle. It's not that I like or don't like it, it's just that it has to be done.

So that's traceability?

Yes, exactly, that's the treatment's traceability.

Why is that administrative work for you?

Why is it administrative? Well, because we're on a PC and we're sitting down, and ummm, I get the impression that I'm like a secretary or something, but at the same time it's what allows us to organize our days and to schedule treatment. (Melodie, LTC nurse for 5 years).

And yet, it is particularly interesting to find that none of the nurses placed an activity to the left of the vertical axis; that is, removed from patient care. All the administrative activities listed were indeed activities linked to treating patients. In this LTC ward, nurses would spontaneously complain about spending too much time filling in in paperwork and doing administrative tasks, but when asked about these tasks independently, each nurse would insist on the importance of each of these duties to their practice.

2.3 Hepatology

Integrating this unit was relatively easy, especially with the help of healthcare managers that had been notified of my arrival in advance. I was given the opportunity to informally present my project to the team during a coffee break. To my surprise, their reactions were extremely similar to those of the geriatric LTC unit. The nurses and orderlies in the break room mostly just raised their eyebrows, laughed, and several gave me bemused looks, saying: "well you're certainly going to have a lot to study, we really know administrative work", "you'll see all the work they make us do." The nurses then carefully detailed all their reporting duties, most of which continue to be done on paper, while pushing their carts full of patient files. Roaming the corridors and talking with the nurses, I once again

noted their difficulties in clearly defining administrative and organizational activities. They often hesitated when asked to describe their administrative duties, and after spontaneous reactions decrying the avalanche of paperwork, several nurses admitted that they "don't actually do that much of it." One nurse even said the following during an interview:

When you presented your research, I thought to myself that we had too much administrative work and papers to fill out. But I considered it, and all the paperwork we do is in the interest of care, so we can't get rid of it. (Catherine, Hepathology nurse for 15 years).

Once again, this quote is particularly revealing of the phenomenon we have already observed in other fieldwork: nurses spontaneously complain about administrative work, but once they give it some thought, they realize that all their writing tasks are in fact directly linked to patient care.

However, the analysis of group conversations during coffee breaks, as well as during interviews, revealed another particularly interesting phenomenon: this study's questions about administrative tasks gave nurses the opportunity to discuss tangible problems linked to their work and to the organization of their units. Indeed, conversations that began with administrative work quickly evolved towards other subjects, as shown by the following interview excerpts:

You know, the real problem isn't that we have administrative work to do - there has always been, and there will always be paperwork - the real problem for me is the institution's contempt. We recently had a tragedy in the unit, but no one ever comes to ask us how we feel about it. (Maryse, Hepatology nurse for 20 years).

What you need to write in your report isn't that there is a lot of paperwork, even if there is, I'm not going to say otherwise; it's that there are so many interruptions! We can't start and finish a task in the same sitting. (Virginie, Hepatology nurse for 5 years).

Administrative work is a false burden. I really don't mind writing up what I do. Actually, it's quite important. What gets on my nerves is that more jobs are cut every other month, and that 3 of us are struggling to deal with 30 patients, 6 of which are palliative. That's the real problem! (Sarah, Hepatology nurse for 2 years).

These testimonies are essential and, once again, allow us to demonstrate that administrative work is not inherently the issue. Rather, it is the accumulation of unit dysfunctions that are responsible for the burden on nurses. Administrative work only serves to crystallize deeply-held grievances and hardships linked to the unit's management and to institutional policies writ large. Our conclusions here echo those of article 1, confirming the necessity to reflect on the integration of administrative work as constitutive of the organization of caregiving.

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As we have seen, the fieldwork highlighted contrasted perceptions of Documentation and Organizational Activities and underlined several ambiguities around these activities. However, nurses do administrative work in every unit - they know that it has to be done and that it is important. This suggests that the DOA are accepted, but that they are not necessarily well integrated.

As we established in Chapter 2, the literature studying nurses' perceptions insists on the importance of time spent directly caring for patients. The decline in total time spent giving treatment can thus be considered synonymous with dissatisfaction and a loss of meaning about one's work. Given these first perception-based results, we decided to add a more objective basis to our study, in order to quantify time spent on administrative activities.

2.4 Timing the tasks

In this step of the study, I followed one nurse at a time with a stopwatch in order to measure the time taken by each task. When a new activity began, I noted the time and described the activity. Although the possibility of performing several tasks at once was included, it rarely occurred at all. Twelve nurses (four in each unit) took part in this phase. In the ICU, nurses worked 12-hour shifts. Each shift was divided into two 6-hour chunks to allow more precise data collection. The PI spent one morning (from 7.30 am to 1.30 pm) and one afternoon (1.30 pm to 7.00 pm) with each nurse. In LTC and hepatology the PI spent an

entire day with each nurse (from 6.45 am to 2.30 pm). A total of 106 hours was spent on time and motion recording of activities.

We also delved into a careful analysis of our ethnographic notes. We were able to show the exact times of each element noted thanks to the Maxqda11 qualitative analysis and note-taking software. This allowed us to chronologically and quantitatively revisit each day spent with 6 nurses (3 in ICU, 3 in LTC). Here is an example of the day spent with Mathilde, an ICU nurse:

Mathilde	Activities	Category
7:40-7:50am	Arrival, quick change	q=10min
7:50-8:02am	Transmission with colleague, pretty fast, it was a calm night, Mathilde only has 2 patients today, both stable	f=12min
		a=28min;
		d=52min;
8:02-9:50am	Help the orderly finish with cleaning and massaging a patient,	e=9min;
	clean tubes, first rounds of treatment, report on the whiteboard, fill	k=4min;
	out the skins sheet, prepare medicine, administrate medicine, refill syringe pumps	n=15min
9:50-9:58am	Smoke break, coffee, bathroom	q=8min
09:58-10:37am	Set up a dialysis, the nurse has to plug everything in, she messes up, asks for help from a colleague, she has not been trained yet	d=39min
10:37-10:41am	Pre-filling out the dialysis follow-up form	k=4min
10:41-11 :00am	Trip to the stock room for equipment missing from the cart	o=19min
11:00-11:15am	Send analysis to the lab: fill out form on the computer, print the document, walk to the tube to send it	j=15min
11:15-11:25am	Talk on the phone with a family	b=10min
11:25-11:43am	Talking with the intern and the orderly at the nursing station (about the unit's organization, the last tough emergency, talking about scanner results)	q=5min; g=13min
11:42 12:10pm		d=10min;
11:43- 12:10pm	Bandaging a patient, helping with their meal	a=8min

12:10-12:35pm	Staff meeting	g=25min
	ŭ	d=58min,
		n=12min,
12:35-2:05pm	Prepare medicine, distribute, insert catheter, treatment, report	e=11min,
	constants on the whiteboard, describe activities, write in the software	j=9min
		d=75min;
		e=8min;
2:05-4:05pm	Takes care of a an emergency, treatment of shock, intubation, insert	m=12min;
	catheter, patient stabilization, report constants on the whiteboard, schedule appointments for the scanner, several phone calls needed,	b=10min;
	the administrative file is prepared by the orderly who takes care of entries with the admissions office, talk with the family, parallel monitoring of the dialysis, helps a colleague	c=10min
4:00-4:10pm	Smoke break, she has not eaten	q=10min
•	smore steak, she has not eaten	d=34min;
		e=4min;
4:10-5:04pm	Empty dialysis bags, fill out the whiteboard, fill out the dialysis	k=6min;
	form, bandage form, verification of syringe pumps, write up the patient's history	j=10min
5:04-5:30pm		q=26min
1	Short break to eat, talk with colleagues at the nursing station	1 (0)
5:30-7:00pm		d=60min;
	Treatment, receiving the new patient's family	b=30min
7:00-7:27pm		o=12min;
	Stores the cart, cleans up, writes in the software	j=15min
	·	d=10min;
7:27-7:45pm	The following colleague is early, transmissions and the beginning of a treatment with the colleague before leaving	f=8min

Table 12 Description and timing of nursing tasks for one shift

First, timing was compared between the two polar cases. We found that similar amounts of time are spent conducting administrative activities in both the ICU (35.4%) and in LTC (33.6%), but the percentage of time spent on particular activities varies by unit (see Table 4). The time nurses spent documenting patient records in the ICU (14.1%) was almost four times that of the LTC unit (3.6%). In both units, nurses spent a sizable amount of time on the coordination of activities and examinations/investigations (8.6% in the ICU and 7.8% in LTC), but the time spent on the transmission of information in LTC was nearly twice that of the ICU (9% vs. 4.7% respectively). The same trend was observed in the ordering of supplies and stock management; nurses in LTC spend 7.8% of their administrative activities

maintaining supplies, compared to 4.1% for ICU nurses. Lastly, LTC nurses more frequently managed patient flow (2.6%) than those in the ICU (1.3%), but nurses in both units spent similar amounts of time reporting quality indicators (2.6% in the ICU vs. 2.8% in LTC).

Activity	ICU (%)	LTC (%)
1) Documenting the patient record	14.1	3.6
2) Coordination of activities and exams	8.6	7.8
3) Management of patient flow	1.3	2.6
4) Transmissions of information	4.7	9.0
5) Tracking and reporting of quality indicators	2.6	2.8
6) Ordering supplies and stock management	4.1	7.8
Total of administrative activities	35.4	33.6

Table 13 Time spent on Documentation and Organizational Activities in Intensive Care (ICU) and Long Term Care Units (LTC).

With these tools in mind, the timing of tasks in Hepatology was smoother and the results in comparison with the two previous cases appeared to be very interesting. Indeed, DOA activities account for 38% of work time in the hepatology unit, which is slightly longer than intensive and long-term care (35.4% and 33.6%, respectively). This first result is extremely important, since it highlights the comparability and transferability of time spent on administrative activities from one ward to another, regardless of its specialization.

If we study each activity in detail, we can draw a number of interesting comparisons. First, there is a strong similarity with the ICU in terms of activity #1, "Documenting the patient record": accounting for 12.6% of time in hepatology, and 14.6% in the ICU - the highest percentage task in both cases. This result comes as no surprise, given the specializations of each unit. It would have been rather remarkable for hepatology nurses to spend more time documenting than the ICU. In terms of activity #2, "Coordination of activities and exams," the hepatology unit stands between the other two, with 6.6% of time spent on it. This finding is interesting, since it confirms the importance of coordination in nursing work that we had previously highlighted in article 2. With 8.5%, activity #4 ("Transmission of information") takes on a similar importance to the LTC unit, where 9% of

time was dedicated to it. The reporting of quality indicators (activity #5) takes slightly more time in hepatology than it does in the other units, with 3.1% of work time, as compared to 2.6% in the ICU and 2.8% in LTC. Finally, hepatology nurses seem to spend much less time managing supplies (activity #6) than their counterparts in the other two units. However, the detailed content analysis of each activity demonstrates that this result is somewhat biased, since the unit's organization requires that each nurse spend one afternoon per month dealing with this task.

Activity	ICU (%)	LTC (%)	Hep(%)
1) Documenting the patient record	14.1	3.6	12.6
2) Coordination of activities and exams	8.6	7.8	6.6
3) Management of patient flow	1.3	2.6	5.4
4) Transmission of information	4.7	9.0	8.5
5) Tracing and reporting of quality indicators	2.6	2.8	3.1
6) Ordering supplies and stock management	4.1	7.8	1.8
Total of administrative activities	35.4	33.6	38.0

Table 14 Time spent on Documenting and Organizational Activities in the three wards

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The timing of tasks has allowed a certain objectivization of nursing work, and the ability to contribute additional analytical elements. The hypothesis according to which time spent on these tasks is not solely the problem, but rather that it is the meaning attached to these activities that is at issue, has been validated by our timing of tasks. Indeed, the time dedicated to this work is similar from one ward to another. As a result, it is necessary to investigate the elements that explain this variability of meaning. The ethnographic data collected has provided for the elaboration of a precise analysis of each activity, as well as allowing for the comparison of different work realities linked to each task.

These first results help confirm **the first flexible hypothesis**, established during our literature review:

The problem is not necessarily about time spent doing DOA. Rather, it is about the way these activities are integrated into given work situations.

3. Behind each activity, many different realities.

In this section we will analyze each of the six DOA by comparing them in throughout the three units (3.1). We will then present these results in the form of a comparative summary table (3.2).

3.1 Analyzing the content of each activity

- Documenting the patient record

Documenting patient records in the ICU consists of very meticulous reporting of the patient's clinical condition: reporting vital signs every 4 hours, documenting medication administration, collecting special epidemiological information, and following up on the care plan. As such, nurses tend to focus on care and documentation sequentially, in a connected fashion. It is a major activity as it takes up 14.1 % of the time. Documentation is mostly done via Electronic Health Records (EHR), although some vitals are reported on a sheet of paper by the bedside. In this case, EHR is supporting care, as a young nurse explains:

I think the informatics system is easy to use and I like that it helps me get a big picture of how my patient is doing; when I see the numbers on my screen I feel secure. (Coralie, ICU nurse for 1 year)

In LTC, the nurse must take care of 40 patients by herself and document the activities elsewhere, away from the bedside. Clinical documentation is brief and takes only 3.6 % of

the time; it includes basic vitals (blood pressure, glucose level) but needs to be repeated 40 times. So while walking from one room to another the nurse rapidly documents on the EHR in the hallway because she has "better things to do". Care plans also need to be updated and are a source of frustration when the patient's status remains unchanged over months or even years. As one nurse explained, the informatics system doesn't always support her work:

I don't mind the informatics system, we have to be modern, you know, but there is so much redundant information that it drives me crazy. Look at me: I'm walking and typing at the same time, and I report the same things every day. I don't think the people who created this software were nurses! (Melodie LTC nurse for 5 years,)

In Hepatology, the reporting of constants and filling out patient records are also the administrative activities most directly linked to patient care. They take up 12.6 % of the time, almost as much as in the ICU. As in other units, these duties are rather well accepted by nurses. However, different strategies are developed to fill out paperwork on time. Indeed, some nurses will update care plans and attentively consult patient records before beginning their rounds. Others bring along a cart containing patient files, reading the records as they go from patient to patient. This kind of adaptation demonstrates that activity #1 allows a certain amount of leeway in organizing care, and provides support for practice, as shown in the following examples:

Laura. It is 6:35 am, Laura and I are both early. She has already begun transmissions with the night shift. She orally reviews the current situation with a colleague and notes everything on a sheet of paper. I settle down next to her while she checks the paper file. She shows me different recorded information. There are printouts about the patient, their hospital record, a prescription slip, and a sheet detailing the administration plan (printed by the afternoon nurse, and valid from 2:00pm to 2:00pm the next day). There are also other papers detailing scheduled examinations, as well as the patient's constants, and finally the transmissions on yellow paper.

6:40 to 6:47am: transmission with a colleague. Laura then verifies the records of each patient. There are 9 this morning, so she has 9 binders in her cart. She takes the time to read and check each one. She goes very quickly, and sometimes stops to read or reread certain items. Her sheet consists of a table filled out in many different colors;

here, the 4-color pen remains the standard tool of the nursing trade. The atmosphere is rather quiet, and the night shift has gone home. Laura will continue to focus on the records until 7:45 am. She tells me that it is an essential step in beginning her day.

Clara. I am early again. I can still hear the sounds of a helicopter and police sirens after the Charlie Hebdo attacks. As I arrive in the treatment room, I notice only one nurse. She works the night shift, and tells me that no one has arrived yet. I wait while she puts her cart away, her colleagues slowly arriving one by one. Clara, the nurse I am following today, looks sleepy indeed. It's her last day in the unit before leaving for another establishment near Arcueil. Transmissions begin with an account of the night's events. The "160kg patient" called her daughter who "barged in at 5:00 am," saying that she wanted to wash her mother herself. One of the nurses is wound up. They talk a bit, the transmissions go quite rapidly, and the girls quickly get to their files.

7:05 am. The night shift leaves and Clara goes over each record one by one. She reviews prescriptions and prepares her table for the morning. 7:25 am: she finishes and prepares her cart. She explains that, unlike Laura, she does not do everything before starting her rounds. That is, she checks the information in the record, but she doesn't prepare examination records right now since it "gets on her nerves." She prefers preparing them as she tends to the patients. She finds it "annoying to deal with all the paperwork at the same time, so [she] spreads it out."

These two examples clearly show the capacity for nurses appropriating administrative work by managing it in their own way. Thus, reporting work acts as a support to care, in much the same way as in the ICU.

We can observe that, in all three wards, this nursing activity could never be delegated to other professionals. It is an important duty that reflects nursing work, as the "proof" that things have been well done. Sometimes it also acts as a kind of assistance – a writing task that helps objectify the clinical act.

- Coordination of activities and exams

In the two first units it takes approximately the same time (8.6% in ICU and 7.8% in LTC). At first glance, the content of this activity is similar. The nurses participate in coordinating care

through communication with the physician and other health care professionals, by organizing exams and therapeutic appointments. They have a special role to play in scheduling patient appointments. In both units, the nurses communicate with the physician during rounds.

The first notable difference is the proximity with physicians. In the ICU, residents are constantly entering the patient room and have very direct interactions with the nurses, while in LTC the physicians are busy and have many patients to care for. So in LTC, communicating to coordinate care requires a lot of effort, the nurses need to write detailed notes to be read by the physician (it is a different task than the care plan or nurse's assessment found in the Electronic Health Record), or call them.

Also, scheduling appointments has different meanings in both units. In the ICU, most appointments are scheduled within the hospital and the process is streamlined by the informatics system, as Chloe explains:

The physician prescribed a thoracic scan, so you see I just click here, print the document, call the scan and schedule the appointment for later this afternoon and stick the document in front of the door for the transportation team. (Chloe, ICU nurse for 10 years).

In LTC, most of the appointments are scheduled outside the hospital or in other parts of the hospital accessible by ambulance. For instance, it is very common that a patient needs to see a dentist for dentures, which requires at least 3 separate appointments. Elderly patients also often need to visit an ophthalmologist or an ENT specialist. These appointments are usually scheduled in private practice. So the nurses need to coordinate with private practices and family members who have to agree on the special care and drive the patient to their appointment. The nurses have to make sure that the patient or the family can afford the care. As described by the situation faced by Emilie, this can be a very complicated task:

It is 9 am, Emilie has just hung up the phone; she is furious. For the third time, Ms. T's family has cancelled the appointment with the podiatrist. Ms. T's feet need to be taken care of and the nurse is worried. She calls back the podiatrist's office to cancel and ask for availabilities. Then, she calls back the family with the new availabilities; none of them fit. She hangs up and looks desperate. She is trying to find a solution. She calls

the daughter again to ask if she can organize transportation for Ms. T, so that none of the family needs to come. The daughter agrees. Emilie pulls up the list of ambulance companies and starts with the first number... after 6 rejections, one ambulance is set for an appointment in two weeks. Emilie is relieved and calls the practice to set the appointment. (....) It is 2:30 pm, Emilie is about to leave. She answers the phone on her way out: Ms. T's daughter has decided that she doesn't want her mother to go alone to the appointment. She wants to cancel the transportation and reschedule it for another time.

We clearly see that the importance of scheduling appointments is different in both units and that the efforts necessary to go through the process are very complicated in LTC.

In hepatology, coordinating activities and exams is absolutely essential and takes approximately the same amount of time as in the two other units (7.8 %). It is often done in the morning. The hepatology ward is linked to the endoscopy unit, which is located in the hospital's basement. Patients in hepatology are often sent down for liver biopsies. They leave early in the morning and come back before noon, after which they must stay lying down all day. As of arriving, the nurse must coordinate exams, which often concern at least 3 of her 10 patients. Coordination consists in ensuring that the patient's file is up to date and that it is in the hospital porters' stretcher, as well as teaming up with the orderlies to make sure the patient has showered with betadine disinfectant, and to make sure that the patient is up to date with the morning's care and treatments before being sent down. The nurse also takes blood samples from other patients, which must be sent to the lab before 10:00 am. This activity seems rather simple, but our observations have shown that nurses are constantly interrupted and plagued with difficulties in anticipating events, which can lead to tension and stress. The following example aptly illustrates the kind of complexity that can emanate from exam preparation.

Aline has three patients going into examinations this morning. The first, an elderly woman, is disoriented. Upon arriving in the room, Aline notices that the woman's dentures are balled up in an old and used handkerchief. She tells us that she must absolutely find a box to store her dentures; otherwise the cleaning team might throw away her handkerchief. This has happened several times, and the hospital has had to reimburse the lost dentures, which are very costly. Aline heads to the reserves to find a little box and

a label. On the way there, she is interrupted by an orderly who tells her that Mrs. J, who doesn't speak French, does not want to take her betadine shower. Aline stops by and asks the woman what the problem is, making large gestures to try and get a conversation going. She is irked and realizes that she will have to call the woman's daughter, who speaks a bit of French. She heads to the treatment room to retrieve the patient's contact sheet. It is 7:10 am; she laughs and looks at me, "isn't it a little early to call?" Anyways, the patient should already have been prepped, and if she hasn't taken the shower, then she will not have an exam this morning. Aline writes up a note and cancels the exam on the computer. She also calls the porter to cancel the scheduled transportation. Aline takes a deep breath and focuses. Right, Mrs. F also has an exam. Upon arriving in the room, Aline finds the patient huddled up and shaking. Aline sits down at the edge of the bed and asks what's wrong; the patient wants to smoke. Aline explains that it isn't possible, since she has an exam coming up, but that Aline will get her a nicotine patch afterwards. The patient cries, she's really in a bad way and insists that she doesn't like patches. Aline promises to get her an inhaler. The patient wants the inhaler before the exam. Aline immediately heads to the stock room and miraculously finds an inhaler. Mrs. F calms down and accepts to go with the porter. Aline fills out the patient's file and gives it to the porter. She then begins her rounds of taking blood samples. There are 7 to take and send. She fills out an examination file each time, and notes the sending of the sample in the patient's record. She makes an error and starts over again. She is on edge. Aline looks at me wide-eyed, "damn, I forgot a sheet in Mrs. F's file. The doctor down there is going to kill me. I could do without all these forms; they get on my nerves and stress me out for no reason." She is interrupted again at 8:00 am by the daughter of Mrs. J who has just arrived after receiving a text message from her mother. She doesn't understand why her mother did not go into her examination this morning. The daughter is making a fuss and getting angry... It is almost 9:00 am and Aline still has not begun her rounds. (...) It is noon: Aline remembers that she never got the box for Mrs. F's dentures. Luckily, they're still on the table.

This description of a typical workday is a particularly good illustration of the ancillary difficulties that distract from the seemingly simple organization of an exam. The nurse is responsible for prepping the patient before the exam, and for ensuring that the latter leaves on the stretcher, accompanied by all the necessary information from their file. This apparently straightforward task is often made more complex by a series of little details that scatter the nurse's work. Juggling several cases at once and having to take into account the specificities

of each patient contributes additional stress, without even taking into account the fact that time is always of the essence. This example shows that Aline makes errors, like forgetting to include a file from the patient's record. The result is complaining about "paperwork," even though it is her work context itself that is responsible for this arduous coordination.

-Management of patient flow

Nurses manage patient admission and discharge, ensuring that the proper documentation has been filled.

In the ICU, admissions paperwork primarily serves accounting purposes. Nurses do not value this type of paperwork and consider that they can easily delegate it to Nurses Assistants in order to concentrate on the patient's condition. This young nurse's testimony highlights it clearly:

I am so happy that our assistant agreed to help us with admissions paperwork, because I really have better things to do when someone is admitted with septic shock. (Paul ICU nurse for 7 years)

The figures have shown that it takes slightly more time to manage the entrance and departure of patient in LTC (2.6%) than in ICU (1.6%). Interestingly enough, we found in the field that part of the ICU's activity sometimes shifts to orderlies. For instance, when the patient arrives, most of the time in a critical and emergency situation, the orderly takes care of admission documents. They also enumerate belongings and start to fill in documentation. All these tasks fall under the nurses' responsibility, but they are happy to delegate it, especially as it is work considered distant from nurses' own role.

Consequently, nurses' assistants tend to take on tasks that would not necessarily be their responsibility in another unit, as the following example demonstrates:

Since it is a new admission, the orderly takes care of the paperwork. Guy finds the labels in the program, prints them out, and fills out the ward's transfer documentation.

They already have almost all of the necessary information, since it is a patient transfer (file with primary contact, list of belongings, etc.). Guy tells me that this ward has more paperwork than elsewhere, and gives me an example of how he took care of the death notice for a young man that died during the previous night.

These administrative activities do not seem to bother the orderlies. On the contrary, these duties allow them to extend their spectrum of responsibilities and to feel valued, especially as concerns doctors:

Nicole enters the patient into the computer during the admissions process. With a big smile on her face, she tells the intern, "alright, he's in there," and the intern answers "thanks, that's great." Nicole, still grinning at her computer, tells me that "normally, in the other wards, everything I do here is done by the nurses. But I like doing it. In fact, I love it."

In LTC, the meaning associated with admission and discharge is fundamental. First, before an admission, family members come to visit the unit and schedule the patient's arrival. During this visit, the nurse is very attentive to all the patient's needs and starts to prepare the entrance folder. Then, the day of admission is very important; the nurse wants to make sure that both the family and the patient are reassured. So she spends a great amount of time speaking with the family and the patient and, at the same time, uses these discussions as an opportunity to evaluate the patient's level of dependency. After this, she can start writing the care plan, making sure to communicate all the important information to the physician.

Even though we have a lot of paperwork to fill in when someone enter, I like to do it because it's an important step for the rest of the patient's journey with us. (Nathalie, LTC nurse for 20 years).

In hepatology, this task is the responsibility of both nurses and medical secretaries and takes 5.4 % of nursing time. The latter take care of preparing the patients' bracelets and the sticker labels with the patient's barcode, for quick identification. Secretaries also take care of greeting the patients upon their arrival, and help them with the administrative steps related to discharge, transfers, or follow-up appointments. This tandem functions well and secretaries have an intense job to do. After having spent one morning in their company, I noted that they

did not have a single minute of downtime. However, medical secretaries are only present during standard business hours. This implies that nurses must know how to work the software to make new entries and to print out bar codes, without which no examination is possible. The absence of secretaries during morning, night and weekend shifts is sorely felt by nurses, who get the impression of being given too much additional administrative burden, as Brigitte tells us:

The most stressful situation I've ever had was when we received a patient in critical condition, and I had to enter them into the program and print out the codes. And of course, I messed up because I don't know how to use the program right. Then there's no ink in the printer...it's always like that. It's at these times that I curse all the paperwork, because, shit, there's a patient that needs me to look after him, but I can't do it without these damn barcodes! (Brigitte, Hepatology nurse for 12 years).

- Transmission of information

The transmission of information consists of oral and written handover. In both units, written handover is an important task and nurses understand its importance. But, once again, the meaning associated with the transmission of information is different. In the ICU, where it represents 4.74% of the time every day, it is very organized. All day long, the nurse writes down information and composes a synthesis at the shift's end. She uses this information to provide a good oral handover to her colleague; this handover is done one-by-one with the nurse taking over her patient. ICU nurses consider this as an important professional step during the day, since it is a synthesis of their day's activities to the colleagues following them, as Laura explains:

It is part of my job to do good transmissions of information, and, to be honest, some days I am very proud to tell my night-shift colleagues about what I did. But don't tell them that! (Coralie, ICU nurse for 1 year).

In LTC, the same activities represent twice as much time as in the ICU (9%). At first glance, this appears related to the ward's number of patients. Of course, it takes more time to transmit information about 40 patients than it does for 10. But what our observations show is the

importance of the nurse's role as team leader during handover. Indeed, each time a shift starts the entirety of both teams meet. The nurse's task is to animate discussion, listen to everybody's opinion, and take notes to synthesize particular questions, concerns or positive feedback. Orderlies are particularly talkative during these discussions, since they are those who bathe the patient and feed them, and so can testify to their evolution. Nurses need to be attentive to their feedback as well as that of other health care workers in order to transmit information to the physician. They have a coordinating role in organizing patient care.

In Hepatology, the transmission of information between outgoing and incoming nurses is done in person and takes almost as much time as in LTC: 8.5%. These transmissions are particularly important, and we find the same dynamism here as in the ICU: each nurse goes over the state of each patient, and what she has done during her shift. This exchange generally happens rather quickly. More significant difficulties are felt when communicating with physicians. Residents are divided into several groups, each linked to their specialty. As such, they make the rounds in their ward, but their group of patients is not the same as the nurses'. Thus, nurses find themselves having to adapt to the physicians' schedules, and having to interrupt their work in order to transmit information to residents. This results in having to communicate with three different doctors, which means three interruptions in one morning. As compared with the other two units studied, the divide between nurses and physicians here is more clearly palpable:

A physician enters the room, says hello, and continues on his way. The physician has a badge with "clinical associate" written on it, and I ask Laura what that means. She tells me, "I don't know and I'm not really interested in the medical hierarchy. I don't need it to know how to do my job."

Communicating with physicians is a source of tension, often made tangible by prescription problems, as this nurse explains:

Brigitte is shouting! "Can you believe this! Here Lucie, report it, report it!! He prescribed 11 tablets of a very powerful analgesic; the normal dose is 1 tablet. I'm sick of these prescription errors, they just do whatever, they don't know how to use the programs, and they don't even re-read what they write. This could have had serious consequences!"

- Tracking and reporting quality indicators

This activity accounts for the same amount of time in the two first units (2.4% in ICU and 2.8% in LTC). But once again, their activities are slightly different. In the ICU, the reporting of quality indicators is directly linked to patient care. As patients frequently receive blood transfusions, pain medication or dialysis, nurses have extra paperwork. They sometimes complain about the redundancy of this reporting, but all agree on its importance, especially for blood transfusions. In LTC, they also report on pain assessment but mostly report quality and safety indicators that are unit-related. They count and report the number of narcotic medicines, the temperature of the fridge or the control of the emergency cart. This reporting also exists in the ICU but is delegated to the nurse manager.

This is yet another form of delegation – however, the managers are the recipients this time around. ICU nurses do not understand how this work could be their responsibility, as the following extract shows:

Well thank God I don't have to assess the ward's quality control. That's all I'd need right now! That's the managers' job. And, I mean, it's not all that complicated anymore, since we have the electronic narcotic medicines cabinet, for example. (Laura, ICU nurse for 7 years).

Just as in the ICU, Hepatology nurses report information directly linked to patient care, such as measuring pain or the Braden scale. This takes 3.1% of the time, slightly more than in the two other units. Nurses also participate in working committees (such as a committee for hand hygiene). This reporting takes place under supervision of the unit managers. Once again, when I brought up the question of reporting quality indicators, the nurses mentioned the same ancillary issue: it is yet another pretext to discuss the problems that really are affecting them, as these notes taken during a coffee break attest:

The nurse tells me that "anyways, we're always putting the cart before the horse; we create indicators and track them for no reason, and with no tools to do so." He explains that they recently had problems with a resident that asked to administer a certain drug via IV. The nurse said that this was not standard procedure, and the doctor answered that, of course, it was standard, and that's how he wanted it, and not any other way. One of the

nurses refused, saying that he did not approve. The doctor requested to proceed. The drug was administered via IV, and three days later, the patient had internal hemorrhaging. A review of mortality and morbidity (RMM) was initiated, and a declaration of undesirable events was issued, concluding that nurses were obligated to refuse such a treatment, and that it is their job to verify what is administered to a patient. The nurses are now wondering whether they have to check the work of every resident. (Unit nursing manager)

Ordering supplies and stock management

This activity is interesting in terms of its differences in content and meaning. In the ICU, nurses spend 4.1% of their time taking care of refilling their cart, cleaning utilities in the patient room, and making sure they have proper medical supplies. There is a nursing cart in each room and they fill it with the supplies prepared by the orderlies in the hallway. They take care of the materials they need every day and mostly spend time preparing medical equipment like the dialysis machine. The orderlies and nurse managers handle the global stock.

In LTC, nurses spend a lot of time on this activity (7.8%) since they are responsible for the entire stock management and they have to order supplies themselves using special software. When supplies arrive, they have to stock and tidy them in the storage room. This activity takes a lot of time and is a source of frustration, as Louise explains:

I spend so much time managing the supplies. Every Wednesday I have to send an order and, you know what, it's all-administrative and you don't need to be a nurse to order syringes or paper towels. But the manager considers that we're the one who know what we need. (Louise LTC nurse for 2 years).

As mentioned in the timing of tasks, hepatology nurses must spend a given amount of time managing stocks and placing orders. Once a month, nurses must dedicate an entire afternoon to this task, sometimes with the assistance of a manager. This is why the proportion of time spent on this task is only 1.8%. This responsibility is largely seen as a positive thing, since nurses appreciate having the opportunity to take their time managing their supplies, even if many believe that someone else could do it in their stead.

3.2 Synthesis

A synthesis of the detailed content analysis for each DOA is presented in Table 11. It clearly shows that the same activity category involved different tasks in each unit. Thus, while the purpose of the activity was the same, the work involved in achieving it was different. The precise content analysis of each administrative activity reveals real differences in the importance and meaning associated with these activities. Interestingly, in the ICU, we notice that time-consuming administrative activities are meaningful to the nurses, as they directly participate in organizing care. Patient documentation is particularly worthwhile in the ICU because its patients need to be closely monitored. The activities that require broader skills, like the management of patient flow, easily shift to other health care professionals and give nurses the opportunity to concentrate on direct care. LTC is very different; nursing activities are broad and go far beyond direct patient care. Their role as coordinator and team leader is essential. Resultantly, we observed that similar activity categories masked different realities. When it comes to coordinating exams, the role of the LTC nurse is essential, since she alone must coordinate physicians, families and patients. She also has a responsibility in the transmission of information: most of the time, physicians are not physically in the unit, so she is the de facto leader of the whole health care team. But these activities are sometimes considered a burden because they are not considered as part of the traditional representation of the nursing profession: to be at the bedside, directly caring for patients using clinical skills.

This third case study is situated at the intersection of the two previous investigations, whether by the unit's activities, the patient ratio, or by the results obtained. Indeed, the "classical" care service that is hepatology is extremely interesting, since it confirms previous conclusions and proves that the time spent on administrative tasks is about the same in all units, regardless of specialization. Moreover, this unit brings forth a particular impression that I have had since the onset of this research: that administrative work is not the problem in and of itself. Rather, it acts as a sort of scapegoat for various organizational problems. Nurses spontaneously react with complaints, since they identify themselves by their caregiving, whereas administrative tasks carry the connotation of unseemly work that is not representative of their profession.

Furthermore, the close observation and comparison of each activity demonstrates that DOA are simultaneously comprised of several documenting tasks (more simply termed "reporting" in France). These include filling out the patient's record, the tracking of quality

indicators, as well as more organizational tasks such as the coordination of care plans with different in-house or external hospital units, or with different healthcare professionals.

Activity	Content of Activity in HEP	Content of Activity in ICU	Content of Activity in LTC
Documenting the patient record	Paper documentation, various checklists, the nurse uses colors to have a better overview of the information reported. They carry the folder around and fill in after each care. Once a shift they fill in a very quick care plan. Puick reporting, connected to care	documenting medication administration, the collecting of special epidemiological	to be updated and is a source of frustration when the patient is in the same state over
Coordination of activities and exams	This activity is complicated; the nurse has to fill in various papers and is responsible for the folder that transportation will carry to the examination room. Many times, the folder is not available when needed or comes back with missing paperwork, the nurse is interrupted during care to make sure the patient is leaving with the proper documentation. The nurse also coordinates with the secretaries for exams outside the hospital.	Communication for coordination is facilitated by proximity to other healthcare workers, especially physicians. Most of the appointments are scheduled within the hospital and the processes are streamlined by the informatics system.	
	→ Paperwork creates complexities and interruptions	→ Ease of communication: Streamlined informatics process within the hospital	→ Complex and time-consuming process to communicate outside the hospital
Management of patient flow	The nurse works hand-in-hand with secretaries: the problem is that the office is open only on business hours. At night, early morning, on evenings and weekends, nurses need to print bar codes for patient identification and create entries in the computer. It is frustrating, especially when the patient is in bad shape. Administrative burden, keeps nurses away from care	Part of this activity sometimes shifts to the orderlies. For instance, when the patient arrives, most of the time in a critical and emergency situation, the orderly takes care of admissions documentation. All these tasks fall under the nurses' responsibility, but they are happy to delegate it. Delegation of tasks and streamlined process	Admissions are a key moment where nurses take the time to welcome the patient and evaluate their level of dependency.
Transmission of information	Transmissions between nurses are done one-on- one and a summary is written on paper. The difficulty is in transmitting to the medical team:	All day long, the nurse writes down information, and a synthesis is made at the end of the shift. She uses this information to give	time as in the ICU. At first, we can relate it

	physicians are from 3 different teams, and they	an oral handover to her colleague; the handover	observations show the importance of the
	come at different times to ask for information	is done one-on-one with the nurse taking over	nurses' role as team leader during handover.
	about their patient.	the patient.	The nurse's role is to animate discussions,
	·		listen to everybody's opinion, and take notes
			to synthesize particular questions, concerns
	→ Interruptions by medical team	→ One-on-one transmission	or positive feedback.
	2 menupations by medical team		→ Team leadership
Tracking and reporting	Nurses fill in quality indicators (QI) linked to the	The reporting of quality indicators is directly	Mostly report unit-related quality and safety
quality indicators	patient, such as pain assessments and the	linked to patient care. As patients frequently	indicators. They count and report the
	Braden scale. They are also part of committees	receive blood transfusions, pain medication, or	number of narcotic medicines, the
	(hand hygiene) and work hand-in-hand with	dialysis, nurses have extra paperwork. The	temperature of the fridge, and the contents
	their manager to report QI.	manager does unit-related reporting.	and usage of the emergency cart.
	→ Clinical and unit-related documentation	→ Clinical documentation	→ Unit- related documentation
Ordering supplies and stock	The nurse manager takes care of ordering	Taking care of the materials they need every	They are responsible for the entire
management	supplies, but nurses are responsible for cleaning	day, and mostly spending time preparing	management of stock and they have to order
	and tidying up the storage room. Once a week,	medical equipment like the dialysis machine.	supplies themselves using special software.
	one nurse is freed of patients to do so.	The orderly and nurse manager handle global	
	→ Specific times dedicated to the management	stock.	stock and tidy them in the storage room.
	of nursing supplies	→ Managing personal materials	→ Managing the unit supply stock

Table 15 Comparative content analysis of the 6 Documentation and Organizational Activities in Intensive Care and Long Term Care

The creation of DOA categories and the close study of each task's content has allowed us to confirm our **second flexible hypothesis**, which we elaborated from the background of this study:

On one hand, nurses' administrative tasks are constituted by reporting duties linked to tracking and accountability requirements, and on the other by more organizational activities originating from the increasing intensity and complexity of care.

Conclusion of Chapter 4

In the first unit (ICU), we observed how DOA were largely integrated to technical care, and that they even contributed to supporting and objectivizing care itself. In this configuration, nurses do not perceive administrative work as a burden, but rather see it as the manager's responsibility. One may conclude that this notion of administrative work is correlated to a negative activity linked to the obligations imposed by the health care institutions, but which, according to ICU nurses, is seen as of little to no concern. Yet, a close observation of their work and the timing of tasks indeed demonstrate that they do these tasks. This first result thus beckons us to take into account the complexity and many forms of administrative work but also the forms of delegation of some DOA to other health care workers, notably orderlies.

The ensuing comparison with the second case, a long-term geriatric ward, was particularly instructive and provided for the emergence of yet more contradictions. The nurses spontaneously complained about spending too much time doing paperwork. Yet, when asked to describe the nature of these tasks more precisely, they clearly endeavored to demonstrate the value and importance of this work for the patient.

A similar perception of DOA was found in the third case studied: hepatology. Nurses initially and spontaneously complained of the "paperwork" they had to do. However, this subject quickly took a back seat, serving instead as a pretext for evoking deeper organizational issues. In this sense, administrative work refers to institutions and hospital management, but not to

the core of the profession. Here, it seems to catalyze a certain number of other problems. Just as in long-term care, nurses spontaneously lamented the time spent on indirect care activities. Yet, when asked about these duties in detail, they recognized that administrative work was not itself a problem.

Thus, the very idea of a possible administrative or bureaucratic role is negative in all three wards. Either because nurses consider that it is the managers' responsibility and that the administrative tasks they actually do are linked to care and, as such, are useful; or as a catalyst for other time-consuming organizational issues that interrupt and fragment their work.

This finding having been established, the time and motion study revealed that the time spent on DOA is similar from one ward to another, despite varying ambiguities.

Consequently, we arrived at a first conclusion: the problem may not be the nature of administrative work, nor even the time spent on it, since all nurses recognize its importance. Rather, the issue concerns the integration that these tasks take within the context of care.

This illustrates our initial intuition or flexible hypothesis n°1.

In addition, a refined observation of the content of nurses' administrative activities allowed us to:

- Understand the ambiguities and contradictions linked to nurses' varying perceptions. The DOA are found in each ward, but each time with varying degrees of value, importance, and prestige. Uncovering these ambiguities proves the necessity of understanding nursing work in its context. It is important to remind oneself that reporting information may act as an opportunity for a nurse to reflect on the best care for the patient and to formalize it in writing, whereas in another unit it will only be seen as yet more cumbersome paperwork.
- Identify different forms of delegation to other professionals. In this sense, the example of ICU work was particularly interesting: we observed a rather informal process of delegating administrative patient-flow tasks to orderlies. Although this work is often denigrated by nurses, orderlies seem quite glad to do it.

- Grasp the variety of administrative activities that consist of reporting/documenting linked to tracking and accountability requirements, but also to more organizational tasks. This result illustrates our initial intuition, the flexible hypothesis n°2.
- Comprehend the facilitating potential of computerization.

All of these elements allow us to better understand the ways in which administrative tasks are integrated (or not) to care.

*

Thes results presented in this chapter resulted in the publication of an article as follows:

Michel, L., Waelli, M., Allen, D., Minvielle, E. (2017) The content and meaning of administrative work: a qualitative study of nursing practices. *Journal of Advanced Nursing*, doi: 10.1111/jan.13294. (Appendix 2).

Chapter 5 Delegation, contradiction and integration of DOA in France and in the USA

In the previous chapter we compared the differences between the perceptions and realities of daily activity in the three French cases. Our findings resulted in the creation of a categorization of administrative activities called Documentation and Organizational Activities (DOA). Results from this first part of the study showed several ambiguities surrounding administrative work, but also revealed the veracity of our two initial intuitions: that the issue may not be the time spent on administrative, but rather the meaning associated with these activities and their integration to care; and that administrative work is composed of both documenting and organizational activities.

This chapter proposes to push further through a cross-national analysis, and to test DOA classification in another national context of care. As we have seen in the first part of the thesis, very few studies led a cross-national comparison of nursing work. The comparison emerged from a large survey using a conceptual frame derived from Aiken, Sochalski and Lake's publication (1997). In our study, cross-national results had the particularity of drawing upon practices observed during nurses' daily routines, and followed trends in new sociology of medicine literature that point to a need for a better description of nursing activities, and a redefinition of the nursing mandate to include organizing work (Allen, 2014).

Following the same method of analysis used for comparing the three French cases, we will first present nurses' perception of their administrative activities and the content of each DOA in the three American cases (1). Then, we will compare all six cases and we will present the factors influencing DOA's integration into practice and what we can learn from the crossnational comparison (2).

1. Three American wards: similar organization, same perception

This section will present nurses' perceptions of their administrative activities in the three American wards (1.1) and will detail the content of their activities (DOA) (1.2).

1.1 Nurses' perception of documentation: "I don't like it but I get it"

The first relevant finding in the American unit was the homogeneity of nurses' DOA. Only three nurses out of 27 shadowed and interviewed considered having to documentation and organizational activities as a "burden". All three were senior nurses and their complaints were linked to difficulties in adapting to the computer system.

For the others, the administrative workload seems light indeed, as Allison, a Geriatrics staff nurse, explains:

As a staff nurse, you don't really do anything administrative. (Allison, Geriatric nurse for 5 years)

So, between the Medical Intensive Care Unit (MICU), the geriatrics unit, and the oncology unit, the idea of administrative activities seems very disconnected from nurses' conception of their work. According to all of them, they do not do any administrative work, as one geriatrics nurse explains:

As a staff nurse, you don't really do anything administrative. Unfortunately, you are sometimes so task-oriented that it is difficult to see the overall big picture, because you're just running from task to task to make sure it's complete. (Lee, MICU nurse for 2 years).

They associate this notion to other health care workers and to a different scale of patient management. To them it is about the idea that the administrative is a "bigger picture sort of thing," and is linked to "upper management." In all three units, nurses had similar answers:

I'm a CN2, so I think it's when you become CN3 and 4, and take a leadership role that you do administrative work. (Cheryl, geriatrics nurse for 7 years)

I would say that I have more administrative work only as a charge nurse. I have more hands-on skills to do as a bedside nurse. (John, MICU nurse for 2 years)

The charge nurse, the CN4, they do the administrative work, thankfully. (Kim, oncology nurse for 5 years)

As these excerpts demonstrate, administrative roles are linked to the function of charge nurses, or assistant managers (Clinical Nurse 3 or 4 also call CN3, CN4: see chapter 1), and of the unit's nurse manager.

Nurses feel like anything administrative does not apply to them, and is linked to other professionals. As we can see, the organization of care supports this feeling, as charge nurses and CN3 or 4 take over what nurses consider as administrative tasks.

Since the concept of administrative work seemed so far removed from nurses' concerns, we decided to inquire about their opinions and usage of EHR. Interestingly enough, data collection was the same, and seemed to take as much time, in each unit. In the MICU, the nurse collects the same amount of information, but more frequently. For instance, the general assessment is every 4 hours in the MICU, while it is once a shift in other units. Also, since the patient is connected to a monitor, their vital signs are directly reported in the software. We observed the same use of EHR in each unit. This observation was confirmed when interviewing float nurses, who have experience in almost all of the hospital's units:

Me: Do you see charting differences according to unit?

No, it's all the same. The only difference is the number of patients. In some units, you take more time documenting - places where you have six patients take longer to chart because you have six patients. In oncology, you get three to four patients, which take a lot less time to chart. (Debora, float nurse for 2 years, working now in geriatrics for the week)

So, as this nurse suggests, the only difference that can be found in the perception of documentation is the number of patients. The three units studied did indeed have different numbers of patients;

- MICU: nurses take care of 1 or 2 patients at a time

- Oncology: no more than 3 or 4 patients

- Geriatrics: nurses usually have 5 patients, sometimes 6

Despite the variability of patient numbers, nurses in all three units had the same feelings about computer charting. They all acknowledged that it is time-consuming and sometimes takes one away from patient care, but they also explained that they understood the importance of proper documentation.

It's certainly not a burden. To me, nursing documentation is important. If anything happens to the patient, they want to know what the patient was doing when it happened. (Kelly, geriatric nurse for 1 year)

It just keeps everybody accountable, you know? So it's important. (Jenny, Geriatric nurse for 3 years.)

Sometimes I feel it's too much. I do feel like it's a painful step, but I also understand why. They need to make sure it's being done. (Khar, MICU nurse for 3 years)

I try not to get super involved with my charting. Obviously, it's important for documentation purposes. (Michele, Oncology nurse for 10 years).

The idea of accountability is important for the nurses, and they repeatedly referred to hospital policy and to upper level management. The idea is that if "they" (up in the hierarchy) say that it is important, then it needs to be done regardless of whether it is time-consuming or redundant. The only complaint about charting concerns the redundancy and uselessness of some information. But even though they sometimes complain about the charting, nurses continue to acknowledge its importance. In a way, they seem rather resigned to charting.

I do feel like it's cumbersome sometimes; it brings me down. Sometimes, I feel like I could do more with my patients if I didn't have to do so much, but I understand that it is how it is. (Janine, geriatric nurse for 8 years).

I think when I first wanted to go into nursing - I think we all have the image of Florence Nightingale and bedside nursing and not charting - I wanted it to be more hands-on than charting, that's for sure. But I have to do it, so I do it. (Paula, geriatric nurse for 2 years)

I enjoy spending time with the patient. I don't enjoy the documentation. But I don't take it as a burden. I do wish I had more patient time, but you know it's like that. (Juliana, Oncology nurse for 5 years).

Um, things like rest and sleep are promoted while you are in the room. You're always going to promote what the patient needs at that time. I don't get why we chart these things every two hours during our rounds, and I just don't think it is helpful for the patient's outcome that we have to chart these things. It's the same staff every two hours. But it won't change, whether I like it or not. (Michele, Oncology nurse for 10 years).

To further investigate these perceptions, we inquired into nurses' knowledge about why they need to document and who uses the information. The nurses explain that they have to document for two main reasons. The first, as we have already seen, is liability: the necessity to protect their professional license.

I also think about protecting myself. But I don't think about it when I'm documenting the assessments and stuff, but when I'm documenting notes! I cover myself when I write NOTES! (Cheryl, geriatrics nurse for 7 years)

We do it in case the family wants to take legal action. (Marius, MICU nurse for 2 years)

I have the patient in mind when I document, and my pride as a nurse. I want to keep my license. (Paula, geriatric nurse for 2 years)

More surprisingly, nurses expressed feeling pressured by upper management when they perform audits of their practice.

I would say it is there, and if something happens down the line, they have access to it. (Tom, MICU nurse for 4 years).

I don't know much, but I know that the people up there, they look at our charts. The quality people are looking at that. (Kelly, geriatric nurse for 1 year)

Charting is necessary, umm for instance when you are charting their position. For instance, for patients who have a higher probability of skin breakdown you can say that we did all we could do, that we did the work. We get audited, you know! (Curtis, MICU nurse for 2 years).

When asked about who uses the information and for what purpose, their knowledge is limited:

I think the doctor uses it - if the patient falls, for instance ...(Paula, geriatric nurse for 2 years)

My first year, I had these thing in mind. But now it's just so automatic to chart that I just do it. You don't think about that anymore, and I don't really know what they do with the information. (Marius, MICU nurse for 2 years)

I think the CN4, the assistant manager, they all do auditing to make sure we do our job. Are we doing everything we can to prevent urinary tract infection? You have to have some sort of record of what happened. So I think there is some sort of record with the aggregated information and if it's needed in the future they'll use it. (Elena, oncology nurse for 5 years).

There is probably something about billing, but for the rest, umm...maybe also liability? (Khar, MICU nurse for 3 years)

Umm who uses the information, that's a good question. I would say everybody: the manager, the doctors, and the pharmacy. Everybody, right? (Kim, oncology nurse for 5 years)

It is very interesting to observe that the nurses have such little understanding of why they document everything they do. According to them, it is to protect their license, but also because they are asked to do so by upper management. They don't especially question the information's use. Their knowledge about who uses collected data seems to be limited to the audit the manager conducts and to its use by other professionals, such as physicians.

Finally, all the interviewed nurses agreed that the implementation of the new EHR system gave them the impression of having more reporting to do than before. For nurses with several years' experience, this can be explained by the fact that the computer system is more detailed, but also because patients are sicker than before, with multiple and more serious conditions. Bill, an oncology nurse with more than 15 years of experience, explains:

Now we only have 4 patients. They reduced the ratio because of patient acuity. It's higher than 10 years ago, and since it's higher and more complex, the documentation is longer and more detailed. Makes sense, doesn't it? (Bill oncology nurse for 15 years).

1.2 Administrative activities combined in one tool

In the previous step of the French study, we defined nurses' administrative activities. We found a set of six administrative tasks linked to that definition: the documentation and organizational activities (DOA). These six tasks were also observed in the three American hospital units, but all of them use the Electronic Health Record. Regardless of the perceptions of administrative activities, five DOA could be found in all three units:

- Documenting the patient record,
- Coordination of activities and examinations/investigations,
- Management of patient flow,
- Transmission of information,
- Tracking and reporting quality indicators

The only activity that could not be found in the American nurses' activities, but that was found in France was the ordering of stocks and supply management. As we can see, all the activities except one are concentrated in a single piece of software: the EHR. This makes it difficult to differentiate activities. Nurses themselves do not differentiate; according to them, they are simply charting or documenting. Consequently, charting is one same activity, even if it involves different tasks considered as administrative in our previous study.

To better understand what falls under the EHR, we precisely reviewed all the tabs nurses need to fill in during our observations. As the nurses have said many times during their interviews: "we chart everything we do." Indeed, all care provided has to be documented in the EHR. During in-patient hospitalization, the nurse is responsible for documenting the following tabs:

- Care Plans
- Doc Flow Sheets (intake, output, vital signs)
- Progress Notes
- Shift Assessment Navigator
- Medication Administration Record
- Nursing Admission Navigator
- Nursing Transfer and Arrival Navigators
- Nursing Discharge Navigator

This summary of nurses' main documentation is an important element, as it allows to understand the main components of the EHR and thus to follow what nurses were entering in the computer, and what they were referring to when evoking documentation. It is important to understand that all these tabs are linked and that, for instance, the discharge preparation activities are documented not only in the nursing discharge navigator but also in the care plan, the doc flow sheets, notes, and patient education. It is therefore difficult to dissociate the different charting periods. When a nurse charts in one of these tabs, she charts for different purposes. Some interventions will be documented in notes, but will also appear in doc flow sheets or medication administration record. Therefore, for the purpose of clarity, I linked each EHR tab to a DOA, all while keeping in mind that one tab can be used for different purposes.

Documenting the patient record

The patient record consists of a very detailed documentation system. The nurse is responsible for one head-to-toe assessment per shift, one assessment every odd hour (nurses' assistants (NA) do the even hours), patient education, care plans, progress notes, flow sheets (intake, output), vitals are done by NAs, medication administration records.

The "care plan & education" tab is based on the everyday patient assessment; it is individualized and is updated every day by the nurse. In each section of the care plan, the nurse explains the patient's evolution towards care plan goals. She can usually choose between:

- Progressing: Patient is showing improvement in meeting goals.
- Not Progressing: Patient is not showing improvement in meeting goals.
- Adequate for Discharge: Patient is progressing toward goals and post discharge needs have been addressed.
- Complete: Patient has met the goal.

The nurse also has to write a full progress note at the end of her shift summarizing patient progress. Before discharge, she needs to close all the tabs and make sure that each subcategory is "adequate for discharge" or "complete".

The "patient education records" section is fairly new and is also very detailed. The nurse needs to document that she has educated the patient or a significant other about ongoing treatment, disease process, use of medication, medical equipment, potential drug-food interactions, rehabilitative needs, availability of community resources and access for further treatment, infection control, and safety, etc. The list is long. For each category she can choose between:

- Verbalized Understanding
- Demonstrates Understanding
- Needs Reinforcement
- No Evidence of Learning

As for the care plan, the nurse needs to close all the tabs at the moment of discharge,

acknowledging that the education has been completed.

The "MAR - Medication Administration Report" section allows the nurse to follow up on medication procedures and to use the bar code each time she administers medicine.

In the "Patient Assessment and Nursing Process Documentation" section, the nurse is responsible for the head-to-toe assessment. This assessment is performed upon admission and at least once per shift. It includes the following:

- Cognitive/Perceptual/Neuro
- HEENT
- Cardiac
- Peripheral Neurovascular
- Respiratory
- Gastrointestinal
- Genitourinary
- Musculoskeletal
- Skin
- The Braden Assessment is documented on admission and daily on day shift.
- Safety
- Safety Interventions (as appropriate)
- Falls
- Elopement
- Coping Observed Emotional State and Plan of Care
- Confusion Assessment Method (CAM)
- Sepsis Screen

Additional patient responses are documented in the Patient Care Summary, as clinically indicated:

- 1. Sleep/Rest/Relaxation
- 2. Nutrition Diet/Feeding Tolerance

Physical assessment parameters that are within defined limits as defined by Clinical Practice Model (CPM) content are documented as "WDL" in the Patient Care Summary. "WDL" indicates that all aspects of that particular body system meet the WDL validated criteria and are understood as normal findings.

This head-to-toe assessment has to be done once per shift, but the nurse must also assess the patient every two hours.

Nurses document vitals, intake, and output in the "document flow sheets".

- Coordination of activities and exams

The procedure for coordinating activities and exams is streamlined and simple. It is directly linked to physicians' orders. When an exam is prescribed, the nurse is automatically notified via the informatics system, and she can easily send the order to the designated unit (radiology, phlebotomy etc.).

- Management of patient flow

Nurses can easily manage the patient flow through the navigator's admission and discharge tabs, but this is mainly the work of the unit coordinator and the charge nurse. However, the nurse is responsible for filling in three types of tabs in the EHR: Nursing Admission Navigator, Nursing Transfer and Arrival Navigator, and Nursing Discharge Navigator.

The admissions department first enters informational data such as name, address, age, admitting diagnosis, physician, etc. into the computer system. Then the patient is attributed a nurse who will proceed to enter the full admission in the EHR.

The nurse enters information in the "Admission Navigator" section.

After reviewing the lab collection and the patient's order status, she charts the patient's overview, care profile, and the assessment, as follows:

- "Overview": for each category, the RN verifies information with the patient and enters appropriate updates:
 - Patient Belongings the RN documents bedside belongings

- Allergies
- PTA Medications
- Immunization Report
- Vaccine Screen
- History (medical, surgical, and substance and sexuality history)
- Scanned Advance Directives

- "Patient Care Profile":

- General Information (where the patient arrived from, significant relationships, tobacco use etc.)
- Alcohol Screen
- Discharge Planning: in this section, the RN starts preparing for future discharge with the reasons for admission, expected length of hospitalization, anticipated discharge disposition, who they live with, living arrangements, home, accessibility, and transportation availability.
- Nutrition Screen (diet prior to admission, preferences, appetite)
- Functional Status Section
- Pain History.
- Abuse Screen (has the patient been threatened or abused emotionally or sexually by a partner or spouse ?)
- Suicide/Homicide Risk
- Values/Beliefs/Spirtual Care
- Patient Profile Doc Flow Sheet
- "Discharge": the nurse needs to complete the discharge navigator flow sheet no later than eight hours after the patient's discharge from the hospital. The pharmacist is responsible for patient education on food/drug interactions. The nurse will provide a printed version of the drug prescription and some aspects of patient education; this document is extracted from EPIC and is completed by all the healthcare providers involved (physicians, PTs). The nurse usually highlights important information, and asks the patient to sign and notify that they have clearly understood the document.

- Transmission of information

The entire EHR is used to transmit information. Each healthcare worker knows where to find needed information in the software and can read progress notes to their colleagues. The RN also does one-to-one handovers. The information filled provided by nurses the EHR is read by all the concerned care providers; it is a key element of information. The nurses' handover is done one-to-one and the nurses provide quick updates during physicians' rounds.

- Tracking and reporting quality indicators

This activity is diluted into the information collected in the EHR and nurses do not make distinctions between QI information and clinical documentation.

- Ordering supplies and stock management

This activity is absolutely not the responsibility of nurses. Special hospital teams take care of filling up all storage rooms, and orderlies make sure patient rooms are fully equipped with nursing supplies. This DOA is completely delegated.

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Particularly interesting is the perception American nurses have of DOA especially in terms of its homogeneity, regardless of unit. Their testimony sheds light on a method of work organization based on the distribution of activities between different professionals, giving nurses the impression that someone along the line must only be doing administrative work. And yet, nurses are responsible for reporting a considerable amount of information in digital patient records, as well as providing close and real-time monitoring. We can observe that they have all but accepted this work. They do not consider these tasks a burden, and although they do not particularly like them, they do these activities because they are important. The same kind of ambiguity manifests itself in France, wherein nurses have little consideration for the work itself, yet they recognize its importance. This American homogeneity may also be explained in part by the fact that computerized systems are highly streamlined. We do not find the variability of use and comprehension of DOA between wards as in France. This result is extremely interesting and calls into question the extent to which computerization blurs organizational variations between different specialties.

Moreover, in the United States, the content analysis of each activity also demonstrates how administrative tasks comprise reporting as well as more organizational duties. We find each DOA in American wards, even if some of these tasks are delegated to other professionals, as is the case in the French ICU. Here, the Franco-American comparison provides for the generalization of one of our flexible hypotheses elaborated at the project's onset.

2. Administrative activities in six wards: from time-consumption to integration

In this section we will present the results from the comparison of nurses' perceptions and of the content of each DOA across the six cases. First, we will quickly establish the differences and similarities between nurses' perceptions of administrative work (3.1). Then we will present a detailed content analysis of each DOA in the six wards, distinguishing two types of wards: those where administrative work is perceived as time-consuming and burdensome, and those where it is in not a problem and where it is integrated to practice (3.2). Finally, we will present several contextual factors influencing the integration of DOA into the wards that we identified from this comparison (3.3).

2.1 Two main levels of perception

We have previously seen that administrative work was not perceived the same way in all six units. A strong divergence of opinion was found between French units. As we highlighted in Chapter 4, French LTC and Hepatology nurses spontaneously complained about administrative "stuff" or "things" as time-consuming. They did not refer to a particular activity, but to all indirect activities that take time away from direct patient care. We have seen the ambiguity of these activities that sometimes had a catalyzing role in bringing out deeper, mostly organizational, issues. On the other hand, in the three American units and in the French ICU, administrative work did not seem to be such a bother; either because it is understood as integral to care, or because it is seen as the purview of other professionals.

While feelings in France are mixed about the burdensome nature of administrative activities, the American nurses in all three units seemed to have integrated them as part of their daily routine.

2.2 Synthesis of the content for each DOA

In Chapter 4 and in Section 2 of this chapter, we have precisely depicted and analyzed each DOA. The difference in content, use and integration of each activity is presented in table 4.

One particular example highlights the way in which we compared each task: the "coordination of activities and examinations." In the French LTC and Hepatology units, this activity requires a lot of effort, since nurses are responsible for scheduling appointments inside and outside the hospital. During observation, several situations, such as Claire's, described the nurses struggling to find paperwork, to get in touch with families, and to coordinate with various healthcare workers.

It is 8 p.m., Claire's patient was supposed to be transferred to another hospital two hours ago. Claire is furious, and one of her hands is shaking. She can't find Mr. H's folder and she is desperately calling different departments to find it. (...) 3 hours later, an orderly from the radiology department brings the folder. It had been forgotten there two days earlier during Mr. H's CT scan.

In the French ICU and the three American units, communication for coordination is eased and streamlined by the informatics system. Most of the appointments automatically appear on the screen when they are prescribed, and nurses simply need to put out an exam order.

The deep analysis of each activity revealed that there are different realities hidden behind the same activity; these realities are clearly linked to the organizational context and the daily routine of each unit. Differences found between units and between countries led to cross comparisons of these elements. Interestingly enough, the DOA account for the same content and use in all three American units.

A deep analysis of nurses' perceptions and of the content of each activity allows us to draw on several explanations for the integration of DOA or, on the contrary, of the burden linked to a misintegration of these activities.

	U	Unit where Administrative work is perceived as time-consuming		Unit where Administrative work is perceived as integrated to		
		and burdensome		practice		
Documenting the Patient Record	LTC	The nurse must take care of 40 patients by herself and documents the activity elsewhere. The clinical documentation is brief; it includes basic vitals (tension, blood pressure, glucose level) but needs to be repeated 40 times. The care plan also needs to be updated and is a source of frustration when the patient is in the same state over months or even years. → Repetitive activity Paper documentation, various checklists, the nurse uses colors to have a	an ICU		It consists of a very meticulous reporting of clinical condition, with the reporting of vital signs every 4 hours, documenting medication administration, the collecting of special epidemiologic information and following up on the care plan. Documentation is mostly done on the Electronic Health Record even though some vitals are reported on a sheet of paper by the bedside. Meticulous activity directly connected to care Very detailed documentation, one head-to-toe assessment per shift,	
	Hepatology	better overview of information reported. They carry the folder around and fill in after each care. Once a shift they fill in a very quick care plan. Pulck reporting, connected to care	3 America	3 American units	one assessment every odd hour (nurses' assistants (NA) do the even hours), patient education, care plans, progress notes, flow sheet (intake, output), vitals are done by NA, medication administration records. > Very detailed and constraining documentation	
f activities and	LTC	Communicating to coordinate care requires a lot of effort; nurses need to write detailed notes in a notebook read by the physician. Most of the appointments are scheduled outside the hospital and necessitate a coordination of private practices, ambulances and the patients' families. This activity can get very hectic and is an important source of stress and confusion for the nurse. Complex and time-consuming process to communicate outside the hospital	ICU		Communication for coordination is facilitated by proximity to other healthcare workers, especially physicians. Most of the appointments are scheduled within the hospital and processes are streamlined by the informatics system. Bease of communication: Streamlined informatics process within the hospital	
Coordination of activities and exams	Hepatology	This activity is complicated: the nurse has to fill in various papers and is responsible for the folder that transportation will carry to the examination room. Often, the folder is not available when needed or comes back with missing papers. The nurse is interrupted during care to make sure the patient is leaving with proper documentation. The nurse also coordinates with secretaries for exams outside the hospital. Paperwork creates complexity and interruptions	3 American	units	When an exam is prescribed, the nurse is automatically notified via the informatics system and she can easily send the order to the designated unit (radiology, phlebotomy, etc.) → Very easy and streamlined process	

Management of patient flow	LTC	Admissions are a key moment where nurses take the time to welcome the patient and evaluate their level of dependency. "Even though we have a lot of paperwork to fill in when someone enters, I like to do it because it's an important step for the rest of the patient's journey with us."(Nurse in LTC since 20 years, interview n°3) → Key moment of care The nurse works hand-in-hand with secretaries: the problem is that the	n ICU	Part of this activity sometimes shifts to nursing assistants. For instance, when the patient arrives, most of the time in a critical and emergency situation, the nursing assistant takes care of the admission documentation → Task delegation and streamlined process The unit coordinator and charge nurse manage patient flow. The
Managemen	Hepatology	office is open only on business hours. At night, early in the morning, on evenings and weekends, nurses need to print bar codes for patient identification and to create entries in the computer. It is frustrating, especially when the patient is in bad shape. Administrative burdens keep nurses away from care	3 American units	nurses fill in three types of tabs in the EHR: Nursing Admission Navigator, Nursing Transfer and Arrival Navigator, and Nursing Discharge Navigator Very detailed information included in the EHR
Transmission of information	TLC	Important role of the nurse during handover meetings: animates discussions, listens to everybody's opinion, and takes notes to synthesize particular questions, concerns or positive feedback. →Team leadership	ΩΟΙ	All day long, the nurse writes down information and creates a synthesis at the end of the shift. She uses this information to give a good oral handover to her colleague; handover is done one-on-one with the nurse taking over the patient. Basy one-on-one transmission
	Hepatology	Transmissions between nurses are done one-on-one and a summary is done on paper. The difficulty is the transmission with the medical team: physicians are from 3 different teams, and they come at different times to ask for information about their patient. Interruptions by medical teams	3 American units	The information nurses fill out in the EHR is read by all concerned care providers; it is a key element of information transmission. The nurses' handover is done one-on-one and nurses give a quick update during physicians' rounds. → Facilitated by EHR
Tracking and reporting of quality indicators	LTC	Mostly report unit-related quality and safety indicators. They count and report the number of narcotic medicines, the temperature of the fridge, or the contents and use of the emergency cart. Dunit-related documentation	ICU	The reporting of quality indicators is directly linked to patient care. As patients frequently receive blood transfusions, pain medication, or dialysis, nurses have extra paperwork to do. The manager takes care of unit-related reporting. Clinical documentation
	Hepatology	The nurses fill in quality indicators (QI) linked to the patient, such as the pain assessment and the Braden scale. They are also part of committees (hand hygiene) and work hand-in-hand with their manager for the reporting of QI. → Clinical and unit-related documentation	3 American units	This activity is diluted into the information collected in the EHR and nurses do not distinguish between QI information and clinical documentation. → Clinical documentation

Ordering supplies and stock	LTC	They are responsible for the entire management of stock and they have to order supplies themselves using special software. When they receive the supplies, they have to stock and tidy them in the storage room. Managing the unit's supply stock	ICU	They take care of the materials they need every day and mostly spend time on preparing medical equipment, such as the dialysis machine. The nursing assistant and the nurse manager handle global stock. → Managing personal materials
	Hepatolog	The nurse manager takes care of ordering supplies, but nurses are responsible for cleaning and tidying up the storage room. Once a week, one nurse is freed of patients to do so. → Specific time dedicated to the management of nursing supplies	3 American	This activity is absolutely not the responsibility of nurses. A special hospital team takes care of filling up all the storage rooms, and NAs makes sure that patient rooms are fully equipped with nursing supplies. Completely delegated

Table 16 Comparative content analysis of the 6 Documentation and Organizational Activities in the 6 cases

3. Factors explaining nurses' ambiguities towards administrative tasks and of misintegration into nursing practice

The precise observation of nurses' activities in each unit shows that the same DOA found in France can also be found in the USA, except one. A deep analysis of nurses' perceptions and of each activity's content allows us to draw on several topics explaining the ambiguities surrounding these perceptions and the integration of DOA or, on the contrary, the burden linked to the misintegration of these activities.

3.1 Delegation of administrative tasks

- From nurses to nurses' assistants

The observation of nursing work has provided the opportunity to more closely study the activities of agents working alongside nurses. As we have seen in the French ICU (Chapter 4), and especially in American wards, a certain number of administrative and organizational activities are sometimes the object of delegation. This division of labor is even more notable in the United States. As Chapter 1 explains, there are many varied professions and functions in this field, especially in large hospitals. These functions ease nurses' burdens with respect to clinical and especially to administrative tasks.

In this manner, I was able to observe the fundamental role of assistant secretaries in each unit: Karl is the assistant secretary this week. We sat down and I asked him to explain his job. Here is a list of his duties:

He answers the phone and the call bells from patients' rooms. Each time a patient needs something, he answers. According to the need, he either takes care of the problem himself or transfers the call to a nurse or orderly. He does administrative admission and discharge informatics reporting. When the patient goes out for an exam or a break, he enters this information into the computer so that everyone knows the patient is absent. This is also a juridical process in terms of unit responsibility.

He orders refills for supplies like gloves, yellow scrubs, etc. However, medical supplies are refilled every day by a specialized team when the tags are yellow (the nurse flips the tag over from white to yellow each time she takes one of the last supplies in the storage room).

He coordinates appointments scheduled with medical specialists. He also works hand-in-hand with a clerk as his assistant.

In France, a certain number of these responsibilities are carried out by the medical secretary. These duties consist of welcoming patients and informing them of the various administrative steps to take; of building the patient's administrative and medical file; of taking care of the medical unit's typing work; of scheduling patient appointments with medical specialists (radiology, scanner, etc.); of patient follow-up; of medical record indexing and archival; of informing the medical team during group meetings of the patient's administrative situation; and of communicating general administrative information to the medical team.

However, in most French wards, the medical secretary works directly with and for the physician, and their office is often outside the unit. Consequently, they tend to provide less support to nurses and orderlies than in the United States. In the USA, physicians also have secretaries. In this respect, the three American administrative professionals (clerk, assistant secretary, and medical secretary) are concentrated into just one post in France (the medical secretary) and performed by paramedics (nurses and orderlies) themselves. As a result, tasks such as telephone communication, answering patient calls in their rooms, filling out admissions and discharge forms, printing patient labels, and ordering missing materials, become the responsibility of nurses and orderlies. It is interesting to note that in the French ICU, orderlies absorb nearly every kind of task. It is the French unit with the least amount of administrative burden.

This lack of delegation to other dedicated professionals seems to increase the burden in both French LTC and Hepatology. In Hepatology, patient admission or discharge outside business hours can be problematic. The following testimony highlights the frustration nurses can experience:

"One day I got scared. I was admitting a patient. He wasn't feeling well at all - last stage of Hepatitis. It was at the end of my shift, the secretaries were gone, and I had to admit him on the computer and print the patient tag. The printer was broken. I had to

go upstairs; my patient was on his own. It took me 20 minutes to print the labels and when I got back the night shift colleague who just got here was sending him to the step-down unit - he was crashing. I felt so bad; so, so bad that day. I wanted to cry looking at the stupid bar code I had in my hands." (Interview with Fatima, Hepatology)

Interestingly enough, one of the 6 DOA, supply management, was not found in the American Units, and only minimally so in the French ICU. This activity can be very time-consuming. In French LTC, the nurses spend huge amounts of time counting supplies and ordering new ones. They have to connect to special software and order supplies from a catalogue, as shown in this description:

"It's 4 p.m. and Emilie is still in the unit. Her shift was supposed to finish at 2:45 pm, and today is Bastille Day. I am wondering why she is still here. I ask her what is keeping her so busy. She shows me a long list on a sheet of paper. She is meticulously ordering each of the nursing supplies they need using a computer program. She explains that she prefers to do it now than during the shift because she feels bad ordering supplies when the patients need her." (Fieldwork diary, LTC)

Both the French LTC and Hepatology managers explained that, according to them, nurses know best what they need. That is the reason why they do not delegate its management to other workers. Interestingly enough, in the American Units, this activity is completely externalized to non-nursing staff. A special unit runs through the hospital every day and adds new supplies where they are needed. Then the Nurses Assistants make sure that supplies are equally distributed to each room. As a result, this activity is not really a nurse's concern, as one remarks:

The supplies? Uuhhh, why would I do that? That's not my job! (Kim, oncology nurse for 5 years)

- From managers to nurses

The comparison of several cases across two countries has shown that in the American units, regardless of specialty, administrative work was not considered the work of frontline nurses. This finding led us to analyze the organization surrounding staff nurses in both countries, in order to understand the way in which DOA are institutionalized by hospitals and by the nursing profession.

Interestingly enough, significant differences were found between French and American units. In the USA, several nurses are specially hired to take care of many administrative activities. While only one manager is responsible for administrative activities in France, there are three in the US.

In chapter 1 we explained the differences of the training of nurses but also the variability of professionals working next to them. These differences were highlighted in the field, where two types of professionals exist in the USA that are not found in the three French units.

First, the charge nurse is a staff nurse that is manages certain administrative aspects of the unit for a day. During this shift, the charge nurse is patient-free (or, when the unit is understaffed, she takes care of only one patient).

The following description of Mary's duties, in charge of Geriatrics for the day, highlights this function:

Mary is the charge nurse today. She is looking at tonight's schedule: only one nurse's assistant (NA) is working tonight. As a charge nurse, her role is to find another one. She sends a common text to the NA's list. She attributes patients to each nurse and NA according to their acuity. She also checks the emergency cart and prepares the bed meeting sheet (she sometimes goes herself if needed, but usually it is the manager's job). At 1 p.m. she meets with the physician team and checks with them what to do for each patient, and then she will do transmissions with the nurses. The afternoon is very busy with discharges.

She explains that she helps nurses out when they are in need and that she takes care of all the administrative needs related to the unit's function and to the patients.

The same duties in France are performed by the nurse manager or the staff nurse. For instance, the French nurse manager will be in charge of finding staff in case of understaffing issues or of illness. In all three French units, the staff nurse is responsible for reporting on the emergency cart.

Second, as we have seen in Chapter 1, the clinical ladder allows nurses to advance their career by becoming clinical nurse 3 or 4. Interestingly enough, in the hospital we studied, CN3 or 4 usually work half-time at the bedside and half-time as assistant manager. Here is a description of the position by Jenny, CN4 of the Geriatric and General Medicine Unit:

So I do two 7-hour shifts where I do administrative work. So I do chart audits, staff schedules, the weekly update, (employees' birthdays, policy changes, all the updates in one email so they don't receive several different messages).

I also go to meetings, so the leadership meeting every Wednesday with our director,

Our director gets direct updates from the head physician and from the chief nursing officer. He shares the information that he feels is applicable to us during the leadership meeting. There is also the quality award for skin and urinary infection, for instance. Whoever has the least infections gets kudos for that, and gets an award.

We also talk about our evaluation system (peer evaluation, one college evaluates me, then my manager evaluates me and I evaluate myself and then it goes into the system and the manager has the final say and score). We also talk about magnet, and there is also the employee satisfaction survey (it's every 2 years, the press Ganey is for patient satisfaction). We also talk about what kind of education we need for our staff.

Once a month I go to the NPI meeting, Nursing Process Improvement. I also go to the skin committee meeting (once a month). We talk about how many pressure ulcers the hospital has had as a whole; what do we do to prevent these ulcers from happening; should we do a new audit; do we have new products we want to use; and I think that's it. (Jenny, clinical nurse 4 – assistant manager in geriatrics for 2 years, a nurse for 6 years).

They are also called Assistant Nurse Managers. They usually work half time at the bedside as a staff nurse and half-time as an assistant manager. In France, both nurses and their managers take care of these CN3/CN4 responsibilities.

The CN4's job description shows how nurses have implemented a role within their profession to institutionalize quality improvement. This professional has an administrative role and leads staff nurses through the process of improvement. She is responsible for auditing other nurses' proper use of documentation. What is interesting is that these professionals are doing administrative work staying in the ward; their office is in the middle of the unit, so they are in direct interaction with the nurses, and they can react to possible mistakes, as shown in this description:

Lea has been a nurse for four years, and she is already a CN4. She does two 12-hour shifts per week with patients, and two "more administrative" 8-hour shifts, as she explains. She helps with planning, she interviews new nurses, and she corrects EPIC mistakes. So, for instance, she receives a note saying that someone miswrote the glucose measures on EPIC. Since she has more time on her hands, she searches for the mistakes in the program. She says: "I'm doing a little inquiring." She goes back to the patient and searches through the program to find the mistake. When she finds it she writes it down and sends it through the tube to an administrator who will change the error. She can't change it herself, since that would be back charting. (Fielwork diary, 28^{th} of May 2015).

Thus, it is extremely interesting to note that, in the United States, three professionals (the manager, manager's assistant (CN3 and CN4), and nurse) will work together, where only two professionals (nurse and nurse manager) will do so in France. Additionally, this institutionalization of nursing activities reveals yet another form of task delegation: that from managers to nurses. It appears here that taking charge of the manager's administrative work may act as a form of career advancement for the American nurse, who becomes more qualified through this exercise. In this case, administrative tasks take on a rather positive connotation.

3.2 Task fragmentation and task interruption

The content analysis revealed how task interruption was a source of frustration and was related to the negative perception of administrative activities. In many of the participant's minds, administrative activities were those that interrupted care. As one Hepatology nurse remarked:

I'm the first to complain about administrative work, but now that you ask what it is, I realize that for me administrative work is everything that interrupts me while I have to do direct care. For instance, if you interrupt me to see a patient, that's not administrative. But it you interrupt me to go search for a folder, that's totally administrative, because it's annoying!! (Catherine, Hepatology nurse for 15 years)

Some DOA, such as the transmission of information, are not integrated in several units because the organization of care does not support such an activity. When Hepatology nurses need to transmit information to three different physicians at three different times, it becomes an interruption more than an improvement. One nurse explains:

I like being able to make individual transmissions to physicians, but the problem is that I work with three physicians that have three different specialties, and each one comes around when I'm busy with care. So I have to interrupt everything for them when they're available. It cuts into my rounds, and then I forget what it is I had planned to do. That's why I always have a list in my pocket. It often happens that I start writing a note and I get interrupted. I have to close the binder for confidentiality reasons, and then I forget about it. Then, in the evening, I open it back up and forget what I wanted to write...laughter...There should be an hour dedicated to just transmissions, or we should work with a single physician. It's complicated because we aren't assigned patients according to pathology, but according to room number. (Maryse, Hepatology nurse for 20 years).

This interview extract demonstrates the kinds of interruptions that are absolutely necessary; transmissions are very important, but they are not organized in the most optimal way. Sentences and words hang half-forgotten in the air until such time as the nurse can return to

the records, sometimes many hours later. These situations are very frequent in the long-term geriatric ward, as the following example demonstrates:

It is 3:20 pm. Nathalie is reaching a boiling point but she is still smiling. She is filling out the "deceased" macro target – the software's pre-saved form for reporting the event. In this case: "discovered during the afternoon rounds, death declared by Dr. J, message left at the daughter's campground." I notice that she makes mistakes with every word, and that there are letters missing everywhere.

Then there is the "documents returned, care comments, complementary information" entry. She explains that this is a transmission of death. The telephone interrupts her; an intern has forgotten what time she starts tomorrow. It is 3:25 pm. She comes back two minutes later. "Oh, I really messed up writing this, isn't it great when our time is wasted like that?" The telephone rings again: it's the deceased's daughter who just heard the message on her answering machine. Nathalie speaks with her for about 7 minutes, and then goes back to her rounds. There are still drips to be hooked up. She has forgotten her transmission, and the session has expired. She will open a new session an hour later, complaining that: "oh no, I have to finish the death form, shit…pfff…and I made mistakes on just about every word too. (Nathalie, LTC nurse for 20 years);

Once again, we observed that these interruptions prevent the nurse from concentrating on the filling out of a form. It takes Nathalie three tries to complete a document that should only take five minutes. However, this example demonstrates that certain interruptions are more or less important, and that some could be avoided, especially as concerns unfiltered telephone calls, where a nurse has to simultaneously deal with an intern's shift hours and questions from the deceased's family. As we saw above, the wards in which administrative work does not pose a problem are those in which another professional is responsible for taking phone calls, which allows to filter them by importance and to answer a number of questions that do not directly concern the nurse.

3.3 The EHR to document and organize care in a real-time recording

The content analysis of DOA in the units where administrative work seems integrated and in those where it is negatively perceived revealed interesting differences. It is in the 4 units where DOA are well-integrated that the amount of information is the highest. A deep analysis of the information content of patient records has shown that the French ICU and the three American units report the most information. The three American units are particularly interesting to confront to other units, since their reporting is very detailed and constraining. As stated by several American nurses, "Everything you do, you report it. Everything!" (Molly and Beth, ICU during a chat in the hallway) Charting is very constraining, as every two hours the nurse needs to do the patient's global care and safety assessment; she checks several boxes, making sure that the patient is in the room, that the bed is in low position, that the bed wheels are locked, that the patient is wearing non-skid footwear, that the fall alarm is on, that the door is open/closed, that the patient is sleeping/awake, that the IV pool is still in the room, that hand washing has been promoted, that the TV is on/off, etc. This level of detailed documentation was not found in France.

For activities such as the management of patient flow, the coordination of activities and exams, and the transmission of information, the EHR seems to provide a streamlined process that helps nurses find and share information. One American geriatric unit nurse explains:

I feel like it is very convenient to have everything in the computer database. After you have become proficient enough to use the computer system, it becomes easy to find things that you need to learn about very quickly, because everything is in one spot. It's easy to get more information and to communicate with my colleagues. (Elena, Geriatric nurse for 3 years)

These same activities necessitate much more effort in the two French units, where administrative work is negatively perceived. In Hepatology, the paper system creates complexity and interruptions in the nurse's workflow:

I am tired of carrying this heavy, ugly folder. And you know what worst thing is? If a sheet is missing, I'm the one who has to find it. Don't you think I have better thing to do? (Verbatim collected during shadowing with Virginie Hepatology nurse for 5 years)

Interestingly enough, the amount of information collected is high and seems to be increasing, as some American nurses explained (see part 1 of this chapter). The informatics system is meant to ease communication among professionals, but not all of them have the same access to information, as an American nurse manager describes:

What I feel I've witnessed with our transition to EPIC is that now we use a tool that is too complicated for the staff. I think what we've seen is that the medical staff - that makes use of the data we document – has a very different view of the tool than we do. We document things that they don't even seem to be able to find.

Me: Like what?

Probably our nursing notes. If you asked a physician to find a nursing note right now, they wouldn't be able to find one. (Chelsea, nurse manager in MICU).

This question of shared access to data also exists in France. I was able to observe that the efficient and efficacious use of digital tools is sometimes conditioned by the different habits of physicians and nurses. Physicians tend to mainly use computers x-ray examination, but rarely to read nursing notes. As a result, nurses have maintained the habit of copying these notes by hand, in order for the physician to see them, as this ICU nurse explains:

We fill out bandaging files on paper, so sometimes you need up to three sheets because you need to write the patient's general condition, with their silhouette included. You have to write up their Braden Scale, their cutaneous conditions; so it's a lot of paper. Same thing for pain, even though we have it on the computer. ("Really?" I ask.) Yeah. For example, we have the Braden Scale on the computer. ("So you fill out both the computer and paper forms?") Well yeah. Since we're silly and disciplined, we do it. If we only do it on the computer, it doesn't appear on paper, and the physicians always want to see paper on their rounds. They aren't going to check

the computer. Physicians look at images or at x-rays on the computer, nothing else! (Laura, ICU nurse for 7 years).

In this way, specialized software allows for the direct reporting of activities in a given unit. It is also a particularly important tool for coordinating care between professionals. Yet, varying professional rationales do not always permit an optimal utilization of this tool.

3.4 Time-consuming administrative work detracts from care: a cross-national ambiguity

In both countries, regardless of the ward, one can frequently hear nurses complaining about "paperwork preventing me from spending time with the patient," or even "before, we used to spend a lot more time at the patient's bedside." This frustration bears witness to the intensification of workdays and the complexity of cases that necessitate ever more time to coordinate. The following testimony of an American nurse is particularly relevant in this respect:

I've been in oncology for 15 years, and it has changed dramatically. Patient acuity has changed so much. 15 years ago, the patient I'm caring for right now would have been in the ICU. I love EPIC, but the paper system was really quick and it allowed me more time with the patient. I could even play cards with them. (Janine, onclohy nurse for 15 years).

However, sometimes it is also important to examine "paperwork" for what it is: a means of decompressing a bit, of escaping the difficulties inherent to care, of escaping the attitudes of certain patients, or even as something to hide behind. I quickly realized in the United States that the rooms all have computers, but that few nurses use them. They use the computers when scanning the patient's bracelet and when administering treatment, but otherwise the machines remain on standby. Yet, according to management, these computers were installed to "allow nurses to stay at the patient's bedside and to spend time with them." But, as both of these examples demonstrate, nurses do not like to do reporting activities in the rooms, for several reasons:

I hate charting in the room. It feels so rude to be focused on the computer while the patient is next to me. (Juliana, Oncology nurse for 5 years).

I usually avoid charting in the room because some patients are annoying and if I stay too long in their room they will come up with a bunch of questions and I will have to answer them. I do what I have to do and then I chart outside quietly. (Paula, geriatric nurse for 2 years)

Both of these examples showcase the ambiguities surrounding the relationship between caregivers and patients. Here, it crystallizes around the question of charting. Sometimes it is easier for nurses to take refuge behind a computer than to face complicated situations. The following French and American examples demonstrate how this reaction is shared from one country to another:

I am in an elderly woman's room with Jen. Jen is trying to turn the woman around just as the family arrives. The daughter is like a tornado blowing through, loudly explaining that she wants her mother to have surgery, and that she knows about the consequences. Even if she doesn't make it through, they have to try. She tells her mother: "look how I'm dressed, Mom. I'm in business mode today. I am going to get shit done!" She says that she called another hospital and that their surgeons are willing to remove the tumor, because it is the tumor that is giving her pain and that without it she would be better off. She looks at the nurse and shouts "I want to see the physician!" Back in the hallway, Jen looks at me and says: "You see? That's why I don't like charting in the room. Sometimes you get these crazy families. But you know what? Now I'm going to chart what this woman just said, in case it gets any crazier." (Fieldwork extract from American oncology unit)

Emily and I are in the hall. She's using the computer on the rolling cart. She sees Mrs. F from afar – the wife of the dying Mr. F. Emilie says: "Quick, follow me. We're going to the medication room." She hurries, pulling the cart behind her. Once we enter the little room, she closes the door and explains: "Ah, I've had enough. That Mrs. F really tires me out. I've kindly explained to her 3 times that she needs to get used to the fact that her husband only has a few days left, and yet every day she still asks the same questions. I don't have time for that. We're going to stay here doing paperwork

until she leaves. I just can't deal with it today." (Fieldwork extract from French geriatric long-term care)

Joséphine lets out a long sigh and sits down at her computer to fill out transmissions. "Aahhh you see, Lucie? It's nice to sit down a bit. They were so annoying today that I'm just happy to rest for 5 minutes." (Fieldwork extract from French Hepatology).

These examples are particularly striking and indicate the necessity of further study into nursing work through these sometimes-difficult interactions. Surprisingly, many nurses will use the computer as a means to seek refuge or to find a moment of tranquility. As a result, administrative work takes on a different meaning than just as a burden disconnected from the specific nursing role.

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Conclusion of Chapter 5

The findings found throughout this cross-national study have revealed a number of comparable elements between our cases. Comparing wards generally as well as according to medical specialty shows that in four out of six units, administrative work was not considered a burden, because nurses did not feel that they had any at all. This interesting finding suggests that administrative activities have either been successfully integrated into practice, or that they have been delegated to other healthcare workers. Indeed, regardless of nurses' perceptions, five out of six DOA were found in each unit. The precise content analysis of each DOA showed that the same categorization of activity belie different realities, leading us to study our data for factors explaining these differences.

Accordingly, the comparison of both the perceptions and content of DOA in these two countries allowed us to:

• Generalize flexible hypothesis n°2, whereby nurses' administrative work is comprised on one hand of reporting/documenting (that is, the tracking of activities), and on the other hand of the organizational task of coordinating care plans. A refined observation of the 6 DOA in both countries allowed us to

identify 5 of these 6 activities in every unit, thus enabling the generalization of our French results.

- To initiate interrogations concerning the usage of electronic health records, which our flexible hypothesis n°3 suggests, may facilitate nurses' administrative responsibilities. The international comparison has highlighted the role of EHR as a homogenizing factor of administrative activities between wards. Whereas DOA in France were perceived and experienced differently from unit to unit, the American wards demonstrated strong alignment in terms of the organization of administrative work via computerization as well as the organization of labor.
- To point out the delegation of tasks, which may take two forms: delegation from nurses to orderlies in both countries (sometimes still informal in France, and very formal in the United States), and from managers to nurses in the United States.
- To point out difficulties linked to sometimes inevitable task interruptions.
- To point out a new ambiguity surrounding administrative work, as observed in both countries: that even though nurses do not recognize administrative work as the core of their profession, it is nonetheless sometimes used as a means to escape from emotional difficulties linked to patient care.

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The results presented in this chapter will be published soon, under a 3rd article, following the article 2.

Chapter 6 The computerization of administrative work: use and misuse of electronic health records

All along our study, we have been looking into the way nurses feel about their documentation and organizational activities, and how these tasks play out in their daily activities. Interestingly enough, we found in both chapters 4 and 5 that the use of electronic health records (EHR) appeared as a lever for improvement in the integration of DOA, which comforted the third flexible hypothesis. As we have seen in chapter 5, all the administrative activities are done through a common tool in the American units: the EHR. The computerization of reporting and the documentation of nursing activities appear to streamline certain processes and help to gain some time. But the observation of the three American wards also revealed some ambiguities and complexities in the use of these EHR, leading us to push our inquiry yet further. This chapter is dedicated to the analysis of EHRs' impact in the three American units. We will first introduce the positive perception and use of EHR (1), before describing the various forms of adaptation to HER; an adaptation not always suited to the profession's best practices (2).

1. At first glance: the EHR as a positive and useful tool

Interestingly enough, while the study was not directly about the use of electronic health records, it became clear during the American fieldwork that its impact on nurses' every day activities was tremendous and merited not to be overlooked.

All the nurses gave positive feedback about documentation in the EHR. They acknowledged that it is time consuming and sometimes takes time away from direct patient care, but they also explained that they understood the importance of proper documentation.

Once you keep up with it, it's pretty good. I like it. (Vicky, Oncology)

Several nurses even pointed out how the EHR can sometimes be useful in many ways. Several nurses insisted on the importance of safety for the patient, but also on self-protection, as shown by these two interview extracts:

The biggest thing with EPIC that I appreciate is the fact that it keeps us safe. Although it is very time consuming, I appreciate it because, as a nurse, I need to keep myself, and most importantly my patient, safe. (Tom, MICU nurse for 4 years).

When we page a physician, it's really helpful to be able to chart the time that you paged them and the answer that you got, especially when you have an outgoing issue. Then you can go back and say that they didn't respond. (Elena, oncology nurse for 5 years).

These feelings of having to chart in order to protect a professional license were already observed in the exploratory fieldwork in the New York hospital.

Nurses also acknowledge the ease with which they can now use the computer system (after a certain learning period), and how they like to have easy access to all the patient's information:

When you see something weird, you can look back at the previous shift's assessment (you can always see the previous nurse's one), so you can compare them.

Sometimes, I think it reminds you to do things that maybe you wouldn't have thought of before. EPIC has a option to call the work list, which is good. There are some tests that need to be looked at within 24 to 48 hours, and it will remind you of it. So it's good because it could be forgotten from shift to shift. (Juliana, Oncology nurse for 5 years).

These interview extracts highlight nurses' perceptions of the EHR, but it is mainly through daily observation that various examples of uses and misuses appear more clearly, along with nurses' need for adaptation to the tool. Interestingly enough, these observations sometimes contrasted with the discussions held with nurses.

2. Adaptating to the tool

This section will showcase forms of adaptation, reflecting the pressure nurses feel from the necessity they have to chart fast and well (2.1), but also their way of checking boxes (2.2), and finally how computerization may impact communication with other healthcare workers (2.3).

2.1 The pressure to chart in a timely fashion, and dedication

We have previously seen that nurses explain the need to chart by underlining the importance of liability and the respect of hospital policy. Our observation period helped us better understand how this translated to daily activity.

Indeed, nurses are pressured by their managers to precisely complete documentation in a timely fashion. Nurses get weekly feedback concerning their reporting compliance, with the goal being 99% of charting in a timely fashion and with dedication. They receive a personal score as well as a comparison of this score with the unit's average. These scores can be used in the nurse's annual evaluation, even if each unit's manager told us that he was not using it that way. The score combines two elements: timely documentation (each activity has to be documented within an hour), and the timely administration of medication, as an ICU nurse explains:

Documentation after collecting data, what does it mean? The standard seems to be that they want you to document within an hour (for other professionals and to reduce the risk of charting errors). So, if for whatever reason I documented at noon what I should have documented at 8, they will record that. (Khar, MICU nurse for 3 years)

Audits are also an important tool for evaluating the ability to properly document. In the hospital a team (part of the quality improvement unit) studies the charts everyday (they select the patient who has, for instance, a full catheter or a risk of skin breakdown) and they closely monitor whether the charting is compliant with the physician's prescription, as explained by two clinical nurses 4 in oncology and in the medical ICU:

So I get an email everyday from someone who reviews charts, which says "this patient had an order for SCD, the sequential devise on their legs, but the nurse hasn't documented whether the patient is using it." Is the patient refusing, for instance? So I need to talk to the nurse and ask her to explain why she didn't document it, or if she forgot to do it. (ICU nurse manager)

For instance, the skin committee, the quality improvement person for skin: for every skin ulcer we have, she goes to the patient chart and she reviews what has happened in the past 24 hours. Were they turned every two hours? Are we using skin protection? Are we doing what we are supposed to be doing? (Oncology nurse manager).

It is very impressive to see that these chart reviews take place *in vivo* and that the reviewers are sometimes faster that the nurse, as the following example demonstrates:

It is 7 am, a new patient arrives. James is taking care of him. (...) The patient is crashing, the medical team arrives, and after 30 minutes of intensive care, the patient is safe. (...) Now everything seems calm, but James explains that he still has a lot of work to do to keep the patient stable. He has received 8 orders from the physician. It is 10 am and we are still in the room. James has not had a chance to chart; he is too concentrated on care, and is busy hanging medicines. At 10:10 am the CN4 walks in and says that the quality control person noticed that he didn't chart whether or not the patient has SCDs. James is getting upset. He later tells me: "the SCDs were on the patient. I think that's

the most important for me. My patient was crashing for God's sake! It drives me crazy to know that somebody's sitting behind a computer checking what I am supposed to do!"

Clinical nurses 3 and 4 also do monthly audits where they look at some important aspects of the documentation. If a nurse did not do well, they will send her an email warning, or, on the contrary, they will congratulate her for doing a good job. Nurses seem to feel that their performance is measured by what they document. So, as a manager explained:

If you give them massive amounts of documentation, they will fill it out to prove their performance, to maintain job security and to demonstrate to their peers that they are hard working. There are many emotions and thoughts; some conscious, some unrelated to the drive to document. You may document a great deal and you may document more than you ever did previously, because the space on paper and now on the screen is bigger and bigger. (Manager in MICU)

These policies are meant to control the quality and safety of the patient, but they also imply new behavior for nurses who tend to adapt to these constraints. In other words, these policies push nurses to do a number of things, many of which are deceptive; to chart things that they may not have done. We underlined some example of these behaviors several times:

In the ICU, patients are usually too unstable to tolerate a simple turn. If that's the case, is the nurse going to document "I did not turn them, they were too unstable to turn", or will they simply go ahead and click the box "I did it"? It's quicker than explaining why they didn't every two hours. (Marius, MICU nurse for 2 years).

There is a patient whose family asked that we support them until they can arrive from distant part of the United States. They would fly in, let's say, today is Thursday, they won't be here until Saturday. So, support them until Saturday. But the diagnosis and the vitals suggest that the patient will not survive until then. Is there value in continuing to turn them every two hours? (Turning just came to mind, it's just an example).

When turning might cause them some degree of discomfort, with a tube in their airway, possibly restraints, would you continue the regimen of 5 times a day, as you should? Is

there value in this when care will be withdrawn within 48 hours?
Will I document that I didn't follow that doctor's order? No. I will just chart that I did it.
(Tom, MICU nurse for 4 years).

All in all, many nurses get the feeling that they are being forced to focus on managing documentation, at the expense of patients' welfare. A nurse manager with 20 years' experience explained this fear of the new system:

I am afraid that the EHR may be creating a "get-it-done" kind of nurse. You do the task and then you sit and wait until the next order pops up. It's been proven many times that, if you are simply inefficient, you can have a long and successful career. If you do what you're told with a smile, with efficiency, and without using too much equipment, you will have a great score on the computer and that's unfortunately what will make you a good nurse in the eyes of the institution. Don't get me wrong, I've seen that mentality as long as I've been doing this, but I am afraid that it will become the norm with such electronic systems. (Oncology nurse manager)

2.2 Checking boxes and charting by exception as a reflection of nursing work

In a more insidious way, this considerabe amount of charting also pushes nurses to find ways to adapt and gain time. For instance, the patient education flow chart is highly criticized by nurses, who don't think it reflects their work, especially in the ICU where patients can't speak most of the time. We met many nurses who filled in this chart at 7 am in the morning, before even meeting with the patient and actually talking to them. They assume that they will discuss the chart's 20 elements with the patient that day. In other words, as Brea and Jenny explain:

I click on everything because otherwise I will get a reminder saying "oh you need to do that," and I hate it. (Brea MICU nurse for 3 years).

I just chart everything. I know it's bad, but it will help keep my score up where it needs to be, and it will help me avoid getting an email from a CN4 saying "you didn't meet

expectations." (Jenny, MICU nurse for 2 years).

Over-charting is a common habit, which sometimes leads to lies. For instance, in the MICU, many tabs cannot be charted because the patient is not responsive or cannot be moved easily. Let's take the example of the respiratory flow chart. Nurses need to chart that they have listened to the lungs. In the ICU it is mostly possible to listen to the right, left, up, middle and lower. But most nurses chart that they listened to every one of the 15 positions that the software provides for. But they obviously cannot listen to the different positions in the back when the patient cannot be turned. As July explains, this leads to over-charting things wrong:

Sometimes I am very surprised and I wonder; wow where did they get that from? But it's just something that gets passed along. Once somebody defines something in the chart, it gets opened for the rest of the charting period. It won't go away. So every time you open this up you have 15 pulmonary assessments there, even if nobody ever did 15 pulmonary assessments. (July MICU nurse)

Almost all the nurses also use the "copy/paste" function. They copy what their colleagues have charted and check if something needs to be changed. This practice is tolerated by the hospital and is wildly used by nurses. Some of them even confess that without it, it would be impossible to finish on time. As a result, it appears that nurses are comfortable with the tool because they adapted to it and found unusual manners to use it.

This system of box checking does not reflect nurses' activities. According to several of them, there is a real disconnect between the administration's expectation and what clinicians feel they have been committed to doing, and what families and patients expect of them. As a nurse in oncology explains, their duties cannot be summed up to the checking of boxes:

I think that almost 30% of our admissions will expire with us. That process if often time-consuming and it is important that it be done right in terms of sensitivity to the patient's wishes and in consideration for the family. I am not aware of any other means than simply writing a note to with family during this 2 hour time-frame to explain the care-withdrawal process, and how the body will be moved from the unit to

our morgue, and eventually to a funeral home. To explain how exactly we withdraw care in order to make sure that this patient is comfortable. But that's my job, and I am never rewarded for that. Not even trained for it, but that's another topic! (Elena, oncology nurse for 5 years).

2.3 Computerization versus communication

As was previously highlighted in the reflexive part of our methodological section (chapter 3, section 3.4), nurses' adaptation to their administrative activities also impact their relationship to the team with which they work. In the American fieldwork, computers have clearly become a tool not only of documentation but of communication. In France, however, the resident would call the nurse, or stop by the station to say "I put in an order for Mr. X." Here, the nurse finds the order on her "work list" and goes from there. Take the example of Brea in the North Carolina Medical Intensive Care Unit:

I am shadowing Brea this morning. It's 7:40 a.m., a new patient arrives from a small hospital upstate. The respiratory therapist comes and checks how he is breathing; she installs a CPAP ventilation device. Two other nurses come to assist Brea; they take off his clothes, help him into bed, and make sure he is ok. They run an EKG, not waiting for the physician to write an order. Brea does a very detailed admission on the computer.

A resident steps in at 8:00 a.m. She briefly opens the curtain and from the threshold asks in quick sequence: "Do you know where you are? Who is the president of the United States? Are you in pain?" The patient answers with a brief "I am at the hospital, the president is Obama and right now I am not in pain." The resident closes the curtain and leaves. Brea tells me that she had never met her - she is a new resident. Neither of them has introduced herself to the other. Brea completes the assessment on EPIC - the computerized health record - and a few minutes later she sees a red dot on her screen. That's how she knows the physician has entered an order. So she clicks and discovers a huge list of orders. There are different orders from different doctors; she knows only one of them. She is concerned because the prescribed medications are

to be taken orally. The patient is on CPAP and has real difficulty breathing, so she doesn't want to take the responsibility of giving him the meds.

She is concerned when looking at the monitor and at his belly, and she feels that he will need to be intubated. One physician has sent orders, but it is for the wrong patient. She is annoyed. She sends a text via the physician's pager: "Dr. T, the order seems to be for Mr. X, thx, Brea." She is very nervous, and she steps in to check the monitor every 5 minutes. She sends another text to the resident: "Patient not breathing well, concern, thx, Brea." She calls the respiratory therapist, who is out of the unit and can only come later.

10:15 a.m.: since the resident's visit, no other physician has come. But Brea has received new orders. She is upset and doesn't understand why they keep prescribing oral meds. The electronic drawers of the pharmacy are not functioning, so she can't give any meds yet. The patient is not breathing well at all. She finally decides to go to the physician's office and talk to the resident. She crosses the big hallway towards the office. The physicians are rounding, and by the time she returns, her colleague has already called in an emergency response: it's a "code blue." Now the physicians are running to see the patient and speak with Brea. Thankfully, the patient survived ...

Afterwards during an interview, Brea explained that such events were infrequent, adding that "July is the first rotation for residents, so it's not the best time." Perhaps it was just an isolated incident on a bad day, but during my previous research in New York, concerns about missed communications because of the computer had been raised by several nurses. One of them had said during an interview: "Because of the computer, the doctors don't always talk to you. They send the order online. It makes the work worse - there is no more communication." When comparing these examples to the French MICU, we inferred that, at least in the New York and North Carolina hospitals, the computer and the pager were becoming the principal tools with which healthcare workers choose to communicate. As a nurse said, "I feel more comfortable writing to the physician. I feel shy when I speak with him directly." But texting may not be so reliable, especially when, as often happens, nurses don't get an answer. In one department in New York and in another in North Carolina, the same thing was observed: the nurses copy and post, as a "nursing note," the messages they send to physicians. They are so

used to never hearing back from the physicians that they need to keep a record to protect themselves.

These results **challenge flexible hypothesis n° 3**. The litterature highlights mainly the positive futur outcomes of nurses working 100% paper free and using electronic health records. This study show that various technological and ethical backlashes need to be addressed.

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Conclusion of Chapter 6

This chapter has shed light on the use of electronic health records. The example of this hospital was particularly interesting, since their equipment was almost 2 years old. As a result, these findings are not representative of a changing period. The entire hospital had the time to adapt to the change. Their benefits are obvious to healthcare workers themselves, who have adapted to the tool and learned how to navigate it. Even though the DOA done via EHR are sometimes viewed as time consuming, nurses note that:

- It keeps them safe, as it is a record of professional liability.
- Everything is combined in one tool, which eases the documenting process and the transmission of information.

However, obsering the use of computer systems and how the institution manages them revealed several strong pitfalls:

 Documentation becomes a way to evaluate nurses' work, and it is their practice's principal driver.

- The amount of information to record is becoming increasingly big, fomenting
 deceptive behaviors in order to have the time to do everything. Nurses adapt to the
 tool, but their adaptation is not always ethical.
- The computer seems to make independent thought and autonomy a great challenge to maintain. The risk for the new generation of nurses is to become too task oriented a "get-it-done" kind of nurse with little critical thinking.

Commentary and General Conclusion

It is in the spirit of a thesis on public health that we explored the administrative duties of nurses within several contexts of care, and in two different countries. This spirit is based on the elaboration of an interdisciplinary approach that has yet to receive its due recognition within contemporary research. As a result, we have explored the state of the art of the sociology of medicine, as well as referring to a considerable number of works in the fields of of nursing science and some in management. It is around this purposefully open research continuum that we have built this thesis's discussion. Consequently, the aforementioned discussion bases itself on our research results in order to deliver a pragmatic entry into understanding the political and managerial implications of the subject.

In this section, we will first present the primary points of discussion around two aspects: the implications of DOA for the nursing profession, and their implications for the organizing of care and of hospital management (1). We will then seek to present the limits of this research (2). Then, the following section will suggest a number of possible avenues for future research (3) before providing a final conclusion (4).

1. Discussion

Basing itself on the analysis of *in situ* practices, this project has sought to shed light on a forgotten aspect of nursing work. It has emphasized the complexity and ambiguities of an all-too undervalued and negatively stereotyped form of work. This analysis of practices has the advantage of providing a better understanding of the evolution of nurses' service work in a context of increasing complexity and intensification of the care process. As a result, it allows us to analyze DOA in terms of what their existence implies for the nursing profession (1.1). But this analysis of practices has also allowed for the emergence of extremely interesting managerial and organizational implications intimately involved in different care contexts, sometimes even allowing for the generalization of certain results (1.2).

1.1 Implications of DOA for the nursing profession

First, this research has highlighted the complexities and ambiguities of nurses' administrative work and has called for a better recognition and integration of DOA into nursing's mandate and pace of practice. Our fieldwork demonstrates that the issue for nurses may not necessarily be about the time spent doing administrative work, but rather about the integration of this activity. Therefore, as we demonstrated in chapters 4 and 5, administrative work can better be understood within its organizational context, in accordance with the emergence of specific factors relevant to its integration (1.1.1). Moreover, the entirety of this work beckons alternative observations of administrative activities in order to highlight nurses' managerial abilities and to help the profession understand their importance, since administrative work may serve as a lever of professional autonomy. In this sense, interactions with other professionals and different forms of delegation play an important role (1.1.2).

1.1.1 Towards the necessary recognition and integration of administrative work into nursing practice

Through the ethnographic observation of nursing work in several hospitals, various wards, and in two different countries, this thesis has sought to reveal the true nature of nurses'

administrative work. We have shed light on a whole part of nursing work that remains in the shadow of direct caregiving. The combination of methods has highlighted differences in the integration of administrative work throughout various clinical contexts. As we have seen, most studies are based on an idealized patient-centered model of nursing: either reporting on nurses' complaints about administrative work and its burdensome nature, or criticizing it by emphasizing its impact on decreasing bedside nursing time (Hendrich et al. 2013; Farquharson et al. 2013; Dearmon et al. 2013; Antinaho et al. 2015). This study provides an alternative perspective of nurses' administrative work, and argues for the recognition of the importance of this work for the quality of patient care. It also point to a pressing need to better integrate these various activities into nursing.

First, our fieldwork is fully imbued with an ethnographic approach as a way to reveal complexities. The contradictions and ambiguities observed at the very beginning of the first fieldwork, where Mary and Jack where working (See fieldwork extract, first page of the general introduction) were finally representative of these same contradictions found all along the study. In opening the black box of administrative works and what it represents, what it is composed of, and how integrated it is, we have brought to light a number of contradictions and ambiguities linked to several activities and to their integration into what nurses see as the core of their profession.

Consequently, these administrative activities cannot simply be considered a burden. At times they are admittedly redundant and time-consuming, but they also provide opportunities for tracking and objectivizing care, and for coordinating complex care plans. They can even act as an escape from certain situations. Thus, nurses can sometimes be ambiguous or contradictory in terms of their demands, and other complex issues linked to the organization of work tend to be crystallized around administrative activities as a focal point of discontent. These various contradictions and ambiguities surrounding nursing work have already been the subject of study (Vega 2009), but here we have revealed that administrative work has its own exclusive ambiguities that can be summed up in 4 points. Administrative activities can:

- Be a distraction from emotional fatigue, even though they are not considered as a core nursing activity.
- Feel burdensome, but be acknowledged as important. This non-recognition makes them a hidden or invisible part of the practice.

- Be perceived as integral to nursing when they help objectify care. They are not a
 burden, yet they are another form of invisible work since they are not as
 recognized or taken into account.
- Feel burdensome because of their redundancy and non-integration into practice, and be delegated to other health care workers.

These ambiguities illustrate a gap between the profession's ideal of direct patient care, and the practical need for administrative and organizational proficiency of complex health care systems.

We have also concluded from the literature that many perception-based studies reported an increase in the time spent doing "paperwork," and related a largely shared perception of the fatigue and burden engendered by these indirect activities away from the patient's bedside. Yet, a close analysis of the literature showed that the time spent with patients had not changed, suggesting either an intensification of these tasks or the delegation of certain duties. Faced with these observations, we decided to combine a comparative approach with a time and motion study. Results are in line with this assumption as they suggest that the issue at stake is the meaning nurses attribute to their administrative work according to the context in which they work.

This study moves beyond the direct patient care frame to show that nurses' perceptions of their administrative tasks and its burdens are not necessarily linked to time consumed, but to organizational factors. In this sense, our findings resonate with a Swedish study wherein the authors conclude: "nurses had a feeling of spending too much time on non-nursing activities of a service type (...) but no objective basis justifying this feeling was found." (Lundgren & Segesten, 2001)

Henceforth, our observations further prodded us towards identifying the organizational factors influencing the integration of DOA into practice. These were particularly related to the content and organization of nursing work, and highlighted two main types of administrative activities:

• Activities linked to reporting and documenting - helping track down nursing activities and patient states all along this journey, and providing quality indicators.

• Organizing activities that mainly consist of coordinating exams and care.

Implications for policy, practice and management

These results move beyond professional rhetoric to better describe the work that nurses actually do, the reality of daily activities, and the differences between various activity contexts. In so doing they impress the need to:

- Rethink nursing education to better include and reward administrative activities, as they are an important component of nursing work.
- Help hospital managers take these hidden activities into account in the organization of their ward and according to the specificities of medical specialties.

They offer nurses and their managers an alternative understanding of administrative work: that it is not always a burden and that some organizational factors can help and support the incorporation of DOA into clinical practices. These factors are of at least three types:

• Matching skill mix and staff ratio.

DOA are a largely invisible element of nursing work (Allen 2014b), but their complexity and volume has increased in contemporary healthcare systems. Generally, staffing matches patient acuity and the need for nursing care (Needleman et al. 2011), which can leave other areas understaffed compared to their more acute counterparts, even if DOA complexity is more marked. Staffing shortages are a challenge for nurses, as they are left with a limited amount of time to document tasks (Chelagat et al. 2013). The content analysis of nurses' activities showed that not only are the French ICU and the three American units well-staffed, but that nurses can delegate part of their DOA to support staff. In LTC and hepatology, on the other hand, there are fewer qualified nurses, with no possibility of delegation whatsoever. A better integration of DOA should start by taking these activities into account during staffing decisions. Mandatory minimum nurse to patient ratios could be implemented by manager within each specialty wards (as they exist already in intensive care), including the level of organizational complexity.

• Rethinking documentation relevance to nursing practice

Our study shows that nurses perceived DOA more positively when these were relevant to, and readily integrated into, clinical practice. The problem of documentation relevance has been emphasized as the key finding of a large British National Health Service (NHS) study: 68.1% of nurses considered that the paperwork they had to complete did not add value to patient care (Cunningham et al. 2012). In the French ICU documentation tends to support minute-by-minute care, and each record is integrated into this ongoing activity. In LTC, the patient's state changes very little, yet nurses need to record the same status over and over. In this case, paperwork is not perceived as relevant, and each administrative activity appears isolated and disconnected from direct care in the organization of work, providing a global view of non-integrated care. Interestingly enough, DOA are fully integrated to the practices of all three American wards, but they are not always relevant, as highlighted in chapter 6. Their integration is somehow linked to nurses' willingness to collect large amounts of data without questioning their relevance, simply because it is mandatory to do so.

• Include nurses into the development of informatics strategies.

Finally, Fitzpatrick (2004) has made the distinction between records being understood as an "information repository," or as a "record at work in the practical delivery of healthcare." Care organizations tend to treat records as serving both purposes equally (Allen 2014), but this is not necessarily always the case. Our study highlights this argument, as DOA reflect and support clinical work in one case (ICU), but are overshadowed by broader concerns with record-keeping and accountability in the other (LTC). This exploration of clinical entities raises the question as to whether nurses require more latitude in developing documentation that reflects their work. Nowadays, this documentation is linked to electronic health records (EHR), the benefits of which are not yet fully apparent, since nurses' technological acceptance is still relatively feeble, and since this recognition is influenced by the context and environment of care (Strudwich & McGillis Hall, 2015). These case studies clearly showcase how DOA are articulated within this context. While nurses in both units were willing to work with informatics, it became clear that only the ICU streamlined communication and reporting through the

informatics system. This result confirms that of a previous ethnographic study in intensive care, outlining the importance of nursing technology development (Crooker 2009).

1.1.2 Delegation of administrative activities, a question of professional autonomy?

These results again refer us to the question of "dirty work" delegation; low-status activities in the bundle of tasks. Here, we concerned ourselves with one type of work bundle: administrative tasks. We observed a delegation of some of these tasks towards orderlies in both countries, which was more or less formalized according to the unit. This delegation is characteristic of the profession, and has existed for many years – most likely since orderlies themselves came about(Arborio 2001). Some of these delegated tasks may become rather gratifying for the orderlies, since they broaden their capabilities. The dirty work of some is the gratifying task of another. We observed that the American hospital used the DOA as a lever of care improvement. There, the nursing profession has been able to organize itself and include front-liners, as shown by nurses' involvement in the clinical ladder. The opportunity provided to continue working as a staff nurse while completing administrative duties as a clinical nurse, shows the process of involvement in managerial activities. This is the more surprising delegation at play as it is operating from managers to nurses. The creation of a proficiency scale in the United States allowed clinical nurses to take charge of administrative activities on a part-time basis. This clearly demonstrates that managers' less prestigious tasks can become a career advancement opportunity for nurses. In this case, administrative work can be gratifying. Consequently, the profession is appropriating managerial and organizational work for itself. Interestingly, the clinical nurse 3 and 4 are also call assistant manager as they mostly perform administrative tasks linked to the organization of the ward itself. Their role is tremendously important as it gives manger the time to work on more political matters with the directorship of the hospital.

This phenomenon is extremely interesting and the American example begs us to further study the role-played by the nursing profession in the division of hospital labor. In 1951, Hughes was already wondering when the "nurse," a person evoking comfort and mediation between patients and doctors, would see her role divided between other jobs or professionals. Our present work illustrates this form of redistribution, and the increasing

training of American nurses poses the following questions: what hospital role and functions do nurses with a Doctorate in Nursing Practice have? What are their implications for DOA? Does the nurse simply have a clinical role or does she take over certain administrative tasks? Is their work redistribution of physicians' tasks, or of some managers' administrative duties, or both?

Implications for policy, practice and management

Studying nurses' administrative work suggests the following actions:

• To delineate nurses' administrative and organizational skill mix

Knowing the complexities of care paths and new needs in population health, nurses' skill mix must evolve and the delegation of administrative task must be considered as much as the delegation of clinical tasks.

• To create clinical ladders in France.

Geared toward administrative duties, they would allow nurses to work part time at the bedside and part time on organizational and administrative duties. These nurses would assist their managers who are often struggling with balancing their work in the ward and their institutional duties. These nurses take over the third kind of administrative duties: institutional implications. The better nurses are integrated into the hospital's institutional life at all levels, the better they will be involved in their administrative duties.

• <u>To think about new jobs and new nursing roles</u> that are emerging and to design them with particular attention paid to DOA.

1.2 Organizational and managerial dimensions of DOA

Our fieldwork has highlighted the importance of the organizational function of DOA, which are used as tools to coordinate care. Therefore, our results demonstrate the importance of the boundary-spanning role of primary nurses (1.2.1). We will also make certain conclusions concerning how a focus on the computerization of administrative tasks has brought forward a

number of questions concerning its integration, as well as questions concerning the benefits this could have for the practice (1.2.2).

1.2.1 Administrative activities as highlighting nurses' boundar-spanning role

In hospitals, boundary-spanners or liaisons are staff members who perform the primary task of integrating other people's work all along the care path (Lawrence and Lorsch 1967). They integrate work that cuts across functional or professionalal boundaries, through projects or processes for the provision of services to patient. Originally, staff nurses were the first boundary-spanners; they were attributed one patient and were devoted to coordinate their care throughout the journey. This was a way for nurses to increase their accountability to patients (Gittel & Weiss 2004). But as lengths of stay became shorter and care paths more complex, the handling of coordination and clinical care became increasingly burdensome for primary nurses in the USA, and this responsibility has slowly moved to non-clinical case managers (Gittel & Weiss 2004). In many American hospitals since the 1990s, wards have functioned with both a social work case manager and a nurse case manager.

Interestingly enough, the precise analysis of each DOA's content shows that in the three French units, primary nurses are still fulfilling this boundary spanner role. The fieldwork examples from the French long term care unit or the hepatology unit notably show the importance of this coordinating function. Nurses have a key role in creating pathways for an elderly patient to see a dentist, for a patient with cancer to effectively meet with the radiologist, and so on. However, in two of the three French Units, nurses expressed strong frustrations toward administrative work, suggesting that these hospitals did not assess the importance of the complexities at stake in their wards. They did not develop nursing time, except for handling the coordination of in- and out-patient care, nor did they create external functions such as case managers. Hence, some of the DOA are perceived as burdensome by nurses who feel frustrated by having to carry out both organizational and clinical roles without the time to do so.

However, we observed the delegation of many activities to other professionals in the three American wards. The first to take over the boundary-spanning role is the charge nurse. She handles the ward's day-to-day coordination, bed management and cross-functions between healthcare professionals. The initial purview of the charge nurse, as designed by

hospitals in the United States, was that each nurse would take over this role at least once per month. This rotation would allow everybody to take on administrative responsibilities and be in charge once a month. But in the three units studied, we observed that an experienced nurse would take the role and keep it most of the time. Young nurses are not inclined to be "in charge," since they feel that it is too much of a responsibility, and the oldest seem happy to take on the role as it is less physically tiring. This adaptation to the function by nursing teams creates a distortion since it leaves mostly inexperienced nurses at the bedside, provoking concerns about the transmission of skills between generations as well as about the quality of care. In the three American units, social work case managers have also played a boundary-spanning role; a stronger inquiry into their responsibilities would be interesting. We noted during our fieldwork that, nurses had very little knowledge about the role of social work case managers.

Implications for policy, practice and management

The precise observation of DOA within various contexts has highlighted that, in some wards, these tasks are still part of the original boundary-spanning role of nurses. This points to the necessity of:

• Maintaining the liaison function of primary nurses as the original boundary spanners.

Indeed, when used efficiently and when the charge nurse rotation is effective, this position is valuable since it creates a strong coordinating role in the ward. Each nurse can experience this pivotal role once a month, and take some organizational responsibilities (one of the three kinds of administrative work we developed earlier).

Creating more charge nurse positions and training nurses to be in charge.

To avoid the backlash of generational segregation between staff and charge nurses, each nurse could be trained to work as a charge nurse.

1.2.2 The computerization of nursing work: too much of a good thing?

In this thesis we observed the bundle of tasks associated to administrative activities. In France, this bundle is not homogenous, since it is based on tasks of different value and prestige (Hughes 1951) from one ward to another. Correspondingly, less prestigious tasks, what Hughes calls "dirty work," sometimes become the object of delegation. Interestingly enough, the cross-national comparison confirms and challenges findings from comparing the two French units. It confirms the importance of administrative work in the daily activities of nurses and shows the emergence of strong organizational factors allowing for the integration of administrative work into practice. However, the three American case studies show a consistency in nurses' perceptions, independent of the type of ward observed, whereas in France, one principal assumption made in the comparison of two polar cases was that the context of care was influencing perceptions. This finding suggests that the American hospital successfully implemented a strong institutionalization of DOA, as suggested by Needlman (2012). It also emphasizes how streamlined the process of data collection, reporting and documentation can be from one unit to the other, almost erasing differences in medical specialties. The electronic health records act as protocols, that have the potential effect to empower nursing staff (Mackintosh and Sandall 2010). But these studies have highlighted a certain amount of non-negligible backlash as a result of misusing computer systems. Some of these problems have been documented in literature, especially in studies about the Computerized Physician Order Entry (CPOE), which has been shown to have a negative effect on doctor-nurse communication (Beuscart- Zéphir et al. 2005, Wright et al. 2006). Authors often blame the technology itself for these issues (Pirnejad et al. 2008, Khajouei & Jaspers 2010).

But our study has emphasized nurses' relationship with technology and how it can sometimes lead to ethical issues. The emotions linked to the necessity and pressures of timely documentation are sometimes so strong that they prevent nurses from focusing on their more substantial responsibilities. As a result, the electronic health record becomes so regulated as a practice and performance tool that it is separated from more critical tasks. In this case, administrative work through the informatics system competes with the activity of care, as the former appears predominantly geared towards professional accountability rather than caregiving. Involving nurses in the strategic development of informatics (Hussey & Kennedy, 2016) could avoid such situations and could support the delivery of care.

Implications for policy, practice and management

- <u>Incorporating nurses' Documentation and Organizational Activities</u> into the design of
 informatics strategies, in order to provide greater professional input and influence over
 this work.
- <u>Creating shared notes on electronic health records</u> to avoid a disconnect between nurses, physicians and other healthcare workers. More generally, the problem of communication via informatics should be addressed.
- <u>Balancing checklists and nursing narratives</u> in the design of electronic health records is important to help nurses maintain a critical attitude.

2. Limitations

The first limitation resided in the application of cross-national ethnographic studies. Time frames and field access were major issues constraining the PI's data collection. While access to the field was rather easy in France, leading to the study of three different hospitals, access in the United States was limited to just one hospital due to a restricted time frame and to stringent authorization procedures. However, as explained by Sainsaulieu (2003), collective representations of healthcare take place within the unit of care itself rather than within the hospital or institution. As a result, this limitation has the benefit of providing a vector of unit observation according to their similarities, and shows how the American hospital has successfully integrated administrative work regardless of specialty. Reflexivity proved to be fundamental, as the PI had to remain aware of the influence of her place in the field; an influence which would play differently in both national contexts.

In this thesis, we have observed interactions between nurses and orderlies, as well as the delegation of tasks with managers. However, we have only scratched the surface of interactions with other professionals, such as physicians, and only when these directly impacted nurses' administrative work. A more in-depth study should have allowed for a more detailed analysis of the interactions between these two groups of professionals and their common roles in DOA. Nevertheless, such an option would have necessitated the inclusion of

physicians in the study, which would have been too time-consuming in view of the already complex nature of our fieldwork. A deeper analysis of case manager's role would also have been precious. Lastly, as we explained in this study's context, caregivers are increasingly obligated to take patients into account, in order to provide "user-centered services." This relationship with the patient is at the core of the study's social system, and should have been addressed. Here again, difficult constraints linked to ethical authorizations would have considerably complicated the study.

Finally, we found three types of DOA: activities linked to documentation and reporting, organizational activities, and institutional activities. The institutional activities were not recorded in the French portion of the time and motion study. Indeed, nurses participate in institutional meetings but none of these occurred during the shadowing time. As a result, this activity was not analyzed as much as others in France, but was made much clearer in the USA with the roles of clinical nurses 3 and 4.

3. Perspectives

The intention of this project was to open the black box of administrative work. As such, a better understanding and description of these nursing activities and of the factors explaining their negative perception may lead to further research on several levels:

- This qualitative and largely descriptive study could act as the starting point for broader sociological research. Indeed, now that we have characterized administrative work, we could survey a larger sample of nurses through a questionnaire, in order to test the ability to generalize our findings.
- The first results concerning the use of EHRs in the United States constituted but a
 small part of this study. An entire investigation could thus be dedicated to this subject.
 These results could be enlisted in order to design a comparative study with France and
 to observe practices related to computerization in more advanced units.

- The various questions raised during the preceding discussion reveal just how ripe the French context is for reflecting more deeply on the nursing profession's evolution and the skills it requires. The French decree of the 26th of January 2016 established the title of advanced practice nurse (infirmières de pratiques avancées) but its role is not as yet well-defined. Pulling from this study, a further investigation into nursing practices and the evolution of the nursing mandate in France could be particularly interesting.
- The data collected are rich in many hours of observation and interviews. There remains a great deal of knowledge to be gleaned from these materials. A comparative study of nurses' perceptions of their own accountability in both countries is currently underway and will likely lead to further publication. Indeed, the concepts of liability and responsibility which constitute accountability were brought to light and explored through this study, suggesting the need to observe their appropriation by nurses. As a result of our on-site observations, it is interesting to note that it is possible to extend our interrogations towards questions of political science.
- Another lead would be to continue the analysis on a more political science-based point
 of view, in order to understand how administrative activities are conceived and used
 by politics at a state level.

General Conclusion

In opening the black box of a nursing burden, this thesis has revealed a hidden part of nursing; namely, the administrative component of their work. But behind this so-called administrative burden we have discovered a variety of activities constitutive of important needs for following up on care paths, and coordinating and organizing patient journeys in and out of the hospital. New needs in population health, patient acuity and the complexities of chronic illnesses create opportunities to rethink the mix of nursing skills and to acknowledge the importance of managerial and organisational nursing skills. This thesis has highlighted many ambiguities and contradictions in these activities and invites further inquiry in order to

create new opportunities for nurses to expand their role of primary care giver. This work calls for the integration of nursing administrative tasks according to the context of care.

The exploration of different wards in different countries has shown that the way to get involved with one's work is linked to the organization of this work within the institution. All the nurses - whether they work in oncology, intensive care or geriatric long-term care, in France or in the United States - acknowledge the importance of most of the DOA. The real burden is not the tasks themselves, but their integration to the nursing practice. We have highlighted several tools to work towards integrating these tasks: electronic health records, matching the nursing skill mix with patient ratio, including DOA, and the establishment of documentation relevant to nursing duties.

But the ambiguities and contradictions revealed in this thesis have also shown that there are many varying perceptions of this work. Just as it is legitimate to study and value nursing work through the lens of direct care, it is legitimate to complain about what takes one away from this care. In 1956, Everett Hughes had already noted that one of the most common errors in the study of work was to obscure entire aspects of the network of interactions which constitutes it. Resultantly, we have a tendency to consider nurses and patients as a social system. Of course, this relationship remains fundamental and indeed reflects a certain aspect of reality, but it is also partly a stereotype or a nostalgic ideal of some better past. Consequently, Hughes noted that the most common gripe in service professions was that of not being able to correctly do one's job. He pointed to the fact that nurses were convinced that they would provide better care without any administrative responsibilities preventing them from being at the patient's bedside. This work revealed a number of realities veiled by this somewhat stereotyped complaint. Although it is recognized by the entire profession, this grievance is not always seen as such in practice. There are times when administrative tasks help objectify care and to ensure the primacy of good practices, especially in the context of an increasing complexity of care. There are also times when one will prefer writing up notes next to one's colleagues rather than having to face an emotionally trying situation. And there are yet other moments when nurses jump to the computer in order to report on a situation and to facilitate the following shift's work, or even to protect oneself from eventual complications or legal actions by disgruntled patients.

Hospital managers and nursing leaders do not take into account these different considerations into their vision of nursing professional ideal. And as long as they are not ready to recognize them, these sometimes extreme distortions will continue to lead to the exhaustion of caregivers.

Bibliography

Acker, F. (1999) *Travail d'écriture, écriture du travail, élaborer un outil qui convienne*. Actes des journées diagnostic infirmier : un langage pour le troisième millénaire, Saint Etienne, 17-30.

Acker, F. (2004) Les infirmières en crise? Mouvement n°32, 60-66.

Acker, F. (2005) Les reconfigurations du travail infirmier à l'hôpital. Revue Française des affaires sociales.

Aiken, L. H., Havens D.S., Sloane D.M. (2000) The Magnet Nursing Services Recognition Program: a comparison of two groups of magnet hospitals. *American Journal of Nursing* Republished from The Magnet Nursing Services Recognition Program.

Aiken, L.H., Clarke S.P., Sloane D.M., Sochalski J., & Silber J. H. (2002) Hospital nurse staffing and patient mortality, nurse burnout, and job dissatisfaction. *JAMA*, 288(16), 1987–93.

Aiken, L.H, Sloane D.M, Bruyneel, L., Van den Heed, K., Sermeus, W. for the RN4CAST Consortium. 2013. Nurses' reports of working condition and hospital quality of care in 12 countries in Europe. *International Journal of Nursing Studies* 50 143-153.

Allard-Poesi, F., Maréchal, G. (2003), La construction de l'objet de recherche. Méthodes de recherche en management, R. A. Thiétart, Dunod, pp. 34-56

Allen, D. (2004). Re- reading nursing and re writting practice: towards an empirically based reformulation of the nursing mandate, Nursing Inquiry 11(4): 227-283.

Allen, D. (2012) *Understanding context for quality improvement: Artefacts, affordances and socio-material infrastructure.* Health , London.

Allen, D. (2014 a) Re-conceptualising holism in the contemporary nursing mandate: from individual to organisational relationships. *Social Science & Medicine* (1982), 119, 131–8.

Allen, D. (2014 b). The invisible work of nurses: hospitals, organization and healthcare. Routledge, New York.

Alter, N. (2009), *Donner et prendre. La coopération en entreprise*, Ed. La Découverte, Paris, 231 p.

Antinhao, T., Kivinen T., Turunen H. & Partanen P. (2015) Nurses' working time use-how value adding it is? *Journal of Nursing Management* 23, 1094–1105.

Arborio, A.-M. (2001), *Un Personnel invisible. Les aides-soignantes à l'hôpital*, Paris, Anthropos, Coll. Sociologiques.

Arborio, A.-M., Fournier P. (2005), L'Enquête et ses méthodes. L'observation directe, Paris, A. Colin.

Arborio, A. (2007). L'observation directe en sociologie : quelques réflexions méthodologiques à propos de travaux de recherches sur le terrain hospitalier. *Recherche en soins infirmiers*, 90,(3), 26-34.

Askin, E., Nathan Moore. (2012) *The Health Care Handbook: A Clear and Concise Guide to the United States Health Care System*, 1st Edition, Washington 230p.

Banner, L., & Olney, C. M. (2009). Automated clinical documentation: Does it allow nurses more time for patient care? *CIN: Computers, Informatics, Nursing*, 27(2), 75-81.

Becker, H.S. (1970). The nature of profession. Sociological Work. Chicago, Aldine: 87-103.

Becker, H.S. (2002). Les ficelles du métier. Comment conduire sa recherche en sciences sociales, Editions La Découverte, Paris, 353 p.

Belorgey, N. (2010) L'hopital sous pression, enquête sur le "nouveau management public", La Découverte, Paris. 336p.

Berland, Y., Henard, L., Cadet, D.(2011) Rapport relatif aux métiers en santé de niveau intermédiaire - Professionnels d'aujourd'hui et nouveaux métiers : des pistes pour avancer.

Beuscart-Zéphir, M.C., Sylvie, Pelayo, Françoise, Anceaux., J.J. Meaux, Michel, Degroisse, Patrice, Degoulet. (2005) Impact of CPOE on doctor-nurse cooperation for the medication ordering and administration process, *International Journal of Medical Informatics* 74 629-641.

Brunetto, Y., Shriberg, R, Farr-Wharton, Shacklock, K, Newman. J, Dienger. (2013) The importance of supervisor-nurse relationships, teamwork, wellbeing, affective commitment and retention of North American nurses. *Journal of Nursing Management*, 21, 827-837.

Buchan, J. (2004) What difference does "good" HRM make? *Human Resources for Health* 2 (6).

Cardona, P., Tappen, R., Terrill, M., Acosta, Eusebe, M., (1997) Nursing Staff Time Allocation in Long-Term Care: A Work Sampling Study. *Journal of Nursing Administration*, 27 (2) 28-36.

Chaboyer W Blake S (2008) Information sharing, knowledge transfer and patient safety *Nursing in Critical Care*, 13 (3) 121-123.

Chelagat D., Sum T., Obel M., Chebor A., Kiptoo R., Bundotich-Mosol P. (2013) Documentation: Historical Perspectives, Purposes, Benefits and Challenges as Faced by Nurses. *International Journal of Humanities and Social Science*, Vol. 3 No.16.

Chen, H.L. (2012) Cross-national qualitative research into the long-term care of older people: some reflections on method and methodology, *European Journal of Social Work*, 15:4, 449-466.

Claveranne, J.P (2003), L'hopital en chaniter: du management au management. *Revue française de gestion*, n°29 (146).

Crocker, C. & Timmons, S. (2009) The role of technology in critical care nursing. *Journal of Advanced Nursing* 65(1), 52–61.

Cunningham L., Kennedy J., Nwolisa F., Callard L., Wike C. (2012) *Patients Not Paperwork-Bureaucracy affecting nurses in the NHS*, Institute for Innovation and Improvement. 44 p.

Dearmon V., Roussel L., Buckner E., Mulekar M., Pomrenke B., Salas S., Mosley A., Brown S., Brown A. (2013) Transforming Care at the Bedside (TCAB): enhancing direct care and value-added care. *Journal of Nursing Management* 21 (4), 668–678.

De Chesney, M. (2016) Nursing Research Using Case Studies: Qualitative Designs and Methods in Nursing, Springer Publishing Company, New York.

Declaration d'Helsinki (2008) Retrieved from http://www.wma.net/fr/30publications/10policies/b3/17c_fr.pdf

Des Roches, C. (2008). Registered Nurses' Use of Electronic Health Records: Findings from a National Survey. *The Medscape journal of medicine*, 10, 164.

Dent, M. & Whitehead, S. (2002) *Managing Professional Identities: Knowledge, Performativity and the "New" Professional*. Routledge, London.

Derujinsky-Laguecir, A., Kern ,A., Lorino, P. (2011) *Une approche instrumentale des indicateurs de performance*. Management & Avenir n° 42, 111-132.

Diplôme d'état infirmier (2009), Annexe I, BO Santé- Protection sociale- Solidarité n° 2009/7, 258-268.

Divay, S., Gadea C. (2008) *Les cadres de santé face à la logique managériale*. Revue Française d'administration publique n°128, 667-687.

Divay, S. (2010) Les précaires du care ou les évolutions de la gestion de l'« absentéisme » dans un hôpital local. Sociétés contemporaines n°77, 87-109.

Dubar, C. (1991) La socialisation. Construction des identités sociales et professionnelles, Paris, Armand Colin, collection U, série Sociologie.

Duffiled, C, Forbes, J., New, S., Wales, S., Fallon, A., Sydney, T., South, N., & Merrick, E. T. (2005). Nursing skill and nursing time: The roles of Registered nurses. *Australian journal of advanced nursing*, 23(2).

Duffield, C., Gardner, G., Catling-Paull, C. (2008) Nursing work and the use of nursing time *Journal of Clinical Nursing* 17 (24) 3269-3274

Dujarier, M.A. (2006) *L'idéal au travail*, Presses Universitaires de France. Préface de Gaulejac .V. (de). 2006, 240p. (« Prix du Monde ») 2e édition dans la collection « Quadrige », avec un avant-propos en 2012.

Draper, D., Felland, L., Liebhaber, A., and Melichar L. (2008) The role of nurses in Hospital Quality Improvement. *Center for studying Health System Change*. Findings from HSC, N° 3, March 2008.

Estabrooks, C. Midodzi, W., Cummings ,G., Ricker, K. Giovannetti, P. (2005) The impact of hospital nursing characteristics on 30-day mortality. *Nursing research* 54 (2) 74-84.

Estryn-Behar, M. (2004) Santé, satisfaction au travail et abandon du métier de soignant, Etude PRESST-NEXT.

Fache, P., Minvielle, E., Sicotte, C., Waelli, M. (2014) Le déploiement d'une politique publique d'évaluation de la qualité par les indicateurs hospitaliers : genèse et développement du cas français *Quaderni*, 85 | 2014, 9-28.

Farquharson, B., Bell C., Johnston D., Jones M., Schofield P., Allan J., Ricketts I., Morrison K. & Johnston M. (2013) Frequency of nursing tasks in medical and surgical wards. *Journal of Nursing Management*, 21(6),

Feroni, I., Kober, A. (1995) L'autonomie des infirmières. Une comparaison France/Grande-Bretagne. In: *Sciences sociales et santé*. Volume 13, n°3, 1995. Les professions de soins : infirmières et aides-soignantes, sous la direction de Geneviève Paicheler. pp. 35-68.

Fitzgerald, M., Pearson A., Walsh K., Long L. & Heinrich N. (2003) Patterns of nursing: a review of nursing in a large metropolitan hospital. *Journal of Clinical Nursing*, 12(3), 326–32.

Flyvbjerg ,B. (2006) Five Misunderstandings About Case-Study Research. *Qualitative Inquiry*, 12(2), 219–245.

Forbes, A. While, A. (2009) The nursing contribution to chronic disease management: A discussion paper. *International Journal of Nursing Studies* 46 (1) 120-131.

Fraher, E., Spetz, J. & Naylor, M. (2015) Nursing in a Transformed Health Care System: New Roles, New Rules. Research Brief. *Penn LDI*, *interdisciplinary Nursing Quality Research Initiative*. 1-10.

Galvin, L. (2013) Disillusioned with paperwork. Lamp, 70(8), 7.

Giordano, Y. (dir.) (2003), Conduire un projet de recherche, une perspective qualitative, EMS (Ed), 318 p.

Gittell, J. H. and Weiss, L. (2004), Coordination Networks Within and Across Organizations: A Multi-level Framework. *Journal of Management Studies*, 41: 127–153.

Hammersley, M. & Atkinson P.A. (2007) *Ethnography: principles in Practice*, 3rd ed. Routledge, London.

Heinz, D. (2004) Hospital Nurse Staffing and Patient Outcomes: A review of current literature, *Dimensions of critical care nursing* 23, 1.

Healy, K. (2009) A case of mistaken identity: The social welfare professions and New Public Management. *Journal of Sociology*, 45(4), 401–418.

Heindrickson, G., Theresa M.D., & Christina T, K. (1990). How do nurses use their time. *JONA*, 20, 31–37.

Henderson, V. (1996). The nature of nursing: a definition and its implications for practice (Macmillian.). New York.

Hendrich, A., Chow, M. P., Skierczynski, B. a, & Lu, Z. (2008). A 36-hospital time and motion study: how do medical-surgical nurses spend their time? *The Permanente journal*, 12(3), 25–34.

Hendrich A., Chow M. P., Bafna S., Choudhary R., Heo, Y. & Skierczynski, B. (2009) Unit-related factors that affect nursing time with patients: spatial analysis of the time and motion study. *Herd*, 2(2), 5–20.

Hughes, E.C. (1951) Studying the nurse's work, American Journal of Nursing, (51) 311-315.

Hughes, E.C. (1956) Social Role and the Division of Labor, *Midwest Sociologist*, 17 (1) 304-310.

Hughes, E.C. (1996) Le regard sociologique, essais choisis, Ed de l'EHESS, Paris. 339p.

Hussey P. A & Kennedy M. A. (2016) Instantiating informatics in nursing practice for integrated patient centred holistic models of care: a discussion paper, *Journal of Advanced Nursing*, 72 (5) 1030-1041.

IOM. (2011) *The future of Nursing: Leading Change, Advancing Health*, Committee on the Robert Wood Johnson Foundation Initiative on the Future of Nursing, at the Institute of Medicine. Washington DC, Institut of Medicine: 620, 2011.

Joannidès, V. & Jaumier, S. (2013). De la démocratie en Amérique du Nord à l'accountability à la française: Comprendre les origines sociopolitiques de l'accountability. Revue française de gestion, 237,(8), 99-116.

De Kervasdoué, Jean. (2004) L'hopital, PUF, Paris.

Kiekkas P., Poulopoulou M., Papahatzi A., Androutsopoulou C., Maliouki M. & Prinou A. (2005) Nursing activities and use of time in the postanesthesia care unit. *Journal of Perianesthesia Nursing: Official Journal of the American Society of PeriAnesthesia Nurses*, 20(5), 311–22.

Korst, L. M., Eusebio-angeja, A. C., Chamorro, T., Aydin, C. E., & Gregory, K. D. (2003). During Implementation of an Electronic Health Record. *JONA*, *33*(1), 24–30.

Latimer, J. (2000) The conduct of Care: Understanding Nursing Practice. Oxford, blackwells.

Lawrence, P. R. and Lorsch, J. W. (1967). 'Differentiation and integration in complex organizations'. *Administrative Science Quarterly*, 12, 1–47.

Lundgren S. & Segesten K. (2001) Nurses' use of time in a medical-surgical ward with all-RN staffing. *Journal of Nursing Management*, 9(1), 13–20.

Mark et al., (2004) A longitudinal Examination of Hospital Registered Nurse Staffing and quality of care, *Health Services Research* 39, no 2; 279-300

Martin, A., Hinds, C. and Felix, M. 1999. Documentation practices of nurses in long-term care. *Journal of Clinical Nursing*. 8(4):345-352.

McDonald S. (2005) Studying actions in context: a qualitative shadowing method for organizational research. *Qualitative Research*, 5(4), 455–473.

McHugh, M., Kelly, L., Smith, H., Wu, E., Vanak J. et. al. (2013) Lower mortality in magnet hospitals. *Medical care* 51 (5) 382-8.

McKenna ,H. (1994) The Delphi technique: a worthwhile research approach for nursing? *Journal of Advanced Nursing* (6) 1221-1225.

Mills, A.J., Durepos, G., Wiebe, E. (2009) *Encyclopedia of Case Study Research* SAGE Publications, London.

Minvielle, E. (1996), Gérer la singularité à grande échelle, Revue Française de gestion, 114-124.

Minvielle, E. (2000), Réconcilier standardisation et singularité : les enjeux de l'organisation de la prise en charge des malades. *Ruptures, revue transdisciplinaire en santé*, vol 7,n°1, 8-22

Minvielle, E., Waelli, M., Sicotte C., Kimberly J. (2014). Managing customization in health care: A framework derived from the services sector literature. *Health Policy*, 117(2):216–227.

Mueth, E.C. (1999). Computer-based patient records. In Meiner, S.E. (ed.). Nursing documentation legal focus across practice settings. Thousand Oaks CA. Sage Publications: 29-39.

Moisdon, J-C. (2010) L'évaluation du changement organisationnel par l'approche de la recherche intervention. L'exemple des impacts de la T2A. Revue Française des affaires sociales n° 1-2 p.213-226.

Moloney, R. Maggs, C. A (1999) Systematic review of the relationships between written manual nursing care planning, record keeping and patient outcomes *Journal of Advanced Nursing* 30 (1) 51-57.

Morris, R., MacNeela, P., Scott A., Treacy P. & Hyde A. (2007) Reconsidering the conceptualization of nursing workload: litterature review. *Journal of Advanced Nursing* 57 (5), 463-471.

Needleman, J., Buerhaus P., Pankratz S., Leibson C., Stevens S., Harris M. (2011) Nurse Staffing and Inpatient Hospital Mortality. *The New England Journal of Medicine*, 364:1037-45.

Needleman, J., & Hassmiller, S. (2009). The role of nurses in improving hospital quality and efficiency: real- world results. *Health affairs*, 28,no.4, W625–W633.

Nicolini, D. (2009) "Zooming in and Out: Studying Practices By Switching Theoretical Lenses And Trailing Connections". Organization Studies, 30(12), pp. 1391-1418.

OECD (2015). Health at a Glance 2015: OECD Indicators. (OECD Publishing, Paris). doi: http://dx.doi.org/10.1787/health glance-2015-en

Pabst, M., Scherubel, J., Minnick F., (1996). The impact of computerized documentation on Nurses' Use of time, *Computer in Nursing*, Vol 14, n1, 25-30.

Papastavrou, E., Efstathiou, G., Tsangari, H., Suhonen, R., Leino-Kilpi, H et. al. (2012) Patients' and nurses' perceptions of respect and human presence through caring behaviours: A comparative study. *Nursing Ethics* 19 (3) 369-379

Pelletier, D., Duffield, C. (2003) Work sampling: valuable methodology to define nursing practice patterns. *Nursing & health sciences* (1) 31-8

Peneff, J. (2004) Enquêter à l'hôpital, in Ch. Amourous (Dir.), Que faire de l'hôpital? Paris L'Harmattan, pp. 351-369.

Peneff, J. (1995) Mesure et contrôle des observations dans le travail de terrain. L'exemple des professions de service, *Sociétés contemporaines*, n° 21, p. 119-138.

Peneff, J. (1992), *L'Hôpital en urgence. Etude par observation participante*, Paris, A.-M. Métailié, Coll. «Leçon de choses».

Pelletier, D., Duffield, C., Donoghue, J. (2005) Documentation and the transfer of clinical information in two aged care settings. *The Australian Journal of Advanced Nursing: A Quarterly Publication of the Royal Australian Nursing Federation*, 22(4), 40–5.

Petit dit Dariel, O., Waelli, M., & Rickets, T. (2014) France's transition into academia: the theory – practice gap. *Journal of Nursing Education and Practice*. 4(10), 88-100.

Poghosyan, L., Clarke, S. P., Finlayson, M., & Aiken, L. H. (2010). Nurse Burnout and Quality of Care: Cross-National Investigation in Six Countries. *Research in Nursing & Health*, 33(4), 288–298.

Porter, M., Lee T. (2013). The strategy that will fix health care. *Harvard Business Review*, 91(10): 50–70.

Rafferty, A., Clarke, S., Coles, J., Ball, J., James, P et. al. (2007) Outcomes of variation in hospital nurse staffing in English hospitals: Cross-sectional analysis of survey data and discharge records; *International Journal of Nursing Studies* 44 (2)175-182.

Raveyre M. Ughetto P, Le travail part oubliée des restructurations hospitalières, Recomposer l'offre hospitalière, *Revue française des affaires sociales*, n°3, juillet-septembre 2003, p97-119

Rothier Bautzer, É. (2014). *Care* et profession infirmière. *Recherche & formation*, 76,(2), 93-106.

Royal College of Nursing. (2013) *Nurses spend 2.5 million hours a week on paperwork* - RCN survey. RCN, London.

Sainsaulieu, I. (2003) Le malaise des soignants : Le travail sous pression à l'hôpital, l'Harmattan, Paris 240 p.

Seago, J. (2001) Nurse staffing, models of care delivery and interventions, Making health care safer, A critical analysis of Patient Safety Practices, ed K.G Shojania et al. Rockville, Md: Agency for Healthcare research and quality.

Simpson, K., Lyndon, A., Wilson, J., Ruhl, C. (2012) Nurses' Perceptions of Critical Issues Requiring Consideration in the Development of Guidelines for Professional Registered Nurse Staffing for Perinatal Units. *Journal of Obstetric, Gynecologic & Neonatal Nursing* 41 (4) 474-482

Strauss, A. & Corbin, J. (1990) Basics of Qualitative Research: Grounded Theory Procedures and Techniques. Sage, Newbury Park, CA.

Strudwick, G., McGillis, Hall, L. (2015) Nurses acceptance of electronic health record technology: a literature review. *Journal of Research in Nursing*, 20 (7) 596-607.

Sullivan, G. 2000. Keep your charting on course. RN. 63(5):75-80.

Topol, E. (2012) The Creative Destruction of Medicine: How the Digital Revolution Will Create Better Health Care Basic Books, New York 336p.

Tyler D. A., Parker V. A., Engle R. L., Brandeis G. H., Hickey E. C., Rosen A. K., Wang Fei., Berlowitz, D. R. (2006) An exploration of job design in long-term care facilities and its effect on nursing employee satisfaction. *Health Care Management Review*, 31(2), 137–44.

Urden, L.D. and Roode, J.L. 1997. Work sampling: A decision-making tool for determining resources and work redesign. *Journal of Nursing Administration*. 27(9):34-41.

Vega, A. (2000) *Une ethnologue à l'hôpital, l'ambiguïté du quotidien infirmier*, Editions des Archives Contemporaines, Paris, 213 p.

Wacheux, F. (1996), *Méthodes Qualitatives et Recherche en Gestion*, Ed. Economica, Paris, 290 p.

Watts, M .D. (2010) Certification and Clinical Ladder as the Impetus for Professional Development *Critical Care Nursing Quarterly* 33 (1) 52–59

Westbrook, J. I., Duffield, C., Li L., & Creswick, N. J. (2011) How much time do nurses have for patients? A longitudinal study quantifying hospital nurses' patterns of task time distribution and interactions with health professionals. *BMC Health Services Research*, 11(1), 319.

White, D.E., Jackson K., Besner J. & Norris J.M. (2015) The examination of nursing work through a role accountability framework, *Journal of Nursing Management* 23, 604–612.

Windle, P.E. 1994. Critical pathways: An integrated documentation tool. *Nursing Management*. 25(9):80F-80P.

Wise, W., Duffield, C. (2003) Tell me what we do. Using work sampling to find the answer (2003) *Australian Journal of Advanced Nursing*, 20,(3) Mar-May: 19-23.

Wright, M.J, K. Frey, J. Scherer, D. Hilton. (2006). Maintaining excellence in physician nurse communication with CPOE: A nursing informatics team approach. *Journal of Healthcare Information Management* 20 (2) 65-70.

Yin, R.K. (1994), Case study Research. Design and Méthods, Sage Production Editor, Thousand Oaks, 170 p.

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Appendix 1 Article 1, JHPPL 2017.

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Beneath the Surface
A Failure to Communicate? Doctors and Nurses in
American Hospitals

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Abstract This essay showcases the realities and challenges of teamwork in American hospitals based on the in situ comparison with France. Drawing on observation of nurse- physician interactions in hospitals in the two nations, this article highlights a trou- bling conflict between teamwork rhetoric and realities on the ward. Although the use of informatics systems such as electronic health records is supposed to increase cooper- ation, the observations presented here show that on the contrary, it inhibits communi- cation that is becoming mainly virtual. While the nursing profession is more developed and provides stronger education in the United States, this story highlights the challenges in creating a shared environment of work and suggests the importance of balancing professional autonomy and effective teamwork.

Keywords teamwork, doctors and nurses, comparative study, ethnography

Reliable teamwork and human resources management is often described as an indispensable element of superior health system performance (Buchan 2004). Several studies have highlighted the importance of an effective relationship between physicians and nurses for patient safety, care quality, and nurses' satisfaction (Brunetto et al. 2013). Others have documented serious problems linked to missed communications— for example, the Joint Commission (2012) reported that nearly two-thirds of sentinel events had their root cause in communication failure. The RN4CAST, a major

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study including twelve European countries, found a sizable proportion of nurses reporting that teamwork with physicians was not evident (Aiken et al. 2013). Yet few studies have taken a close empirical look at relations between nurses and physicians.

I have spent four years shadowing French and American nurses, one at a time, during their daily shifts and then interviewing them afterward to explore their perception of their documentation and administrative duties. But while I was getting used to setting my alarm clock for 5:00 a.m. and feeling ugly in the ill-fitting blue scrubs, I discovered something I had not expected, namely, that the French-American differences in nurses' daily life and their interaction with physicians illuminate how these systems promote or inhibit the quality of care. Drawing on observation of nurse-physician interactions in hospitals in the two nations, this article highlights a troubling conflict between teamwork rhetoric and realities on the ward. Although the use of informatics systems such as electronic health records is supposed to increase cooperation, the observations pre- sented here show that, on the contrary, they can inhibit communication that is becoming mainly virtual.

In 2013 I began my fieldwork in a hospital in New York City in four different departments. That was followed by an observational study of the Medical Intensive Care Unit (MICU), geriatric, and oncology ser- vices in French hospitals. In the following year I returned to the United States, this time to the South, to shadow nurses in the same three units that I had observed in France. In all, I shadowed and interviewed more than sixty nurses.

Entering the World of Nursing

On a bright cold day in March, I landed in North Carolina. It was time for me to wear scrubs again. Eager to start my fieldwork, I had, alas, neglected the importance of American bureaucracy. France is well known for its bureaucratic tendencies, but research-wise the USA takes the cake! After addressing a long list of questions posed by the Ethical Review Board to determine whether or not there were "Human Subjects" in my research, I was asked by the board to precisely "describe my efforts to ensure equal access to participation among women." I wonder if they had even read my application. . . . After much back and forth with the board, my IRB application was finally accepted and I was ready to get to work. But there remained a background check, a Tuberculosis test, a drug screening test, a flu shot . . . and after all that, my project still had to be approved by the

Nursing Research Council, which must okay any research involving nurses in the hospital—as if the IRB were not protection enough.

From these various bureaucratic preliminaries I learned that research "involving" nurses is often not "about" nurses. Indeed, I found to my sur- prise that few researchers are interested in nurses themselves, in their work environment, or in their professional evolution. Instead, I kept hearing about "patient safety," "evidence-based management," "critical thinking," "leadership," and of course the ubiquitous "teamwork."

Two months after I arrived, I finally collected my shiny red badge with the inscription "shadow visitor" and resumed my lonely inquiry into the way nurses actually work.

The Mystery of the Missing Physicians

After two months in the field, I woke up in the middle of the night thinking, "Wait a minute, have I even spoken with a physician since I arrived?" and the answer was a definite "No." I had been shadowing nurses for more than 300 hours, but I had never had any interaction with someone in a "white coat." Shocked, I dug deeply into my memory and tried to visualize the moments I spent in each unit, but it was clear that I had never spoken with a physician in my time in the United States, either in North Carolina or in New York.

I found this especially puzzling because in these recently renovated hospitals the design of the unit creates close physical proximity between nurses and physicians. While in the old French hospitals the

physicians' offices are usually outside the unit, separated by a heavy door, in the North Carolina hospital their offices were next to the nurses' station, separated only by a big window. I could see them, but was it really possible that I had never spoken with them? In France I spoke daily with all the doctors. They knew my name and why I was there, they inquired about my work and interacted with me, and more important, they were in constant direct interaction with the nurses.

The next day I meticulously reread my fieldwork diaries from both my French and American experiences, trying to understand this puzzle. I could see at once that it was not a question of scale: the hospitals where I worked are the same size and the number of beds in each unit is similar. Interest-ingly enough, all the elements I depict below are based on my experience in North Carolina, but they completely apply to the observation I made in New York.

A Strong Nursing Hierarchy

I found my first answer by analyzing how I accessed the units in France and the United States. In France, before starting fieldwork, I would meet with the physician and the nurses' manager, together in each unit. I pre- sented my project and they agreed to welcome me. On every first day, the nurse manager introduced me to the entire team: medical secretaries, nurse assistants, nurses, residents—and physicians.

After a day or two in the French settings people are saying "Bonjour Mademoiselle" each time I run into them, and some physicians inquire how my research is going. Naturally, I have been invited to the physician staff meetings, so I can "understand all the dynamics of the unit." Each time I went to a meeting I was briefly introduced by a physician, and I would sit at the table with the whole group.

Pondering these experiences, I realized that things are very different in North Carolina and New York. There the nursing council approved my research, and I met with each nurse manager. All of them agreed to wel- come me into their units and took responsibility for my experience. On my first day, the nurse manager usually gave me a tour of the unit so I could orient myself. But I was introduced only to the nurses— never to the administrative support, nurse assistants, or the physicians, who were usu-ally right there in their offices. It never seemed to occur to anyone that the physicians would be interested in this research, taking place under their noses. I concluded that the difference with France derives from a stronger nursing hierarchy in the United States, and I wonder whether these parallel and somewhat rigid hierarchies between physicians and nurses may not discourage fluid communication.

Computerization versus Communication

I found a second distinction when I began to look at the impact of computerization. My research centers on nurses' documentation of quality indicators, and I am familiar with the effects of informatics and electronic health records on nurses' daily activities. In both countries nurses chart on the computer, but in France the amount of charting is lighter, and the computer system is less developed than EPIC, the program nurses use in North Carolina. More important, in the United States the computer has become a tool not only of documentation but also of communication. Whereas in France the resident would call the nurse or stop by the station to say "I put in an order for Mr. X," here the nurse finds the orders on her

"work list" and goes from there. Take the example of a nurse in the North Carolina Medical Intensive Care Unit; we will give her the name "Brea" for confidentiality purposes. Here are my notes from one day:

I am shadowing Brea this morning. It's 7:40 a.m., a new patient arrives from a small hospital upstate. The respiratory therapist comes and checks how he is breathing; she installs a CPAP ventilation device. Two other nurses come to assist Brea; they take off his clothes, help him into bed, and make sure he is ok. They run an EKG, not waiting for the physician to write an order. Brea does a very detailed admission on the computer.

A resident steps in at 8:00 a.m. She briefly opens the curtain and from the threshold asks in quick sequence: "Do you know where you are? Who is the president of the United States? Are you in pain?" The patient answered with a brief "I am at the hospital, the president is Obama, and right now I am not in pain." The resident closes the curtain and leaves. Brea tells me that she had never met her, she is a new resident. Neither of them has introduced herself to the other. Brea completes the assessment on EPIC—the computerized health record—and a few minutes later she sees a red dot on her screen. That's how she knows the physician has entered an order. So she clicks and discovers a huge list of orders. There are different orders from different doctors; she knows only one of them. She is concerned because the prescribed medications are to be taken orally. The patient is on CPAP and has real difficulty breathing, so she doesn't want to take the responsibility of giving him the meds.

She is concerned when looking at the monitor and at his belly, and she feels that he will need to be intubated. One physician has sent orders, but it is for the wrong patient. She is annoyed. She sends a text via the physician's pager: "Dr. T, the order seems to be for Mr. X, thx, Brea." She is very nervous, and she steps in to check the monitor every five minutes. She sends another text to the resident. "Patient not breathing well, concern, thx, Brea." She calls the respiratory therapist, who is out of the unit—she can only come later.

10:15 a.m.: Since the resident's visit no other physician has come. But Brea has received new orders. She is upset and doesn't understand why they keep prescribing oral meds. The electronic drawers of the pharmacy are not functioning so she can't give any meds yet. The patient is not breathing well at all. She finally decides to go to the physician's office and talk to the resident. She crosses the big hallway toward the office. The physicians are rounding, and by the time she returns, her colleague

has already called in an emergency response: it's a "code blue." Now the physicians are running to see the patient and speak with Brea. Thank-fully, the patient survived.

Afterward I had the chance to speak again with "Brea" in an interview. She assured me that such an event was infrequent, adding that "July is the first rotation for residents so it's not the best time." Perhaps what I witnessed was just an isolated incident on a bad day, but during my previous research in New York, concerns about missed communications because of the computer had been raised by several nurses. One of them said during an interview: "Because of the computer, the doctors don't always talk to you, they send the order online, it makes the work worse, there is no more communication." When I compared these examples to what I saw in the French MICU, I inferred that, at least in these New York and North Carolina hospitals, the computer and the pager are becoming the principal tools with which health care workers choose to communicate. As a nurse told me, "I feel more comfortable writing to the physician. I feel shy when I speak with him directly." But texting may not be so reliable, especially when, as often happens, nurses don't get an answer. In one department in New York and in another in North Carolina I observed the same thing: the nurses copy and post, as a "nursing note," the messages they send to physicians. It took me time to understand why: they are so used to never hearing back from the physicians that they keep a record to protect themselves. This problem has been documented in the literature, especially in studies about the computerized physician order entry (CPOE), which has been shown to have a negative effect on doctor-nurse communication (Beuscart-Zéphir et al. 2005; Wright et al. 2006). Authors often blame the technology itself (Khajouei and Jaspers 2010; Pirnejad et al. 2008). More research could be useful by probing more thoroughly how the relationship between doctors and nurses is evolving under the growing influence of computer systems.

The Rapid Turnover of Residents in Medicine

My third proposition about differences between the two "cultures" occur- red when I observed the training of physicians. In France, a resident does several long internships, each of them lasting at least a semester. The residents have time to get well acquainted with the unit they are working in and to get used to its patterns. The nurses come to know residents very well, and I felt this proximity when I was shadowing them. Residents commonly

ask nurses for advice, and the nurses sometimes jokingly call them "babies." After I spent a week in oncology the residents would call me by my name and ask about my research because "we are a team." In the American hospitals the residents switched to a new unit every three weeks, and amid this rapid turnover, nurses sometimes got confused about whom they were working with. One nurse commented, "Last week I spoke with Mike, he is a resident in team A, family medicine. So today I went to see him to talk about a patient but now he is in team B. It's really confusing, and you know what, in two weeks he will be gone."

These and similar quotations reinforce the feeling I had while shadowing the nurses. There are so many physicians who come from so many spe-cialties that it is difficult to figure out who does what, and the constant turnover discourages nurses and physicians from building strong relation-ships, either as professionals or as any other kind of team. In this respect, the norms of medical training seem to be at odds with the teamwork and team building that "integrative" reforms emphasize so heavily.

Coffee, Croissants, and Communication

My fourth and final observation concerns the interplay between profes- sional and cultural differences. In France, we are well known for our love of croissants and our long coffee breaks. This stereotype is not mistaken and could be easily observed in the French hospitals where I worked. In each unit I visited, the break room was open to everybody. It was customary to sit down to have coffee together—doctors, nurses, and other staff. Even if time is very limited, this is a setting where nurses' assistants, secretaries, nurses, residents, and sometimes the attending physicians and fellows stop by to take a little break with each other. It is during these breaks that (for instance) a nurse in long term care liked to "take the temperature" of what happened the previous day while she was off. It is where the resident in medicine comes to inquire about the family history of a lonely patient, and where nurse managers give informal feedback about the last institutional meeting. Those clinical professionals and their coworkers can share a place in which to laugh, chat, and express themselves freely. It is, I believe, a valuable resource for communication and team building. In the United States, I have yet to see anything like it. Of course, you sometimes find a big bag of donuts a physician has offered to the team. But everyone tends to take the donuts and eat them in front of their screens, looking at Facebook while drinking a huge, very un-French coffee.

The Need for Policies to Promote a Culture of Sharing

I found answers to my question about what was different in the lives of French and US nurses by observing the everyday activities of different hospital units in the two countries. My aim here is not to offer a critique of the American system but rather to highlight an intriguing question about the structure of both systems. When I entered the world of nursing research in the United States, I heard many hopeful plans about how the profession might grow and how nurses should team up with physicians to deliver better and safer care. In France, meanwhile, advanced degrees in nursing are not offered, which presents us with a paradox. In the United States, where nurses benefit from a chance to pursue master's and doctoral education, the cultural and organizational walls separating them from medical doctors within hospitals is stronger than it is in France, where nursing remains a "lesser" profession—at least as judged by educational opportunities. Universities and hospitals should confront this paradox: professional autonomy should not be the enemy of effective teamwork. The relations between doctors and nurses should also stand higher on the research agenda of health policy experts looking for strategies by which health care systems can improve. Common training for students in nursing and in medicine has been proposed as a first step toward promoting a culture of teamwork, but my observations suggest that the barriers to cooperation are far more significant than proponents of greater teamwork may realize.

n n

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References

Aiken, Linda, Douglas M. Sloane, Luk Bruyneel, Koen Van den Heede, and Walter Sermeus. 2013. "Nurses' Reports of Working Conditions and Hospital Quality of Care in 12 Countries in Europe." *International Journal of Nursing Studies* 50, no. 2: 143–53.

Beuscart-Zéphir, Marie Catherine, Sylvie Pelayo, Françoise Anceaux., Jean-Jacques Meaux, Michel Degroisse, and Patrice Degoulet. 2005. "Impact of CPOE on Doctor- Nurse Cooperation for the Medication Ordering and Administration Process." *International Journal of Medical Informatics* 74, no. 7–8: 629–41.

Brunetto, Yvonne, Art Shriberg, Rod Farr-Wharton, Kate Shacklock, Stefanie New- man, and Joy Dienger. 2013. "The Importance of Supervisor-Nurse Relationships, Teamwork, Wellbeing, Affective Commitment and Retention of North American Nurses." *Journal of Nursing Management* 21, no. 6: 827–37.

Buchan, James. 2004. "What Difference Does ('Good') HRM Make?" Human Resources for Health 2, no. 1: 6.

Khajouei, Reza, and Monique Jaspers. 2010. "The Impact of CPOE Medication Systems' Design Aspects on Usability, Workflow and Medication Orders." *Meth- ods of Information in Medicine* 49, no. 1: 3–19.

Pirnejad, Habibollah, Zahra Niazkhani, Heleen van der Sijs, Marc Berg, and Roland Bal. 2008. "Impact of a Computerized Physician Order Entry System on Nurse- Physician Collaboration in the Medication Process." International Journal of Med-ical Informatics 77, no. 11: 735–44.

Joint Commission. 2012. "Sentinel Events Statistics for 2011." Joint Commission Perspectives 32, no. 5.

Wright Marie J. Wright, Keith Frey, Jeffery Scherer, and Debra Hilton. 2006. "Maintaining Excellence in Physician Nurse Communication with CPOE: A Nur- sing Informatics Team Approach." *Journal of Healthcare Information Management* 20, no. 2: 65–70.

Appendix 2 Article 2, JAN 2017

The Content and Meaning of Administrative Work: A qualitative study of Nursing Practices.

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The Content and Meaning of Administrative Work: A qualitative study of Nursing Practices.

Aim: To investigate the content and meaning of nurses' administrative work.

Background: Nurses often report that administrative work keeps them away from bedside care. The content and meaning of this work remains insufficiently explored.

Design: Comparative case studies.

Method: The investigation took place in 2014. It was based on 254 hours of observations and 27 interviews with nurses and staff in two contrasting units: intensive care and long term care. A time and motion study was also performed over a period of 96 hours.

Results: Documentation and Organizational Activities is composed of 6 categories; documenting the patient record, coordination, management of patient flow, transmission of information, reporting quality indicators, ordering supplies-stock management Equal amounts of time were spent on these activities in each case. Nurses did not express complaints about documentation in intensive care, whereas they reported feeling frustrated by it in long term care. These differences reflected the extent to which these activities could be integrated into nurses' clinical work, and this is in turn was related to a number of factors: staff ratios, informatics, and relevance to nursing work.

Conclusion: Documentation and Organizational Activities are a main component of care. The meaning nurses attribute to them is dependent on organizational context. These activities are often perceived as competing with bedside care, but this does not have to be the case. The challenge for managers is to fully integrate them into nursing practice. Results also suggest that nurses' Documentation and Organizational Activities should be incorporated into informatics strategies.

Keywords: nurses, administrative work, documentation, perception, activity timing.

Summary Statement

Why is this research needed?

- A great deal of nurses' work is composed of administrative and organizing work, essential for the process of care.
- Nurses express the feeling of being frustrated by the increasing time spent on so-called "administrative work".
- The content of this "administrative work" and why it is considered a burden remains insufficiently explored.
 Studying nurses' activities and perceptions in different wards enables us to better understand the organizational factors influencing nursing practices and perceptions.

What are the key findings?

- Nurses' administrative work is composed of six primary categories: documenting the patient record, coordination
 of activities and examinations/investigations, management of patient flow, transmission of information, tracking
 and reporting quality indicators, ordering supplies and stock management.
- Both units spent an equal amount of time on Documentation and Organizational Activities, but the work had different meaning for nurses.
- The meaning of Documentation and Organizational Activities reflects not only the time spent on these activities but their integration with nurses' work in the local context of care.
- Staff ratios, effective use of electronic health information systems, and the relevance of Documentation and
 Organizational Activities to nursing work are factors facilitating the integration of administrative tasks into
 practice.

How should the findings be used to influence policy/practice?

- The findings suggest that hospital and nursing managers should focus on contextual factors in order to integrate
 Documentation and Organizational Activities into practice.
- Nurses' Documentation and Organizational Activities should be incorporated into the design of informatics strategies, to provide greater professional input and influence over this work.

Introduction

"Disillusioned with paperwork" (Galvin 2013), "Nurses drowning in sea of paperwork" (Royal College of Nursing 2013). Recent publications highlight the negative perception of time spent by nurses on "administrative work". These concerns may be warranted given that complex admission and discharge forms, risk assessments, policy documents, audits and evaluation sheets are now part of a nurse's daily routine. The rising demands for accountability, efficiency, safety and

quality in health care also explain increased administrative activity and its negative perception (Healy 2009; Dent & Whitehead 2002). Such administrative tasks are often perceived as not directly relating to care and as preventing nurses from interacting with their patients (Tyler *et al.* 2006). In this evolving context, what qualifies as "administrative work", its relationship to the wider nursing role and where/when/why it is considered a "burden" remains insufficiently explored (Allen 2014 a).

Background

Morris *et al.* (2007) explain that nursing work is too often described in simplistic and sometimes contradictory ways. According to them, "It is acknowledged among experts in the field of nursing that difficulties exist in articulating and describing nursing work in sufficient detail" (p. 470). If the work of nurses is not sufficiently explored, it is also because research tends to focus on direct time spent at the bedside (Dearmon et al., 2013; Antinaho et al. 2015). Thus, what nurses call administrative work is poorly described in the literature, portrayed only as a distraction from nurses' real work of patient care, rather than as the primary focus of research (Allen 2004).

Since the 1990s, several studies focusing on nurses' perception of their work have reflected this dominant frame; their results primarily concerned with the burdensome nature of administrative work and, in particular, the increasing time spent on documentation (Pelletier *et al.* 2005; Fitzgerald *et al.* 2003). Nurses regularly report feeling pressure to spend excessive amounts of time on so-called "non-nursing" activities, while simultaneously being criticized for not spending enough time with patients (Lundgren & Segesten, 2001). Several studies have also shown a link between nurses' reduced patient-contact time and a rise in harmful events, patient mortality (Aiken *et al.* 2002) and decreased patient satisfaction (Westbrook *et al.* 2011).

In conjunction with these researches stressing the burden of administrative work, there are a number of studies calculating nurses' time management, using Work-sampling or Time and Motion methods, which reveal a rise in nurses' general administrative duties (Fitzgerald *et al.* 2003; Hendrich *et al.* 2009). Moreover, several authors demonstrate that the time spent on documentation is internationally proportionate: 10% of nurses' time is spent doing paperwork in Britain (Farquharson *et al.* 2013), 9.3% in Greece (Kiekkas *et al.* 2005), and 13% in Australia (Fitzgerald *et al.* 2003). A lack of precision regarding the definitions and categories of nursing administrative and organizational duties limits the value of this work. For example, some classify nurses' administrative work only as "indirect activity," whereas others include it as part of the direct patient documentation (Lundgren & Segensten 2001).

While nursing literature shows an increasing time spent on documentation and nurses' negative perception of it, the content of what qualifies as administrative work is poorly described. Furthermore, such analyses are wedded to a very particular view of the nursing function, expressed in terms of nurses' direct care for patients. Sociologically informed analyses have underlined the need to move beyond research predicated on essentialist assumptions about the 'true' work of nurses, and have focused instead on the work that nurses actually do. Allen (2014b), for example, has advanced this agenda with an in-depth description and analysis of hospital nurses' organizing work, then building on this analysis to marshal an argument for expanding "patient-centered" formulations of nursing to include "organizing work". This research highlights the administrative and organizational elements of nursing roles and has opened up important debates about the future of nursing. We build on this work to examine the difference between the perception and reality of nurses' administrative work in two different contexts of activity.

Aims

This study aimed to explore the content of nurses' increasing administrative work and its perception by nurses, according to local contexts. The two intermediary objectives are:

- To compare nurses' perceptions of their administrative work in two different wards
- To compare nurses' perception of administrative work to the reality of their practice

Method

Design

The research utilized a "comparative case study" design in two hospital wards: Intensive Care (ICU) and geriatric long-term care (LTC). Using case studies is a powerful tool to examine the organizational systems of nursing work (De Chesney 2016). According to Yin (2009), the case study is an "in depth" empirical inquiry into a phenomenon "within its real life context". This method derives its strength from "multiple sources of evidence" such as documentation, interviews and direct observations. The comparison of case studies enables the identification of similarities and differences across sites, producing concrete and context-dependent knowledge (Flyvbjerg 2006). Furthermore, to deeply understand the dynamics of singular settings, we used what Flybjerg calls "polar cases". Such polar types lead to cross-case thematic analyses of their contrasting natures (Mills *et al.* 2009) and reveal phenomena that may not have been seen by comparing similar cases.

The Field

This study took place between January and December 2014. An intensive care unit (ICU) and a geriatric long-term care unit (LTC) in two French hospitals were selected as relevant polar cases. In general, ICUs tend to have a high nurse-to-patient ratio (1:3) while LTC units have a much lower ratio (1:40).

The first investigation took place in a 30-bed ICU at a large teaching hospital with a team of 20 day-shift nurses. The department cares for patients with very serious conditions, often requiring respiratory assistance and depend on medical and nursing care. ICU nurses provide intensive technical care and respond quickly to emergencies.

The second investigation took place in a 40-bed LTC unit with a team of 5 day-shift nurses who provide end-of-life nursing care. LTC nurses mainly focus on comfort care and often provide relational and emotional assistance to patients and their families. In both units, nurses generate documentation and undertake communication using both pen and paper, and Electronic Health Records (EHR).

Participants

Nurses were the principal participants in this study. The following inclusion criteria had to be fulfilled: having a French diploma in nursing and having been with the unit for more than 6 months (newly hired nurses are still in orientation and may be disturbed by the presence of a researcher shadowing them). The sample included 15 nurses in the ICU and 5 in LTC (See table 1).

The disparity in the number of nurses participating in the study can be explained by the ratio of nurses in each unit. In LTC, the number of nurses working the day shift was six. Five of them took part in the study, the sixth being on sick leave at the time of data collection. The ICU was composed of twenty nurses during the study, fifteen of which participated, while the five others were either newly hired or on vacation. The nurses' managers and head physicians were interviewed in both units, in order to answer questions about the general organization of the wards. In total, 20 nurses were shadowed and interviewed and 7 interviews were conducted with nurse managers and head physicians.

Data collection

In order to obtain multiple sources of evidence, three methods of data collection were employed: shadowing, semistructured interviews and measuring the time spent on particular activities.

Shadowing

The PI (principal investigator), LM, shadowed each of the 20 nurses (15 in ICU and 5 in LTC) during their daily shifts and took low-inference descriptive hand-written notes of situations and discussions in a notebook (McDonald 2005). No shadowing was performed during night shifts. The daily shadowing included all activities undertaken by staff nurses

during their shift, with a particular emphasis on indirect care activities involving handwriting or Electronic Health Records, but also all team interactions and communication. Systematic field notes were recorded and organized into two main categories: the objective, low-inference, description of nurses' daily activities (taking notes on what nurses were doing without interpretation) and researcher interpretations of these observations (documenting personal comments on the meaning of the data). This enabled the principal investigator (LM) to retain a critical distance from the data and its interpretation (Hammersley & Atkinson 2007). The result was 254 hours of detailed documentation of nurses' activities, discussions and situations in the two wards (160 hours in the ICU and 94 hours in LTC). The notes were to be analyzed later and formed the basis for the themes discussed during interviews.

Interviews

The PI also conducted 20 semi-structured and audiorecorded interviews with each of the shadowed nurses. An interview guide was developed, based on different themes that had emerged during shadowing. These themes helped to keep a focus on the aim of the study, i.e. "what is nurses' administrative work and how do nurses perceive and understand such work", while creating space for in-depth conversation. The themes discussed were, for instance: describing daily routines, defining administrative work, the content of specific tasks, general perceptions of administrative activities and more precise opinions of observed situations, etc. In addition, seven semi-structured interviews were conducted with chief nurses and physicians. These interviews aimed at collecting data about the general organization of the ward. All audio files were anonymized and transcribed by the PI. All names in interviews and fieldwork descriptions were changed.

Time and Motion Study

The initial classification of activities needed for the time and motion study is based on the French national reference on nurses' activities, created by the Ministry of Health in 2009. This referral (Diplôme d'Etat Infirmier 2009) was used as a basis for this study and was compared to international literature. The simplified classification is composed of 39 activities (**see table 2**); these activities appeared to be similar to a recent study (Antinaho *et al.* 2015).

Based on the data generated through shadowing observations and interviews, and after discussions with the research team, 10 of the 39 activities were selected as administrative tasks. To ensure the validity of this selection, the 10 activities were then discussed and validated during a focus group facilitated by LM and MW, gathering nurses, nurses' managers and an expert in the field of clinical nursing. Overall, the focus group produced slight modifications in wording the definition of each category and some activities were merged together, creating the final classification of 6 Documentation and Organizational Activities (DOA) (See table 3 in Findings).

The PI followed one nurse at a time with a stopwatch in order to measure the time taken by each task. When a new activity began, the time was noted and the activity described. Although the possibility of performing several tasks at once was included, it rarely occurred. Eight nurses (four in each unit) took part in this phase. In the ICU, nurses worked 12-hour shifts. Each shift was divided into two 6-hour sections to allow more precise data collection. The PI spent one morning (from 7.30 am to 1.30 pm) and one afternoon (1.30 pm to 7.00 pm) with each nurse. In LTC, the PI spent an entire day with each nurse (from 6.45 am to 2.30 pm). A total of 96 hours was spent on time and motion recording of activities.

Ethical considerations

The research received ethical approval from the Center for Human Research-MSHB, which funded the study. It was performed in compliance with the ethical guidelines of the Declaration of Helsinki (2008). The data presented in this article are part of a bigger cross-national study comparing France and the USA. The American fieldwork was approved by the Ethical Committee of the University of North Carolina at Chapel Hill (IRB N°16-0619). The researcher was sensitive to issues of confidentiality, conducting interviews in private offices. Providing a comfortable and informal setting also allowed to introduce the project to individual nurses and to gather consent prior to the beginning of the work. Patients were also

directly notified by nurses of the presence of a researcher.

Data analysis

This analysis relied on qualitative inductive reasoning and the triangulation of data. Data sampling and data analysis were conducted until it was possible to describe and understand the perception and content of administrative activities, according to the principle of data saturation.

First, field notes and interview transcripts were read as a whole and coded phrases were stored using qualitative data analysis software (Max-Qda 11). In this first phase, data were read with the research question in mind - nurses' perception of their administrative activities. Special attention was paid to identify meaningful themes reflecting nurses' opinions (such as: the burdensome nature of activities, utility, time taken, etc....) via inductive analysis.

The data collected during the time and motion phase were then analyzed and calculated manually using Microsoft Excel. For each category, various activities were recorded, then grouped and time-calculated.

The final step was to triangulate the data. Field notes and interview transcripts were read once again, in light of findings from the time and motion study. The specific aim was to analyze the data more closely, looking at each activity in detail and creating codes for each one: time spent, nurses' perceptions, content, and precise descriptions of each task.

The interviews were conducted in French. Quotes have been translated from French to English under the supervision of an external bilingual researcher.

Rigor

First, through a process of reflexivity, the PI regularly turned back onto herself in order to examine the relationship between the knower and what is known. The methodology allowed the PI to participate in practices by observing and recording this involvement through reflective field notes (Hammersley & Atkinson 2007). Second, the research was conducted by one person, ensuring the consistency of the data collected in both cases (Chen 2012). Finally, the validity of the data collection, analysis and conclusions was enhanced by the input of three senior researchers (MW, EM, DA).

Findings

Frame and timing of Documentation and Organizational Activities

Results from this study indicate that Documentation and Organizational Activities (DOA) consist of six primary categories: documenting the patient record, coordination of activities and examinations/investigations, management of patient flow, transmission of information, tracking and reporting quality indicators, ordering supplies and stock management (See Table 3). Similar amounts of time are spent conducting administrative activities in both the ICU (35.4%) and in LTC (33.6%), but the percentage of time spent on particular activities varies by unit (See Table 4). The time nurses spent documenting patient records in the ICU (14.1%) was almost four times that of the LTC unit (3.6%). In both units, nurses spent a sizable amount of time on the coordination of activities and examinations/investigations (8.6% in the ICU and 7.8% in LTC), but the time spent on the transmission of information in LTC was nearly twice that of the ICU (9% vs. 4.7% respectively). The same trend was observed in the ordering of supplies and stock management; nurses in LTC spend 7.8% of their administrative activities maintaining supplies, compared to 4.1% for ICU nurses. Lastly, LTC nurses more frequently managed patient flow (2.6%) than those in the ICU (1.3%), but nurses in both units spent similar amounts of time reporting quality indicators (2.6% in the ICU vs. 2.8% in LTC).

Differences in perceptions and meaning

Even though the time spent on DOA was similar in both cases, there were notable differences between the two units in terms of the meaning of this work for the nurses. ICU nurses did not seem to view their administrative responsibilities negatively. One nurse remarked that:

"We have so little administrative work to do that, um, I don't know. Anyway, it doesn't bother me." (ICU nurse for 6 years, interview n° 10)

These nurses tended to use the terms "documenting" or "reporting", to describe their administrative work, and they considered it "part of the job". This concept was made apparent by an ICU nurse who explained:

"Care is a whole process; it's before, during and after, and the after part is the reporting." (ICU nurse for 10 years, interview n° 3)

Other nurses described it as integral to the practice; one even declared that the documentation she has to fill out "helps to see what I have to do and how the patient is doing". They are also highly aware of the legal importance of paperwork. The old adage "if you didn't document it you didn't do it" was repeated several times by different nurses. The nurses in this unit did not feel that they were drowning in administrative work. They understood that paperwork is an obligation, that it is related to patient care, and that it is considered a necessary and helpful activity.

Interestingly, even before the study began, LTC nurses voiced their dissatisfaction with administrative paperwork. When the project was introduced during a staff meeting, the nurses spontaneously laughed and, with a touch of irony, one of them said, "Oh you are going to be buried under the weight of paperwork here". Two of them immediately complained about administrative activities, which they described as "time-consuming" and "boring." The same sentiment was expressed during the course of the study. When paperwork was necessary during the usual flow of their duties, it was viewed as an interruption that contributed to the fragmentation of their activity. Administrative work tended to get done at the end of the day because nurses considered it to be just "one more thing to do", away from the bedside and from the patient.

"It's 9 pm, Emilie is getting tired. She pulls out of her pocket a dirty sheet of paper with her day's notes. She starts completing the patients' folders. She yawns and seems to be struggling to remember some information. She looks at me and asks "do you remember if Mr. H finally took his pills tonight? I forgot to write it down". After completing all the folders and the handover she starts preparing the examination planning. She tells me "You see, this is the work of a secretary." (Fieldwork Diary, LTC, 13th of July 2014).

The negative association exists when nurses are responsible for paperwork that they do not consider to be a legitimate part of their duties. In LTC, preparing examination folders, documentation, or making appointment phone calls appears very disconnected from nurses' perception of their legitimate work.

Differences in content and organization of the Documentation and Organizational Activities

The analysis of methods used to organize DOA revealed differences in the two units.

The summary of the detailed content analysis of each DOA, presented in Table 5, shows that the same activity category involved different tasks in each unit. Thus, while the purpose of the activity was the same, the work involved in achieving it was different. The example of coordinating activities and examinations/investigations is very representative of these differences. As an ICU nurse explained, this activity is streamlined via the informatics system and all the appointments are made within the hospital.

"The physician prescribed a thoracic scan. So you see, I just click here, print the document, and schedule the

appointment for later this afternoon" (ICU nurse for 2 years, interview n° 5).

However, in LTC, this coordination can become very complex and require lots of effort from a nurse who is distracted from her other duties (as shown in the description below). The nurse faces this kind of situation alone, and does not have the option to delegate the responsibility.

"It's 9 am, Caroline is furious. For the third time, Ms. T's family has cancelled an appointment with the podiatrist. She calls the daughter again and asks if she can organize transportation for Ms. T, so that no member of the family needs to come. The daughter agrees. Caroline takes her list of ambulance companies and starts with the first number... after 6 rejections, one ambulance is set for an appointment in two weeks. (....) It's 2.30 pm, Caroline is about to leave, she answers the phone on her way out: Ms. T's daughter has decided that she doesn't want her mother to go alone to the appointment, she wants to reschedule and to cancel the transportation." (Fieldwork diary, LTC, 7th of July 2014)

The analysis of each activity also revealed differences in how nurses valued their documentation. For instance, nurses manage patient admission and discharge, ensuring that the proper documentation has been filled. This activity is perceived as a key moment of the care process for nurses in LTC, where they take the time to evaluate the patient's condition. Admission becomes a meaningful administrative activity that helps nurses build a holistic picture of the patient from which to plan care, as one senior nurse explained:

"Even though we have a lot of paperwork to fill out when someone comes in, I like to do it because it's an important step for the rest of the patient's journey here".

(Nurse in LTC since 20 years, interview n° 3)

In the ICU, however, admissions paperwork primarily serves accounting purposes. Nurses do not value this type of paperwork and consider that they can easily delegate it to Nurses Assistants in order to concentrate on the patient's condition. This young nurse's testimony highlights it clearly:

"I am so happy that our assistant agreed to help us with admissions paperwork, because I really have better things to do when someone is admitted with septic shock". (ICU nurse for 7 years, Interview n° 11)

Moreover, documenting patient records in the ICU consists of very meticulous reporting of the patient's clinical condition: reporting vital signs every 4 hours, documenting medication administration, collecting special epidemiological information, and following up on the care plan. As such, nurses tend to focus on care and documentation sequentially, in a connected fashion. Documentation is mostly done via Electronic Health Records (EHR), although some vitals are reported on a sheet of paper by the bedside. In this case, EHR is supporting care, as a young nurse explains:

"I think the informatics system is easy to use and I like that it helps me get a big picture of how my patient is doing; when I see the numbers on my screen I feel secure" (ICU nurse for 1 year, interview n° 7)

In LTC, the nurse must take care of 40 patients by herself and document the activities elsewhere, away from the bedside. Clinical documentation is brief; it includes basic vitals (blood pressure, glucose level) but needs to be repeated 40 times. So while walking from one room to another the nurse rapidly documents on the EHR in the hallway because she has "better things to do". Care plans also needs to be updated and are a source of frustration when the patient's status remains unchanged over months or even years. As one nurse explained, the informatics system doesn't always support her work:

"I don't mind the informatics system, we have to be modern, you know, but there is so much redundant information that it drives me crazy. Look at me: I'm walking and typing at the same time, and everyday I report the same things. I don't think the people who created this software were nurses!" (LTC nurse for 5 years, interview n° 1)

Discussion

The combination of a comparative approach and a time and motion study has highlighted differences in the meaning of administrative work in different clinical contexts and the factors that explain these findings. This offers a different perspective on nurses' administrative work, which focuses on its relationship to the content and organization of nursing practices. Most studies are based on an idealized patient-centered model of nursing and either report on nurses' complaints about administrative work and its burdens or criticize it by emphasizing its impact on decreasing bedside nursing time (Hendrich *et al.* 2009, Farquharson *et al.* 2013 Dearmon *et al.*, 2013; Antinaho *et al.* 2015). This study moves beyond this frame to show that nurses' perceptions of DOA and its burdens are not necessarily linked to the time spent, but to organizational factors. In this sense, our findings resonate with a Swedish study wherein the authors conclude, "nurses had a feeling of spending too much time on non-nursing activities of a service type (...) but no objective basis justifying this feeling was found" (Lundgren & Segesten, 2001). Taking our lead from sociological studies (Allen 2014 b), our observations prodded us further to identify the contextual factors influencing the integration of DOA into practice. These related to the content and organization of nursing work and highlighted three major context-related elements.

First, DOA are a largely invisible element of the nursing role (Allen, 2014b), but their complexity and volume has increased in contemporary healthcare systems. Generally, staffing matches patient acuity and the need for nursing care (Needleman *et al.* 2011), which can leave less acute areas under-staffed compared to acute counterparts, even if DOA complexity is more marked. Staffing shortages are a challenge for nurses as they are left with a limited amount of time for documentation tasks (Chelagat *et al.* 2013). The content analysis of nurses' activities showed that not only is the ICU well-staffed, but that nurses can delegate part of their DOA to support staff. In LTC, on the other hand, the number of qualified nurses is small, with no delegation whatsoever. A better integration of DOA should start with taking these activities into account with staffing decisions.

Secondly, our study shows that nurses perceived DOA more positively when they were relevant to, and readily integrated into, clinical practice. The problem of documentation relevance has been emphasized as the key finding of a large British National Health Service (NHS) study: 68.1% of nurses considered that the paperwork they have to complete does not add value to patient care (Cunningham *et al.* 2012). In the ICU, documentation tends to supports minute-by-minute care and each record is integrated into this ongoing activity. In LTC, the patient's state changes very little, yet the nurse needs to record their same status over and over. In this case, paperwork is not perceived as relevant and each administrative activity appears isolated and disconnected from direct care in the organization of work, giving a global view of non-integrated care.

Finally, Fitzpatrick (2004) made a distinction about records being understood as an "information repository," or as a "record at work in the practical delivery of healthcare". Healthcare organizations tend to treat records as serving both purposes equally (Allen, 2014), but this is not necessarily the case. Our study highlights this argument, as DOA reflect and support clinical work in one case (ICU), but are overshadowed by broader concerns with record-keeping and accountability in the other (LTC). This exploration of two clinical entities raises the question as to whether nurses need more latitude to develop documentation that reflects their work. Nowadays, this documentation is linked to electronic health records (EHR). The benefits of EHR are not yet fully apparent, as nurses' technological acceptance level is still low, and since this recognition is influenced by the context and environment of care (Strudwick & Mc Gillis Hall 2015). These case studies

clearly showcase how DOA are articulated within this context. While nurses in both units were willing to work with informatics, it is clear that only in the ICU were communication and reporting streamlined through the informatics system. This result is in line with those from a previous ethnographic study in intensive care, outlying the importance of nursing technology development (Crooker 2009). In LTC, however, the informatics system sometimes competes with the activity of care, as it seems predominantly geared towards professional accountability. Involving nurses in the strategic development of informatics (Hussey & Kennedy 2016) could avoid such situations and support the delivery of care.

Limitations

There are certain limitations to this study. It focuses on polar cases with important differences in the nurse-to-patient ratio, the patient focus, and the organizational structure and pace. This difference could explain varying perceptions of the DOA; a higher nurse-to-patient ratio leading to less constraints and to more acceptable conditions for the integration of DOA. However, our findings show that this case polarity helped to uncover another fundamental aspect. The time spent on DOA being equal in both units, it suggests that if the difference of nurse-to-patient ratio plays a role, it is limited by the amount of time dedicated to DOA. ICU nurses probably have more bedside care and DOA per patient than LTC, reinforcing the notion of interruption by DOA when they appear. We believe that further research is warranted to compare our results in LTC and ICU with other units, which would show how far our findings can be generalized to other contexts.

Conclusion

This study has implications for further research and theory development. First, the combination of three methods (shadowing, interviews and activity timing) in two specific units sheds light on the complexities and singularities of nursing work. This method leads to the generalization of important factors that are being tested in other French units, as well as internationally, in the study's next phase. Secondly, this study could provide a basis on which to test more precise managerial recommendations in order to integrate Documentation and Organizational Activities (DOA) into practice.

Describing nurses' work is fundamental for bringing adequate information into debates about the future challenges nursing will face. These changes in health care will address issues around new needs in population health, including the complexities of caring for the elderly, the importance of care coordination and transitional care, as well as using Electronic Health Records and the need to improve inter-professional collaboration (Fraher *et al.* 2015). This study confirms that administrative work is not merely a distraction from the bedside; it is a factor with a number of implications for the benefits of care. Nurse managers should pay attention to the organizational context of their ward in order to fully integrate administrative work and to make sure that nurses take control of it. The importance of nursing leaders and staff in designing informatics strategies has already been outlined. This article highlights the need to incorporate DOA into these strategies.

Appendix 3 Internal Reviw Board validation

General Information

Project Title

Nursing and administrative activities: From time-consuming to sense-making. An ethnographic study of the impact of increasing accountability in nursing practice.

Brief Summary. Provide a brief non-technical description of the study, which will be used in IRB documentation as a description of the study. Typical summaries are 50-100 words. Please reply to each item below, retaining the subheading labels already in place, so that reviewers can readily identify the content. PLEASE NOTE: THIS SECTION MAY BE EDITED BY THE IRB FOR CLARITY OR LENGTH.

Purpose: This sociological study aims to explore the consequences of increasing administrative tasks on nurses' work. Specifically, it will

examine the administrative tasks, the time spent on direct patient care, as well as nurses' perceptions of professional practice, and how nurses perceive that their administrative duties impact their ability to care for their patients.

Participants: Registered nurses.

Procedures (methods): Ethnography (shadowing and semi-structured interviews)

Note: This study is the second phase of a PhD dissertation, the first phase was conducted in a French Hospital from September 2014 to January 2015.

3. Is this new study similar or related to an application already approved by a UNC-Chapel Hill IRB? Knowing this will help the IRB in reviewing your new study.

No

2. Project Personnel

1.

Will this project be led by a STUDENT (undergraduate, graduate) or TRAINEE (resident, fellow, postdoc), working in fulfillment of requirements for a University course, program or fellowship?

Yes

This study will require the identification of a single faculty advisor, who should be added in Project Personnel on this page. This should be the faculty member who will mentor this research, who may or may not be your academic faculty advisor.

The faculty advisor will be required to co-certify with the student/trainee PI. You should also make sure this person has a chance to review and edit the submission before you submit.

Choose the status of the student/trainee:

graduate or professional

2.

List all project personnel beginning with principal investigator, followed by faculty advisor, co-investigators, study coordinators, and anyone else who has contact with subjects or identifiable data from subjects.

List ONLY those personnel for whom this IRB will be responsible; do NOT include collaborators who will remain under the oversight of another IRB for this study.

If this is Community Based Participatory Research (CBPR) or you are otherwise working with community partners (who are not functioning as researchers), you may not be required to list them here as project personnel; consult with your IRB.

If your extended research team includes multiple individuals with limited roles, you may not be required to list them here as project personnel; consult with your IRB.

The table below will access campus directory information; if you do not find your name, your directory listing may need to be updated.

Last Name	First Name	Department Name	Role
Michel	Lucie	School of Nursing	Principal Investigator
Jones	Cheryl	School of Nursing	Faculty Advisor

NOTE: The IRB database will link automatically to <u>UNC Human Research Ethics Training database</u> and the UNC Conflict of Interest (COI) database. Once the study is certified by the PI, all personnel listed (for whom we have email addresses) will receive separate instructions about COI disclosures. The IRB will communicate with the personnel listed above or the PI if further documentation is required.

If this research is based in a center, institute, or department (Administering Department) other than the one listed above for the PI, select here. Be aware that if you do not enter anything here, the PI's home department will be AUTOMATICALLY inserted when you save this page.

Department School of Nursing

3. Funding Sources

1.

Is this project funded (or proposed to be funded) by a contract or grant from an organization EXTERNAL to UNC-Chapel Hill?

Yes

Funding Source(s) and/or Sponsor(s)

Sponsor Name	UNC Ramses Number	Sponsor Type	Prime Sponsor Name	Prime Sponsor Type	Sponsor/Grant Number
N/A		N/A	N/A	N/A	N/A

2.

Is this study funded by UNC-CH (e.g., department funds, internal pilot grants, trust accounts)?

No

3.

Is this research classified (e.g. requires governmental security clearance)?

No

4.

Is there a master protocol, grant application, or other proposal supporting this submission (check all that apply)?



4. Screening Questions

The following questions will help you determine if your project will require IRB review and approval.

The first question is whether this is RESEARCH



Does your project involve a systematic investigation, including research development, testing and evaluation, which is designed to develop or contribute to generalizable knowledge? PLEASE NOTE: You should only answer yes if your activity meets all the above.

Yes

The next questions will determine if there are HUMAN SUBJECTS



Will you be obtaining information about a living individual through direct intervention or interaction with that individual? This would include any contact with people using questionnaires/surveys, interviews, focus groups, observations, treatment interventions, etc. PLEASE NOTE: Merely obtaining information FROM an individual does not mean you should answer 'Yes,' unless the information is also ABOUT them.

Yes

3.

Will you be obtaining identifiable private information about a living individual collected through means other than direct interaction? This would include data, records or biological specimens that are currently existing or will be collected in the future for purposes other than this proposed research (e.g., medical records, ongoing collection of specimens for a tissue repository).

No

The following questions will help build the remainder of your application.

Will subjects be studied in the Clinical and Translational Research Center (CTRC, previously known as the GCRC) or is the CTRC involved in any other way with the study? (If yes, this application will be reviewed by the CTRC and additional data will be collected.)

No

5.

Does this study directly recruit participants through the UNC Health Care clinical settings for cancer patients <u>or</u> does this study have a focus on cancer or a focus on a risk factor for cancer (e.g. increased physical activity to reduce colon cancer incidence) <u>or</u> does this study receive funding from a cancer agency, foundation, or other cancer related group? (If yes, this application may require additional review by the Oncology Protocol Review Committee.)

No

6.

Are any personnel, organizations, entities, facilities or locations in addition to UNC-Chapel Hill involved in this research (e.g., is this a multi-site study or does it otherwise involve locations outside UNC-CH, including foreign locations)? You should also click "Yes" if you are requesting reliance on an external IRB, or that UNC's IRB cover another site or individual. See guidance.

Yes

5. Multi-site Study Information

1.

Will this study be conducted in locations outside the United States?

Yes

All UNC students, faculty, and staff traveling internationally for this study are required to submit their itinerary to the <u>Global Travel Registry</u>.

Will your research project involve the Galapagos Islands, Ecuador?

No

If yes, your application will be reviewed by the <u>UNC Center for Galapagos Studies</u>. This Center will be included in routing for approvals after you submit.

Is UNC-CH taking or being asked to take responsibility for the oversight of research by individuals, groups or organizations outside of UNC-CH (e.g., as lead site, study headquarters or IRB of record for other sites)?

No

Are you requesting that UNC-CH rely on an external IRB for continuing review and approval of this study?

No

Researchers are reminded that additional approvals may be needed from relevant "gatekeepers" to access subject.

Exemptions

Request Exemption

Some research involving human subjects may be <u>eligible for an exemption</u> which would result in fewer application and review requirements. This would not apply in a study that involves drugs or devices, involves greater than minimal risk, or involves medical procedures or deception or minors, except in limited circumstances.

Additional guidance is available at the <u>OHRE website</u>. Exemptions can be confusing; if you have not completed this page before, please <u>review this table with definitions and examples</u> before you begin.

1.

Would you like your application evaluated for a possible exemption?

Yes

Will your study either involve prisoners as participants or be FDA-regulated?

No

In order to be eligible for exemption, your research must fit into one or more of the following categories. Check all of the following that apply, understanding that most research falls into one or two categories.

Category 1 (click here for guidance and examples)

The research is to be conducted in established or commonly accepted educational settings. Note: This applies to the location where education research will act conducted (e.g., public schools) and NOT to your location at a university.

And the research will involve normal educational practices, such as:

Research on regular and special education instructional strategies.

Research on the effectiveness of or the comparison among instructional techniques, curricula, or classroom management methods.

The research takes place in a commonly accepted educational setting: the hospital

Category 2: (click here for guidance and examples)

Does your study involve minors under the age of 18?

No

The research involves the use of one or more of the following

Educational tests (cognitive, diagnostic, aptitude, achievement).

Survey procedures.

Interview procedures

Observation of public behavior.

And either or both of the following is true:

The information to be obtained will be recorded in such a manner that participants cannot be identified, directly or indirectly through identifiers linked to the participants cannot be identified, directly or indirectly through identifiers linked to the participants. Any disclosure of the participants' responses outside the research would not reasonably place the participants at risk of criminal or civil liability or be damaging participants' financial standing, employability, or reputation.

This study is an ethnographic study, the information collected is anonymous and all names and locations are coded. The researcher takes notes of what occurs on nu and interviews nurses about their perceptions of their own practice. No data is collected regarding name, sex, age, race or ethnicity.

Category 3 (click here for guidance and examples)

Research involves the use of one or more of the following:

Educational tests (cognitive, diagnostic, aptitude, achievement)

Survey procedures

Interview procedures.

Observation of public behavior.

And

The participants are elected or appointed public officials or candidates for public office.

Federal statute(s) require(s) without exception that the confidentiality of the personally identifiable information will be maintained throughout the research and

Category 4 (click here for guidance and examples)

The research involves the collection or study of existing data, documents, records, pathological specimens, or diagnostic specimens.

And either of the following is true:

The sources of data are publicly available.

The investigator records information in such a manner that participants cannot be identified, directly or indirectly through identifiers linked to the participants

Category 5 (click here for guidance and examples)

The project is a research or demonstration project.

Additionally the following must also be true.

The program under study delivers a public benefit (e.g., financial or medical benefits as provided under the Social Security Act) or service (e.g., social, supportunition services as provided under the Older Americans Act).

The research is conducted pursuant to specific federal statutory authority.

There is no statutory requirement that an IRB review the research.

The research does not involve significant physical invasions or intrusions upon the privacy of participants.

The research is designed to study, evaluate, or otherwise examine one or more of the following:

Public benefit or service programs.

Procedures for obtaining benefits or services under those programs.

Possible changes in or alternatives to those programs or procedures.

Possible changes in methods or levels of payment for benefits or services under those programs.

Category 6 (click here for guidance and examples)

The research involves taste and food quality evaluation or is a consumer acceptance study.

Either of the following is true:

Wholesome foods without additives are consumed.

If a food is consumed that contains a food ingredient or an agricultural chemical or environmental contaminant, the food ingredient or agricultural chemical or environmental contaminant is at or below the level and for a use found to be safe by one of the following agencies:

Please check which of following

The Food and Drug Administration.

The Environmental Protection Agency.

The Food Safety and Inspection Service of the U.S. Department of Agriculture.

Consent Process for Exemptions

While the full regulatory requirements for consent do not apply, some exempt research does involve talking to or interacting with human participants. Under these circumstances, there is still the expectation that you will tell people what you are doing and why, and invite their voluntary participation. If this describes your study, then describe the process for obtaining consent from the subjects. This may or may not include a written consent document or script; if you plan to use a written document, please upload as an attachment as the end of this application process.

Nurses managers will introduce my research project to the registered nurses and I will also present it (usually during a staff meeting). Nurses who agree to be shadowed and interviewed will be asked to sign the attached consent form.

Part A. Questions Common to All Studies

A.1. Background and Rationale

A.1.1.

Provide a summary of the background and rationale for this study (i.e., why is the study needed?). If a complete background and literature review are in an accompanying grant application or other type of proposal, only provide a brief summary here. If there is no proposal, provide a more extensive background and literature review, including references.

Internationally, the rising demands for accountability in terms of efficiency and quality have transformed professionals' practice and identity across all activity sectors (Dent, M. & Whitehead, S. 2013; Healy 2009 . Hibou, 2013). In healthcare this can be particularly noted amongst nurses whose activities have significantly changed over the last few decades: "I get the feeling I have become more of a secretary than a carer", states a nurse in a large survey on working conditions in France (CFDT, 2011). Increasing accountability, seemingly leads to a rise in administrative tasks unrelated to patient care. This phenomenon has been shown to lead to burnout, dissatisfaction and eventually turnover (Draper, 2008; Estryn Behar, 2010). Nurses often consider this "paperwork" as preventing them from interacting with their patients (Tyler et al, 2006). Such relational work is itself attached to strong professional norms that define how nurses perceive their activities (Acker 2005; Defrino, 2009).

This study aims to explore some of the consequences of increasing accountability in the field of healthcare on nurses' activity. It examines nurses' nurses' engagement in administrative tasks, the time spent on direct patient care, and nurses' perception of professional practice.

Does more demand for reporting always mean less time at the bedside? Does this lead to a reconfiguration of nurses' work and nurses perceptions depending on the context of activity?

To answer these questions we will adopt a pragmatic approach inspired by activity theory (Engestrom et al., 1999). This approach allows us to consider the use and perception of artifacts not as an individual relationship with a tool but as a result of a collective process, involving culture, social and material constraints of work. This systemic approach will enable us to provide a comparison of nurses activities in the United States and in France (the French part of the study was conducted from September 2013 to January 2015)

Literature review

How nurses spend their time has been an interest for decades and seems to be a major factor determining "how nurses work and how they feel about their work" (Kiekkas et al 2005). Since the 1990's researchers kept the dominant rhetoric of holistic direct patient care. Several studies show the link between the decreasing amount of time nurses spend with patients and a decline in satisfaction of nurses, a rise in bad event and a higher patient mortality. (Aiken et al. 2002, Estabrooks et al 2005, Rafferty et al. 2007). Less time spent at the bedside is also associated with lower patient satisfaction (Westbrook et al. 2011). In parallel, one of the major changes and challenges described by the literature as impacting nurses' work, is the increasing time spent in documentation (Duffield et al. 2008, Fitzegerald et al. 2003, Korst et al. 2003). Not only nurses are accused of spending too little time at the bedside but they themselves have the feeling of spending too much time on non nursing activities of a service type (Lundgren et Segesten 2001). For example, in an American hospital, asked about their attitude toward documenting activities, 81% of the nurses reported that documentation was directly negatively impacting the time spent with the patient (Grugerty et al. 2007).

Next to these perception centered studies, there have been a number of studies calculating how nurses spend their time using method such as Time and Motion or Work-sampling method. Many studies are from Australia making a generalization to other systems difficult. Besides, the variety of methods used does not allow for a direct comparison of results. Indeed, the different studies do not use the same categories of activities. However, most studies have shown a rise in administrative activities in nursing (Fitzgerald et al 2003; Korst et al, 2003). An analysis of the literature reveals that almost all of the studies have report one commonality: the direct patient care category. Interestingly enough, despite their perception of spending less time with their patients, the time nurses spend with their patients has remained stable, at approximately 37% over the years (Hendrickson 1990, Pelletier et al 2005; Duffield et al 2005; Hendrich et al 2008).

Several authors point out that the time nurses spend on documentation is not disproportionate, it is 10% of the time in a British study (Farquharson et al. 2013), 9,3 % in Greece (Panagiotis et al 2005), and 13% in Australia (Fitzgerald et al.2003). Lundgren and Segesten (2001) even conclude "the nurses had a feeling of spending too much time on non-nursing activities of a service type (...) but no objective basis justifying this feeling was found".

In our perspective, this suggests that the issue is not necessarily that nurses do not have enough time to spend with patients, but rather that they associate a different meaning to administrative activities, as separate from the care they deliver.

Studies emerging from the domain of the sociology of the professions (Allen, 1998; Acker, 1999), analyzing the differences between ideal representations of "care" work and how nursing activities were developed over time. Their findings question the role of artifacts surrounding the "activity of writing" (Acker, 1999; Bourret 2011; Mayère et al.2012) as well as a need to redefine the nursing mandate (Allen, 1998, 2004, 2013; Nadot, 2013) to include organizational work. These authors claim that a large part of nursing work remains hidden by the dominant patient centered care rhetoric. It is argued that it is necessary today to expand the nursing mandate to better recognize and include "organizational work" performed by nurses in healthcare organizations.

The literature review suggests that most of the articles are still focusing mainly on direct care but a new way of analyzing nursing work is emerging. It leads us to combine the two approaches we found relevant: the objective one inspired by Time and Motion studies and the

comprehensive one inspired by sociology of professions.

A.2. Subjects

Δ21

Total number of subjects proposed across all sites by all investigators (provide exact number; if unlimited, enter 9999):

20

A.2.2.

Total number of subjects to be studied by the UNC-CH investigator(s) (provide exact number; if unlimited, enter 9999):

20

A.2.3.

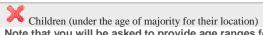
If the above numbers include multiple groups, cohorts, or ranges or are dependent on unknown factors, or need any explanation, describe here:

The researcher will spend 7 days on 4 patient care units (so a total of 28 days). She will shadow 5 nurses in each unit for a total of 20 nurses. This number of subjects may vary according to unit constraints and nurses willingness to participate.

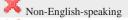
A.2.4.

Do you have specific plans to enroll subjects from these vulnerable or select populations:

Do not check if status in that group is purely coincidental and has no bearing on the research. For example, do not check 'UNC-CH Employees' for a cancer treatment study or survey of the general public that is not aimed at employees.



Note that you will be asked to provide age ranges for children in the Consent Process section. Any minor subject who attains the age of muring the course of the research study must provide consent as an adult, unless consent has been waived, which is requested in section



Prisoners, others involuntarily detained or incarcerated (this includes parolees held in treatment centers as a condition of their parole)

Decisionally impaired

Pregnant women

HIV positive individuals

UNC-CH Students

Some research involving students may be eligible for waiver of parental permission (e.g., using departmental participant pools). See SOP



UNC-CH Student athletes, athletic teams, or coaches

People, including children, who are likely to be involved in abusive relationships, either as perpetrator or victim.

This would include studies that might uncover or expose child, elder or domestic abuse/neglect. (See SOP Appendix H)

A.2.5

If any of the above populations are checked, describe how you plan to confirm status in one or more of those groups (e.g., pregnancy, psychological or HIV testing)

Nurses from UNC-CH will be recruited to participate in this study. The Nurse Manager from each unit will introduce the researcher to the RN, who can also be identified by their UNC-ID badge.

A 2 6

If any of the above populations are checked, please describe your plans to provide additional protections for these subjects

All data will be coded, including the name of the hospital, the names of the units, and the names of the UNC-CH nurses who participate in the study will be changed. The nurse participants will sign a consent form to participate in the study.

A.2.7.

Age range of subjects:

Minimum age of subject enrolled	21	
	years	
Maximum age of subject enrolled	99	
» If no maximum age limit, indicate 99		
	years	

A.4. Study design, methods and procedures

Your response to the next question will help determine what further questions you will be asked in the following sections.

A.4.1.

Will you be using any **methods or procedures commonly used in biomedical or clinical research** (this would include but not be limited to drawing blood, performing lab tests or biological monitoring, conducting physical exams, administering drugs, or conducting a clinical trial)?

No

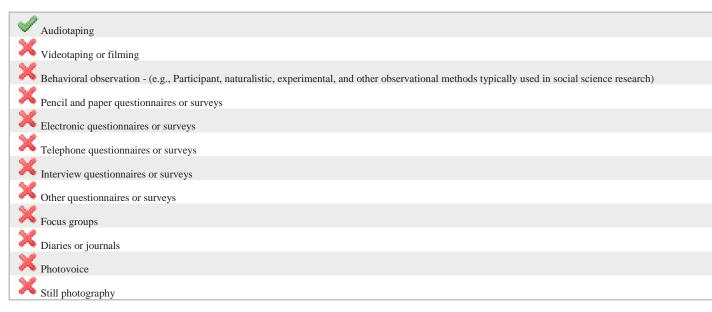
A.4.2.

Describe the study design. List and describe study procedures, including a sequential description of what subjects will be asked to do, when relevant.

We are conducting an ethnographic study using two forms of investigation: observations *in situ* or shadowing, and in-depth interviews (with audio-taping). The observer will follow one nurse at a time like a shadow and write down descriptions of the nurse's work and record verbatim in a personal diary, all the data are anonymous, the hospital, unit and nurses' names are coded using pseudonyms.

A.4.3.

Will this study use any of the following methods?



A.4.4.

If there are procedures or methods that require specialized training, describe who (role/qualifications) will be involved and how they will be trained.

The PI of this research is a sociologist and has been trained in the use of ethnographic techniques.

A.4.5.

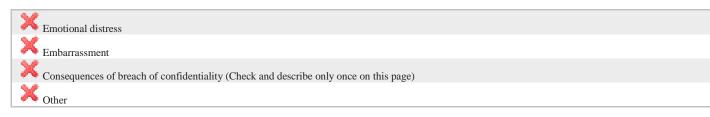
Are there cultural issues, concerns or implications for the methods to be used with this study population?

No

A.6. Risks and measures to minimize risks

For each of the following categories of risk you will be asked to describe any items checked and what will be done to minimize the risks.

A.6.1. Psychological

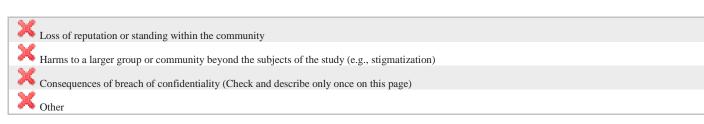


A.6.2.

Describe any items checked above and what will be done to minimize these risks

No Answer Provided

A.6.3. Social

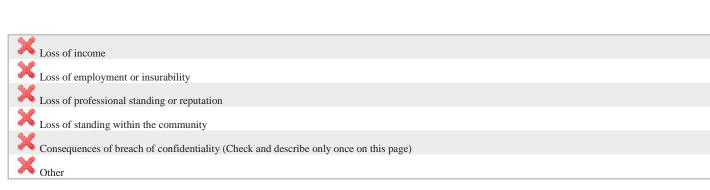


A.6.4.

Describe any items checked above and what will be done to minimize these risks

No Answer Provided

A.6.5. Economic

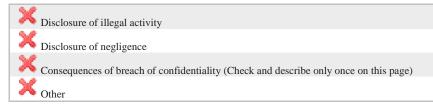


A.6.6.

Describe any items checked above and what will be done to minimize these risks.

No Answer Provided

A.6.7. Legal

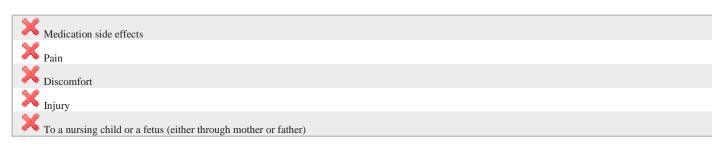


A.6.8.

Describe any items checked above and what will be done to minimize these risks

No Answer Provided

A.6.9. Physical



Describe any items checked above, including the category of likelihood and what will be done to minimize these risks. Where possible, describe the likelihood of the risks occurring, using the following terms:

- Very Common (approximate incidence > 50%)
- Common (approximate incidence > 25%)
- Likely (approximate incidence of 10-25%)
- Infrequent (approximate incidence of 1-10%)
- Rare (approximate incidence < 1%)

No Answer Provided

A.6.11

Unless already addressed above, describe procedures for referring subjects who are found, during the course of this study, to be in need of medical follow-up or psychological counseling

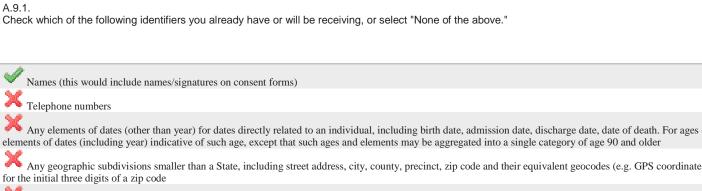
No Answer Provided

Are there plans to withdraw or follow subjects (or partners of subjects) who become pregnant while enrolled in this study?

A.9. Identifiers

Fax numbers

Electronic mail addresses



Social Security numbers

Medical record numbers

Health plan beneficiary numbers

Account numbers

Certificate/license numbers

Vehicle identifiers and serial numbers (VIN), including license plate numbers

Device identifiers and serial numbers (e.g., implanted medical device)

Web universal resource locators (URLs)

Internet protocol (IP) address numbers

Biometric identifiers, including finger and voice prints

Full face photographic images and any comparable images

Any other unique identifying number, code, or characteristic, other than dummy identifiers that are not derived from actual identifiers and for which the re-ide key is maintained by the health care provider and not disclosed to the researcher

None of the above

A.9.2.

For any identifiers checked, how will these identifiers be stored in relationship to the research data?

with the research data (i.e., in the same data set and/or physical location)

separate from the research data (i.e., coded with a linkage file stored in a different physical location)

Provide details about the option you selected above:

The consent forms will be kept by the researcher in a special folder separate from the research data. It will not be possible to link research data with individuals bec individual will be assigned a code or pseudonym, and only the codes will be used in data collection and analysis. Codes assigned to each individual will be stored in file and in a different physical location than the data file. Once data are coded, there will be no way to link data to individuals or their consent.

A.9.3

Are you collecting Social Security Numbers to be used as a unique identifier for study tracking purposes for national registry or database? (Do not check yes if collecting SSN *only* for payment purposes; this will be addressed later.)

No

A.10. Confidentiality of the data

A.10.1.

Describe procedures for maintaining confidentiality of the data you will collect or will receive (e.g., coding, anonymous responses, use of pseudonyms, etc.).

The researcher will give pseudonyms to all name including the name of the hospital, the unit, and the nurses. It will be impossible for someone reading the diary or the interview transcription to recognize which nurse is taking part of the study.

A.10.2.

Will any of the groupings or subgroupings used in analysis be small enough to allow individuals to be identified?

No

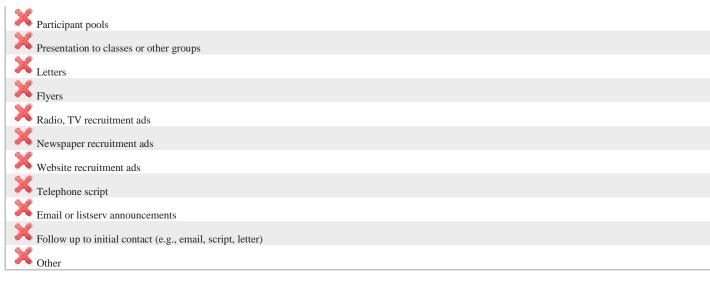
Part B. Direct Interaction

B.1. Methods of recruiting

B.1.1.

Check all the following means/methods of subject recruitment to be used:*





B.1.2. Describe how subjects will be identified

Four units (Medical Intensive Care Unit [MICU], 8 Bedtower (BT) Geriatric, 4 Oncology, 3 Neuroscience) have been selected based on collaboration and discussion between UNC School of Nursing and UNC Hospital. The first three units are similar to the three units studied in France to allow comparison and the last one (3 Neuroscience) was added because the Nurse Manager expressed interest in the project and wants to involve more nurses in this research. We previously met with each Nurse manager who approved the research and agreed to help in recruiting the nurses.

B.1.3.

Describe how and where subjects will be recruited and address the likelihood that you will have access to the projected number of subjects identified in A.2.

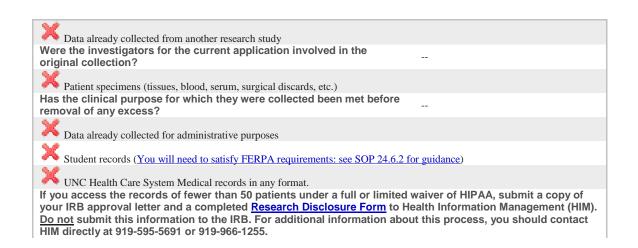
The Nurses managers of the 4 selected units agreed to the same protocol of recruitment. They will explain the project to the RNs on their unit prior to the beginning of the study. The PI will also present it during a staff meeting the first day that shadowing will begin. Nurses' participation is voluntary based, so only nurses who agree to participate will sign the consent form before the beginning of each shadowing experience.

The nurse manager agreed for 7 business days of shadowing in each of their unit (so a total of 28 days), so the researcher will shadow between approximately 5 nurses in each units (so a total of 20 nurses) the number of nurses will vary depending on their availability and their willingness to participate but also to each unit constraint.

Part C. Existing Data, Records, Specimens

C.1. Data Sources

C.1.1.





What existing records, data or human biological specimens will you be using? (Indicate all that apply or select 'None of the above'): *

C.1.2.

Describe your plans for obtaining permission from the custodians of the data, records or specimens (e.g., pathology dept, tissue bank, original researcher):

No Answer Provided

C.1.3

Do the custodians of the data, records or specimens require a data use agreement?

No

C.2. Coding and Data Use Agreements

C.2.1.

When you receive these data, records or human biological specimens will they be coded? Coded means identifying information that would enable the research team to readily ascertain the individual's identity has been replaced with a number, letter, symbol, or combination thereof (i.e., a code). If you will not be using existing materials, check "No."

No

Data Security Requirements

Data Security

Level II Data Security Requirements:

Based on the information you've provided, your study will be collecting data that require additional security measures to ensure that they are adequately protected from inadvertent disclosure. Due to the nature of these data, you are required to implement the following security measures on any computer(s) that will store or access information collected for this study. We strongly suggest that you coordinate your efforts in this area with your unit's IT support or IT security personnel.

Required Measures for Level II Data Security

 Access to study data must be protected by a username and password that meets the complexity and change management requirements of a <u>UNC ONYEN</u>.

- Study data that are accessible over a network connection must be accessed from within a secure network (i.e., from on campus or via a VPN connection).
- Computers storing or accessing study data must have <u>Endpoint Protection</u> (AntiVirus/AntiSpyware) installed and updated regularly where technologically feasible.
- Patch management and system administration best practices should be followed at all times on systems storing or accessing
 your data.
- Users should be granted the lowest necessary level of access to data in accordance with ITS Security's Standards and Practices for Storing or Processing Sensitive Data (when technologically feasible).
- **These requirements do not replace or supersede any security plans or procedures required by granting agencies or sponsors. Questions or concerns about compliance with these requirements should be directed to your local IT support staff.

Additional IT Security Resources

- ITS Security
- Carolina Population Center Security Guidelines
- SOM Information Security

Due to the nature of your study data, the senior IT official in your school or department will be also notified about your study and may contact you or your technical contact(s) to discuss any data security questions on concerns they may have. If you have indicated that your research will take place in another unit on campus (i.e., a Center or Institute), that group will also be notified

1. Please provide contact information for the individuals or groups who will provide IT expertise and/or consultation for your study and/or will manage the devices where your study data is stored (IT support within your department or school, research staff with appropriate IT expertise, etc). If unsure, you should consult your department administrator.

Name
Michel Lucie

Michel Lucie

Consent Forms:

This submission requires the following consent forms

Template Name
There are no required consent forms with this submission.

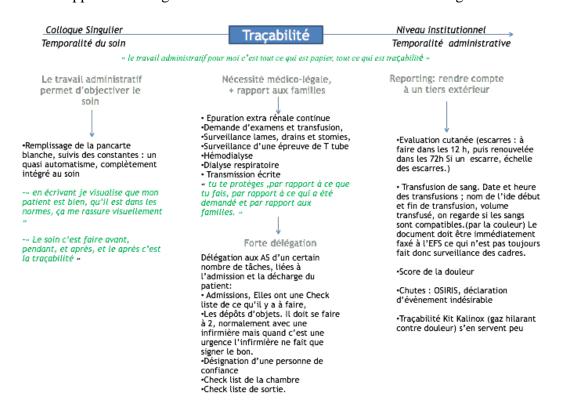
This submission includes the following consent forms

File Name

Document Type

There are no consent forms attached to this submission.

Appendix 4 Original French version of ICU observational diagram



A ma grand mère, Marcelle MICHEL,

Chevalière des arts et des lettres et auteure de :

« L'apogée et la décadence du ballet classique sous la révolution et l'empire »

Thèse de Lettre, 1955.