Skin as a Communicative Boundary

Semiotic Dialogue in Danish Healthcare System

by

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ENGLISH SUMMARY

In the process of conducting this thesis, it very early became evident that the already known theories of human relating and communicating in asymmetrical aspects, were somewhat simplified to an extent, it became difficult to fully grasp what it encompasses. It is not just the oral gesture, the bodily performance, the culture or even the individual identities. It is all of them at the same place and time.

Understanding how feelings and identities can be represented through and via the body, with the skin as the immediate connecting device for a person's inner reflections and metabolism, exposed and played out on the outside connecting with other persons – calls for a new theory. This theory has to be able to contain all these different aspects and processes. The very first (and not finished) endeavours to develop this theory is the Semiotic Skin Theory, in which a police officer who got shut in duty is a major contributor of understanding how identity can be contained and negotiated in and through the skin as to be able to further investigate how this flux of negotiation through the layers of semiotic skin can be the foundation of developing new strategies in creating partnerships in asymmetrical communications (as in the healthcare system).

Dialogues in healthcare systems all over the world operate with a theory of Shared Decision Making, which in theory is nicely conducted. Unfortunately, a tremendous amount of research has been done in the field of investigating the effect of this approach and it shows differing results. This must indicate that there is a simplification of an extremely complex phenomenon that cannot be implied in practice.

To solve this problem of simplicity to a multifaceted and complex phenomenon in the Danish healthcare system, a cooperation between the pediatric area of specialization and the oncological wards at Aalborg University Hospital were established. In this process the two terms of collective doctors and collective patients were developed and introduced as to display the complexity in the communication as well as the complexity in reflecting and negotiating identities in these asymmetrical dialogues.

In the area of a pediatric contact with the child as a patient it was evident that the body and the contact with this body became the media of communication. This non-verbal area of communication and relating is described and performed with accuracy and refinement in the area of classical music via musicians' and conductors' performance of creating good music.

Implementing all these aspects in the development of a communication course for doctors and nurses at Aalborg University Hospital seemed necessary as to contain all

the different nuances of an asymmetrical communication. Therefore, it is also necessary to work in the fields of theories of borders and boundaries, which are as complex and multifaceted as the asymmetrical communication is itself. Each time the theory develops in connecting areas of cross-disciplinary research, the borders are crossed and boundaries are extended in this theoretical work and further boundary-crossing is detected in the area of human communication.

As a result of connecting cross-disciplinary theoretical areas, the courses in communication at the University Hospital have developed into continual lectures for the employees - and a new longitudinal project is established with one of the oncological wards, as to gain better contact with the patients, so they keep a general health condition stabile.

DANSK RESUME

Meget tidligt i processen at udvikle og skrive denne afhandling, blev det indlysende at allerede kendte teorier om menneskelige forbindelser og kommunikation i asymmetriske forhold er i mere eller mindre grad simplificerede i en sådan udstrækning at det bliver svært at forstå hvad de omfatter og indeholder. Det er ikke kun den orale gestus, den kropslige præstation, kulturen eller endda den individuelle identitet. Det er dem alle på samme tid og sted.

At begribe hvordan følelser og identiteter kan repræsenteres gennem og via kroppen, med huden som den umiddelbare sammenkoblende enhed for en persons indre refleksioner og metabolisme, eksponeret og udspillet på ydersiden, i kontakt med andre mennesker – fordrer udviklingen af en ny teori. Denne teori skal være i stand til at indeholde alle disse forskellige aspekter og processer. De første (og ikke afsluttede) bestræbelser på at udvikle denne teori, er Semiotic Skin Theory, i hvilken en politibetjent, der blev skudt i tjenesten, er en vigtig medvirkende faktor i forståelsen af hvordan identitet kan rummes og forhandles i og gennem huden, for herved at blive i stand til at undersøge hvordan denne flux af forhandlingsmomenter gennem den semiotiske huds lag bliver fundamentet for udviklingen af nye strategier og etableringen af partnerskaber i en asymmetrisk kommunikation (som i sundhedssektoren).

Dialoger i sundhedssystemer over hele verden opererer med en teori om Shared Decision Making, hvilken i teorien er fint udført. Uheldigvis viser en stor del af forskningen om effekten af denne tilgang divergerende resultater. Dette må indikere at der er en simplificering af et ekstremt komplekst fænomen, som ikke kan implementeres i praksis.

For at løse dette simplificeringsproblem af et multifacetteret og komplekst fænomen i det danske sundhedssystem, er et samarbejde med det pædiatriske specialområde samt de onkologiske afdelinger på Aalborg Universitetshospital etableret. I denne proces bliver de to termer den kollektive læge samt den kollektive patient udviklet og introduceret for netop at vise kompleksiteten i kommunikationen samt i refleksionen og forhandlingen af identiteter i disse asymmetriske dialoger.

I det pædiatriske specialområdes kontakt med børn som patienter blev det åbenlyst at kroppen og kontakten med denne blev mediet for kommunikationen. Denne non-verbale kontakt og relatering er beskrevet og udført med stor akkuratesse og raffinement i den klassisk musiske verden – via musikere og dirigenters præstation for at kreere god musik.

Implementering af alle disse aspekter i udviklingen af kommunikationskurser for læger og sygeplejersker på Aalborg Universitetshospital blev nødvendige for netop at

vise alle nuancerne i en asymmetrisk kommunikation. Derfor er det også nødvendigt at introducerer teorier om grænser og skillelinjer, hvilke er lige så komplekse og multifacetterede som den asymmetriske kommunikation er i sig selv. Hver gang teorien udvikler sig i retningen af at forbinde områder fra kryds-disciplinære forskningsområder, bliver disse grænser udvidet og skillelinjer overskredet. Dette manifesterer sig også i menneskelig kommunikation.

Som resultat af at forbinde kryds-disciplinære teoretiske områder har kurserne i kommunikation på Aalborg Universitetshospital udviklet sig til vedvarende undervisningsgange for de ansatte – samt et nyt longitudinelt projekt er etableret i samarbejde med en af de onkologiske afdelinger, for at opnå bedre kontakt med patienterne, således de bevarer en generel stabil helbredsmæssig almen tilstand.

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Thank you!

To my family.

To my friends.

To the friends who became family.

To my colleagues who shared their thoughts and reflections with me, which made me wiser and widened my horizon.

This thesis is dedicated to my life's most beautiful inspirations:

Caisa

Norah

Agnete

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CHAPTER 1. INTRODUCTION

One early morning many years ago, I walked out in a beautiful sunny day. I was heading to the University of Aarhus for my very first day as a medical student, and I felt lucky. Lucky to be able to do what I found most exciting in the world and concurrently do good for people who needed it. After a few hours with older co-students and a tour around the campus, we were met by the head of the study-board of medicine in the big auditorium - and he was excited. Excited to welcoming the brightest students in the country and the most diligent of all. We were just about to enter the very elite of the Danish society and healthcare system, and hopefully revolutionize the medical area – so he said.

I was disillusioned. Not because a few or even just a single one of my co-students would revolutionize medicine and save humans; not because I had been told I would be in the elite and I did see myself as clever enough to be there. No – I was disillusioned because I was to believe we were all the very best and most diligent students of all and because I heard no words on doing good for humans or humanity. I was not diligent – almost lazy if you asked my closest friends and family - and what did it even mean to be the brightest students? I could not relate to this rhetoric and instead of positioning me – as the purpose of the speak most likely was to present – as a group member of the best of the best; I withdrew myself and wondered what all this meant for my future praxis. I did not understand the meaning of the words and if they meant, what I thought they did – I would not like to see myself as such a person. It put me in a position of wonder, which have followed me ever since.

Once when working at a gynaecological ward during my education to become a doctor, I followed an older, experienced and very charismatic chief physician to a patient who was back on the ward after an operation. She was to be transferred to another hospital for a more complicated operation than it was possible to perform where we were. She did not know what was going to happen to her, before we came, and she looked at us with fear and anxiety – at least that was how I understood her bodily expression. My older colleague sat down next to her, took her hand, looked her in the eyes and very gently just told her, she was NOT going to die. He did not say anything more and she cried – for about a minute. He let her cry until she stopped before he asked if she was ready to hear the rest.

This is without any comparison the most beautiful communicative experience I have had during my reach for becoming a doctor, and it is one of the strongest catalysts for me as a psychologist to understand the communication between humans in asymmetrical hierarchical positions, when speaking and particularly when communicating so much further - in silence too.

Years later – during my psychology study – I was taught that the skin was a rigid border that demarcated the definition of a human. I agreed on the demarcation to the extend, of a non-pathological self-image in the surrounding world we live in. But the skin is anything but rigid. And the way of working with psychological issues as well as medical ones are really not that different from each other. I was struggling to find my way into connecting my two horizons of knowledge – one from medicine and one from psychology.

In my further research in asymmetrical communication and hierarchical contexts, I was asked as a psychologist to teach communication in the healthcare system for doctors and nurses together with my colleague Anette Søgaard Jensen. This process of developing a new way of lecturing courses in communication in the healthcare system in Denmark and my cooperation with a clinical psychologist, with a very special and nuanced way of relating to her patients when communicating, became the knowledge base - full of information - that could help me answer some of the many questions I have, and eventually change the custom way of teaching these courses.

1.1. WHAT IS THE QUESTION?

There is actually not only one question. There are mutual – and all of them equally difficult to grasp the essence of, and equally difficult to answer. First of all, it is crucial to address the skin from a psychological boundary as well as the biological, physical and chemical; as to understand the semi-permeability of the skin in both ways. Following this issue, the question of **how it is possible to understand communication and meaning-making through the skin arises** – especially in asymmetrical contexts. Next, arises the question of **how this embodied understanding of the skin as a physical and psychological boundary holds the ability to control and/or integrate communication and meaning-making.** As to answer these first questions, the main focus has been put in the research area of communication between healthcare personnel and patients in the Danish healthcare system. Hereby the last question arises of **how we can develop a new approach of educating communicative aspects in the Danish healthcare system**, as to reduce complaints, misunderstandings, misinterpretations and increase both mutual understanding and understanding of one self in establishing communicative relations.

To answer these multiple issues, the main research focus is put on the courses in communication for doctors and nurses at the oncological wards at Aalborg University Hospital. As to create a solid opportunity to develop new theory and eventually new praxis in the healthcare system; a police officer with a scar from a traumatic sustained deep wound, a conductor and classical musicians have participated and helped develop a foundation from where it becomes possible to direct further investigation to develop new theory and praxis.

When skin is to be understood as a medium through which the world is understood, communicated with and has a role to play in creating identity - and the skin therefore becomes the focus in the individual meaning making - it seems necessary to introduce a new concept. *Semiotic Skin*. The idea of the Semiotic Skin builds on the skin description in natural sciences, where it is a semi-permeable membrane instead of a rigid limit between “me” and “not-me”. This physiological understanding of semi-permeability is then the basis for understanding semiotic skin as a “skin on the skin” that becomes the media for communication and meaning making. The doctor takes the patient’s hand to frame the complicated message about the future fate of the latter. The touch unites both into a new social unity—the patient and the doctor are together, by being literally “in touch”.

Not only is the semiotic skin a new concept to be introduced. The use of the semiotic skin in the medical practices lead to the notions of *The collective doctor* and *the collective patient*. These new terms are key concepts in understanding the complex and multi-faceted communication between a doctor and a patient as well. In this area of the research it became very clear that bodily communication had to be further investigated as to even grasp the idea of understanding communication from an individual, practical angle as well as a theoretical one, that had the ability to notice most of all the elements in any communication between human beings.

1.2. HOW TO ANSWER

To understand the skin as not only a biological boundary, but also a psychological and semiotic boundary in which communication, meaning making and identity is held – it calls for development of a new theoretical frame. This frame is built to understand how embodied communication, meaning making and creating and maintaining identity via a semi-permeable membrane is controlled and integrated as a tool in these complex processes. The skin as a definite limit between human and environment (Johansen, 1997) must be questioned in the sense of living as embodied with a skin that represents a semi-permeable boundary through which the world is experienced, the self is understood and communication in any way is possible.

The world is being experienced as embodied and these experiences manifest the foundation of constructing a self (Gillespie and Zittoun, 2013), and the skin surrounding the body expresses culture and communication. Hereby the skin becomes a separating and uniting devise that holds the notions of a canvas bearing memories (Sammut, Daanen and Moghaddam, 2013; Wagoner, 2011) and communicative tools via different expressions. A scar can thus represent a connection between a psychological and biological boundary (Farr, 1997). Since the biological membranes are semi-permeable, they restrict the flux across the membrane in a constant communication between inside and outside of the cell (Geneser, 2011; Rhoades and Bell, 2009). The human body has the same opportunity of permeability as the single

cells in the body (James, 1890) and thus represents both physiological, biological and psychological processes.

A part of the aim of this project is to find a way to explain how deep invasions, creating scars on the skin, become personal-cultural signs that operate as memory devices connecting the personal past with the anticipated future (Valsiner, 2014; Wagoner, 2011), as to develop the Semiotic Skin Theory. When these memory devices, constantly creating a fluidity of thoughts and feelings, which develops a process in mutual dialogue, are becoming mediators of internalization and externalization, it shows a dialogical process that entails the theorization of the skin as a communicative medium and hereby gives the foundation of understanding a semiotic skin as "a skin on the skin". A skin that is regulated by the owner of it but can be intruded and hereby change permeability in certain contexts. This permeability thus comes to represent the arena for played out communications between healthcare personnel and patients, which lead to a new understanding of asymmetrical communication and how to further develop courses in communication for healthcare personnel.

When establishing the contact between a doctor and a patient it encounters cooperatively a process in which they both mutually tries to make sense of the other. In this process both the doctor and the patient is establishing a relationship (temporarily though) that can be seen as a partnership in which they both find understanding of each other (Valsiner, Bibace & LaPushin, 2005). In the Partnership Model (Bibace et al., 1999) it is emphasized that the communication between doctor and patient is a process of mutually meaning making. In this meaning making the semiotic skin as a semi-permeable medium of communication is incorporated. The semiotic skin so to speak regulates the flux of information and signals – they be verbal, non-verbal, physical or even silent.

A problem in the dialogue is to decipher what is being meant by what is being said. If this riddle is being pursued with an approach based on the knowledge of plural meanings, it will be based on the notions of how states of *inter-subjectivity* and shared social reality can be achieved in the meeting between two different persons with two different worlds. Some of the knowledge is basic meaning and embedded in the everyday language but some of it may also be embedded in very abstract ways and will therefore, not be perceived as meaning making in a common code in a person's known social world (Rommetveit, 1985).

Human dialogue can have the purpose of interaction between two or more people to hereby create a basis of human development. It can also be a symbol and through interpretation become meaning making. When this dialogue has made the basis of making meaning external it gives the ability to internalize the manifold aspects of the external world in the mind of a human (Valsiner, 2006/2014).

This project builds upon cultural psychological theories in understanding humans as being embodied, moving through life in irreversible time (Sato & Valsiner, 2010; Zittoun, 2012). Also it will build upon ideas of life ruptures that becomes catalysts for self-reflection that leads to changes in semiotic-skin permeability in order to create flow of communication and meaning making (Cabell & Valsiner, 2014; Peirce, 1878/1998; Gillespie & Zittoun, 2013) Skin will be described as a biological membrane and the physical - as well as the philosophical - understanding of the skin (Geneser, 2011; Rhoades & Bell, 2009) will be an integrated part of the theoretical framework as to be able to understand the similarities and the discrepancies between a psychological and a natural scientific understanding of the skin as communicator.

As a special approach to understand communication through the semiotic skin and how it is regulated verbal and non-verbal the “Partnership-theory” will be introduced (Bibace et al., 1999) as well as communicative theories from health psychology and medicine (Charles, Gafni & Whelan, 1997/1999). There will be an emphasis on providing new comprehensions of the connection between disciplines originally sited in different theoretical frameworks.

These different disciplines count not only the medical descriptions and understanding of a biological and physical skin, but they also count the theories and praxis professional musicians and conductors as to integrate different approaches in a cultural psychological framing. When building this multi-disciplinary framing, the further theorization and praxis implementation becomes ever so much more nuanced and complex. The attempt to overcome this complexity, a special composed methodological approach has been created.

All material collected in this research is based on qualitative methods and a solid foundation in cultural psychological theory. Working in the field of cultural psychology though, is a very varied approach to psychological research and theorization. It implements numerous aspects of other theoretical research areas, such as philosophy, sociology, medicine, music etc. All of them necessary to incorporate in the theorization as to gain enough knowledge in their fields to implement in the empirical praxis performed at the hospital.

These multiple areas of theory and practical expressions – especially in the musicians’ world – have been analysed, interpreted and implemented in the further work of creating new theory as to develop the new course in communication in the healthcare system at Aalborg University Hospital.

CHAPTER 2. THE PROJECT

At the very beginning of this research, the focus was mainly on creating the first steps into the Semiotic Skin Theory (SST), which was done on the foundation of an interview with a police officer who got shut in duty under a terror attach. This combined with a cultural psychological theoretical foundation became the first approach into describing SST.

To answer the last part of the research questions – and to collect data material, as to further develop the theoretical foundation- the cooperation with the oncological wards at Aalborg University Hospital was established. The first steps into describing the SST became helpful when a course in communication for younger doctors at these wards were to be developed.

I developed the first scaffold of a new approach of understanding communication in the healthcare system and from here emerged a structure of the communication course. In the winter of 2016/2017 the head of psychology at the oncological wards in Aalborg – Anette Søgaard Jensen - and I delivered the inaugural course in communication for younger doctors at the wards. Later that spring the first courses in communication for nurses followed.

In a collaboration between Aalborg University (AAU), Aalborg University Hospital (AUH) and The Niels Bohr Center for Cultural Psychology; a new course in communication was developed to younger doctors and newly employed nurses at the oncological wards at the AUH. The two courses had two different build-ups since the scheduling and professional cultures are very different in the two groups. To avoid an increasing amount of patient-complains, coursed by mal-communication, the head of education and executive consultants at the oncological wards at AUH, launched this cooperative course.

The course for the younger doctors were two days with one week between. The first group was 12 doctors with medical experiences after graduating medical school at university, ranging from 2 years to 15 years. being a younger doctor in Denmark means, they have not yet finished their specialties in oncology. The most experienced have a Ph.D. – while entering special training in oncology.

The first task for the participants were to answer two questions.

1. Describe in details a communication with a patient that went well.
2. Describe in details a communication with a patient that went problematically/inadequate.

Right after these answers we had a plenary discussion concerning these two questions. It was a requirement from professor, head of education and executive consultant, Ursula Falkmer (AUH) to implement roleplays, which were introduced right after these discussions. The participants were put together two and two with the task of playing both doctor and patient in the difficult dialogue when the patient is terminally ill. The participants were filmed during this task. Afterword there was a plenary discussion on how these different roles affected them and how they felt about the partner's attitude and behaviour toward them in both roles.

Following this discussion were roleplays with me as the patient and volunteers to be the doctors. During the plenary discussions it was made clear that the two most difficult kinds of patients were the angry or aggressive patients and the very quiet ones. I played both roles and again there was a plenary discussion about these experiences. As the first roleplays, so was these filmed. Ending this first day was answering a last question: *What does death means to you*?

This second day also held the answering of the first two questions:

1. Describe in details a communication with a patient that went well.
2. Describe in details a communication with a patient that went problematically/inadequate.

This time their reflection should though only be considered from experiences the last week in their professional actions.

One week later on the second day, there was a long introduction wrapping up the outcome of the written answers from last time and introducing theories on the partnership model, SST and communicative approaches from psychological theories of language. Short interviews and observations were implemented and performed during both days.

Courses in communication for nurses were built in – as a three-hour course - in the end of a whole day of education for nurses at the oncological wards. First they were lectured in specific medical approaches on the wards by two experienced doctors.

These two courses had 12 participants each time. First they introduced themselves and answered two questions: 1) *what is the most difficult aspect of patient communication* and 2) *what do you expect to learn today*? Right hereafter they were introduced to the same theories as the doctors and then divided into groups to discuss the material according to their own experiences. these discussions were observed and noted. Ending of the day was a long plenary discussion on their experiences of the day and the outcome of it.

During the long period of developing courses in communication for doctors and nurses in the healthcare system, it became clear that there was a severe need of understanding the complex processes between doctor and patient when they communicate. A very close and deeply moving cooperation with paediatrician Elise Snitker Jensen was established and gave a tremendous amount of information on verbal, non-verbal and bodily relation-making. I followed her work and she described her own reflections in the special cases.

The bodily expressions became very clear as tacit understandings in communicative theories – until Anette Søgaard Jensen showed me how musicians work with their senses as to relate and communicate. She performed - as a musician would have done - in her practical psychological work with her patients at the hospital, and thus showed an exceptional contact and relation with them. Then the bodily expressions became very visible and the tacit aspects of internalization then was addressed in theory and praxis expressions as connected.

This music-bodily approach gave birth to further investigation into this area of performance and theory. Cooperation with classical musicians – especially Claus Ettrup Larsen – contributed with a solid understanding of the embodied communication between musicians as to create good music. They not only react towards each other as musicians, they also relate to the conductor.

Following the conductor, Peter Ettrup Larsen, in his work as a conductor and a lecturer in non-verbal communication contributed with endlessly awe of how one person can connect with numerous adults and children in his approach to create mutual expressions. Without using one word.

CHAPTER 3. FURTHER STRUCTURE

In the following chapters, articles and published chapters in relevance of reflecting on the research questions are recited. The order of these chapters are positioned as to create a relevant chronology in understanding the build-up of a theoretical framing as to answer the research questions. The theoretical foundations in these publications are built from the practical acknowledgements from the empirical research in this project.

They do not directly analyse the empirical data, and are thus the theoretical foundation of a further analysis and discussion of the data material as to reach a conclusion in which the answers are incorporated. Before each chapter there is a short introduction to the publication and they all ends with an epilogue with a short reflection on the relevance of the theorization and how to further investigate the subject as to create a foundation from where it becomes theoretically possible to analyse the data material.

Since there are no publications with a direct analysis of the empirical data, chapter 9 is a methodological review of the mixed approach to the research design and thus provide the foundation of the analysis, described in chapter 10. The analysis of the data material will be described in relevant details as to gain knowledge of dynamics in which it shows both theoretically and empirically possible to answer the research questions.

Hereby the end result is described in the conclusion, in which the ideas of how to implement a new way of understanding asymmetrical communication can be implemented in a new design of communication courses in the Danish healthcare system.

CHAPTER 4. SEMIOTIC SKIN THEORY

Understanding the skin as a biological demarcation between human and environment is not enough. The separation between the biological and psychological aspects of embodied being and communication in the world we live in, must be combined as uniting entities. This unitedness holds the aspects of being able to make sense of life in any way possible. *Thresholds of sense* (Innis, 2016) and *moral normativity* (Brinkmann, 2016) are the essences of making sense of life as embodied, inclusive mental processes. To be able to describe these processes of meaning making as embodied, the flux through the semiotic skin as connected with the biological skin, becomes the one construct to combine the multifaceted aspects herein. The intersectional flux thus represents the process of meaning making via interpretation of the relations between a human and the environment.

Interpretations of reflections between an unending spiral of semiosis and the self-reflecting systems in everyday life and communication as embodied are the very foundation of the semiotic skin. The very bold claim that the skin can be as a brain (Hoffmeyer, 2008), will be further explained in the following article, and hereby the idea of how the skin can be the holder of identity and overall the foundation of meaning making emerges. External and internal stimuli structure the skin-awareness as a meaning making phenomenon that combines the biological skin with the semiotic skin and thus provide the arena of played out socio-somatic-semiotic expressions (Neuman, 2003). The semiotic skin is the arena of expressing culture, communication, psychology, biology and thus it creates meaning and identity (Nedergaard, 2016).

4.1. ARTICLE 1.

Nedergaard, J. I. (2016). Theory of Semiotic Skin: Making sense of the flux on the border. *Culture & Psychology*. Vol. 22(3), pp. 387-403

Theory of Semiotic Skin:

Making sense of the flux on the border

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Abstract

This paper builds upon the two concepts ‘thresholds of sense’ and ‘moral normativity’ – from Brinkmann and Innis as the essence of understanding meaning-making, perception and interpretation of life as embodied mental processes in the intersection between cultural psychology and philosophy. To live and make meaning of life as embodied does though also incorporate biology. There will be put a notion on the separation between psychology, philosophy and biology to unite these entities as to make sense of embodied meaning-making in life. A separation that unites as to make meaning as embodied will be incorporated in the description of a Semiotic Skin as a skin-on-the-skin, which holds a flux of information. Conceptualization of the flux across the Semiotic Skin is emerging in the intersection between psychology, philosophy and biology and hence becomes the essence of meaning-making and constant reflection between a self-reflecting system and semiosis. This becomes the foundation from where the theory of the Semiotic Skin emerges. The Semiotic Skin will be described as the holder of expressions of culture, communication, protection and one’s self in the sense of psychology, philosophy and biology as to register and control hierarchies of signs in the process of meaning making and identity.

> *What holds ‘‘inner’’ and ‘‘outer’’ apart? The answer must come not by way of transcendental build-up but by indications of pertinent fact. Bluntly the separator is skin; no other appears.*
>
> (Bentley, 1941, p. 3)

Introduction

The very interesting notion of Robert Innis’ main contribution in his article ‘Between Philosophy and Cultural Psychology’ (2016) is his concept of ‘thresholds of sense’. This concept holds the very notions of how human beings build up their meaning in life. This emergence of making meaning holds the notion of mental processes as those are embodied in cultural forms as a principal theme of cultural psychology and philosophical semiotic. Also Innis (2016) describes a conventionally conceived psychology as concerning how human beings perceive and interpret their world in order to act physically and mentally. This notion is also described by Brinkmann (2016), in his comment on Innis’ article, as he outlines psychology normatively. As Brinkmann (2016, p. 377) puts it: *‘Psychology, as conventionally conceived, is concerned with describing and explaining mental processes. It asks how human beings perceive, think, feel, and act, but without taking a stand on the normative appropriateness of what they do’*. This aspect is very interesting in the light of what he calls a ‘moral normativity’, while he sees psychology degenerate into physiology

or even neuroscience without this moral normativity.

Without moral normativity, psychology degenerates into physiology or perhaps neuroscience. The organs of the body simply function or not, and the synapses of the brain simply fire or not; they have no reason for doing what they do (and thus demand causal explanation). But the person who has the organs and the brain often has reasons for doing this or that, which can be articulated, challenged, and discussed. This is what makes a person a person. . . (Brinkmann, 2016, p.379).

Both Innis and Brinkmann describe separations between psychology, psychologies, philosophy and even biology. Separations – distinctions – have twofold functions. They bring connected phenomena apart, and – at the same time – mark their connection. A border is both a separator and uniter of the adjacent parts of a whole. Borders eventually must be understood as uniting entities in order to make sense.

The descriptions and use of both Innis' and Brinkmann's (2016) reflections, which intersect between cultural psychology and philosophy, point out the transactions between humans and the world in which we live in and act in. For me to work further on these ideas and statements, I will describe and develop an understanding of the body as a semiotic communicator and reflector by introducing the skin as the kind of medium in both a psychological and philosophical way – in which the biological understanding is intertwined. In this paper, I will build upon this notion of a separation that unites as a basis to show the metaphorical understanding of a Semiotic Skin which also separates and unite in order to make sense. The concept of thresholds of sense will be incorporated in the very understanding of Semiotic Skin as a border zone.

Sense-making through the skin

In order to experience and interpret – meaning-making for humans is not only based on a logocentric approach but indeed on the way of active participation in relations with others and the surrounding world (Innis, 2016). Making meaning, of these experiences with others and the surrounding world, is central for humans since they live in irreversible time and in this sense gives the aim of catching an experienced phenomenon as closely as possible in the concept the experience – as the latter – takes place.

In centuries the skin has been described as the definite limit between human and environment (e.g. Johansen, 1997). In this interpretation the body becomes crucial and therefore the skin, as a biological boundary, but indeed also as a psychological and philosophical tool, becomes the essence of understanding how humans make meaning through creations of, e.g. artefacts and nonverbal, symbolic devices. In the process of meaning-making through interpretation of experiences within the human itself and with the environment, what is known will be constructed. *'. . .what is known is not in any coherent sense a 'cause' of knowing, but the 'outcome' of complex*

processes on many levels and of many types' (Innis, 2016, p.xx). In this sense, the understanding of the skin as a border through which a flux of information, experiences and inputs occurs leads to the notion of a Semiotic Skin as the first metaphoric expression of a theory in which sense-making becomes incorporated in its complex and multifaceted forms.

Thresholds as borders

The way meaning arises for human beings and becomes embodied in cultural forms, Innis (2016) describes in fundamental matrices as Thresholds of Sense. For Innis the term Thresholds of Sense is a way of describing how humans create and relate to meaning and meaning-making in life. By the description of a selfreflecting system and an unending spiral of semiosis, the reflections between these systems of signification connect via two closely related thresholds (Eco, 1976, p. 315). The upper threshold, represented by a system of signs in cultural forms in society/environment and the lower threshold which is limited by the embodied 'matrix of lived through' life that is not explicitly articulated in activities (Innis, 2014, p. 257). Between these two limits it is possible for human beings to make sense of experiences.

The interesting thing about thresholds of sense in Innis' writings (2014/2016) is the notion of the composite activity of signification between the upper and the lower threshold, where it becomes possible to understand human sense-making in forms of embodiment and experiences. With a focus on the upper and lower threshold the process of making sense is situated in the intersection between the individual human being and the environment as well as within the person him-/herself. This specific way of understanding the process of meaning-making in the intersection between two thresholds will in the following be developed through a theoretical as well as figurative description of the Semiotic Skin in a biological, semiotic, psychological and philosophical incorporation.

Cultural psychological processes

It is through the manifold socially shared cultural resources that internalization and externalization make it possible to reach an understanding of an entirely unique body and mind. The human skin is the ultimate boundary between the body and the external world. Above this level the cultural–psychological processes are internalized and externalized and through signs regulates the human psyche and thus creates the foundation for identity creation (Valsiner, 2014). The relationship between internalization and externalization serves as a feed forward process. In between the internalization and externalization, a boundary emerges that outstrip the internal personal endless with the external world. This limitation creates a dialogical relationship between these two sides – while at the same time distinguish between them (Hermans, 2012).

To create meaning through internalization and externalization the human functioning is both personally designed and socio-culturally guided. And through this sense-making, signs will continuously differentiate and integrate hierarchically so that even new, unique experiences are understood in relation to similar previous experiences and reactions. These signs will therefore be the basis for generalizing beyond the situation in which it originally emerged (Valsiner, 2014).

The propensity for generalization is integrated in signs' ability to create a synthesized reflection of an initial context (Valsiner, 2001). When the sign is transformed into a generalized and trans-situational form, it will be attributed to the ability to be integrated into a preliminary unclear field of personal sense. From this ambiguous position the sign can once again be used to create meaning in new and different circumstances (Abbey & Valsiner, 2005).

In this context the signs become hierarchically organized when making personal sense and hereby becomes auto-regulating and generalized meta-signs. These metasigns become promoters for a feed-forward function that depicts possible boundaries in making sense of the unforeseeable future. In this kind of future, a person will constantly create meaning in advance of time if/when needed (Valsiner, 2014). This hierarchically organization is also to be seen in the descriptions of the different layers of the Semiotic Skin.

Skin as biological wrapping

The ever-changing organ – the skin – is constructed of three layers: Two layers, dermis and epidermis, and an underlying subcutaneous layer. The skin, as a whole, functions as a protective boundary and it is the surface of contact with the environment. In this contact with the environment and with the inner metabolism, the skin is involved in the homeostasis of the body (e.g. temperature regulation, pain reaction, etc.) as well as it connects with the environment (e.g. blushing, scars, etc.). Through the three layers there are channels of communication that allows water, nutrients, waste products and sensory signals to flow. This permeability is absolutely necessary for, e.g. heat regulation and absorption in order to play an active role in the immune system (Bojsen-Møller, 2002; Geneser, 2011; Rhoades & Bell, 2009). This kind of permeability becomes interesting in understanding the flux through the Semiotic Skin as well but the deeper biological explanation of the functions of the skin is beyond the scope of this paper.

The permeability of the skin is highly restricted in the sense that some actions played out on the skin surface are totally blocked and others are allowed passage. A crucial distinction is between penetration and absorption. Skin absorption only occurs when chemicals are able to break down the skin barrier, through the three layers, to reach the bloodstream. A penetration represents a chemical that exist unchanged through all three layers and is therefore not absorbed in the body system. A penetration can as

well be of mechanical nature that creates a scar and does indeed affect the body system (Bojsen-Møller, 2002; Geneser, 2011; Rhoades & Bell, 2009).

The distinction between penetration and absorption becomes the platform from where the psychological, philosophical and cultural understanding of the skin gives the answers of understanding the Semiotic Skin as a new concept – as to be able to understand the similarities and the discrepancies between a psychological and a natural scientific understanding of the Semiotic Skin as communicator. As to be a communicator in any way, different forms of thresholds are crucial in order to establish the link to become meaning-making (Innis, 2016) and to link this meaningmaking to a cultural psychological and philosophical aspect (Brinkmann, 2016).

The skin as a boundary

The skin as a boundary has two sides – an inner and an outer – which represents two very different descriptions as well as understandings. The inside of the skin represents a biological and physiological understanding and the outside represents a cultural from where life and communication is played out. The inside contains three layers of skin and under these there are further biological elements. The outside also represents layers in which different aspects of meaning-making and cultural influences take place.

Biological membranes are permeable under specifiable conditions. They give the opportunity to restrict the flow of ions or molecules and thereby give the opportunity to create an environment optimal for the cell. Also there is a constant communication between the internal and external substances of the cell. This permeability is by James' (1890) words also an opportunity the human body is capable of. Not in a physiological or biological way, but in a psychological and mental way.

This particular way of communication between the cells also holds the notion of communication from biology to psychology. The cells belonging to the skin communicate internally as well as they communicate with the environment through special receptors. The skin is generally acting as an interface with the outer world, which shows a topological boundary but at the same time opens the connection towards the world. This semiotic capacity opens the question of where the self and the person's identity 'begins and ends' – the brain is not enough!

The skin as a biosemiotic agent has both an inside and an outside, which establishes an asymmetrical connection between these two sides. What is inside (the self) does only exist while it has a reference towards the outside. But on the other hand this reference presupposes a counter-reference from the outside towards the inside. As Merleau-Ponty (2002) puts it, subjectivity is bodily. By this he means that living as embodied is neither just as subject nor just object but rather in a way that overcomes

these oppositions. Hereby the skin in particular holds the ability to communicate in multiple ways as well as it holds the references to the world in biological, psychological and philosophical ways.

The biological skin register through sense receptors and by this it is able to adapt both physical and psychological challenges (Rhoades & Bell, 2009). This specific ability to adapt is also the very essence of the meeting with other people. The skin tells tremendously many things as structure, smell, colour, tension, etc. and hereby holds the exchange of information between people (Hoffmeyer, 2005). In this sense, the concept of Semiotic Skin becomes interesting in the understanding of the skin as a construction of a boundary that represents a physical, psychological and philosophical communicative medium. Not only is the boundary constructed by the owner of the Semiotic Skin, but it is also preserved by the individual as to be able to create identity through meaning-making in the communication through the Semiotic Skin.

Locating the central border: The skin as a brain

The unity if biological and cultural perspectives in the sciences are exemplified by the area of biosemiotics. From the perspective of biosemiotics, the skin is representing both biological and semiotic reflections: *'Biosemiotics is the study of the myriad forms of communication and signification observable both within and between living systems. It is thus the study of representation, meaning, sense, and the biological significance of sign processes'* (Favareau, 2010, p. v.). These sign processes become relevant when the beginning of life is described as an intertwined part of the skin as the very essence of a person's understanding of his or her individualization. In his effort to connect a philosophical and (cultural) psychological insight of the skin as a communicator, Hoffmeyer (2001) uses the biological membrane as a foundation of this particular understanding. There is no doubt that the structural-dynamic feature of the membrane is the absolute core of all living systems. Skin is one of such basic membranes. Later in his work he especially reflects on the notion of the skin in an infant:

> *When a child is born it is its skin more than anything else. . .. . .[It] is a kind of pre-actual atmospere, and what enters the awareness of the infant is grades of intensities of touch, taste and smell. In a certain sense the infant's skin is a type of brain, while it is where encounters with the world first freezes into the vague structuring of awareness.*
>
> (Hoffmeyer, 2005, p. 33)

The infants skin as a type of brain is interesting while it gives an opportunity to understand the skin as a far more integrated and internalized part of mind in meaning-making in the sense of creating identity by the flux of communication through not only the biological skin but also a skin as a type of brain – a Semiotic Skin.

Getting into Semiotic Skin – By creating signs

This description of the semiotic of the skin holds a special notion of biology, psychology and philosophy. The ideas of the skin as biology are of course obvious. But the connection between this biological understanding of the skin and the (cultural) psychological intertwined with the philosophical might not be so obvious. Instead of understanding the skin as a demarcation between an inner and outer position where the identity and psyche is represented by an inner topological position, which cannot be confirmed by natural sciences and therefore is seen as fictive by some philosophers (e.g. Dennett, 1987), it might be more interesting to see this from the perspective of the skin (Hoffmeyer, 2008).

The personality, as the psyche, of course presupposes the brain – but it is not necessarily placed IN the brain (Brinkmann, 2009). A bold claim could be that the psyche is organized THROUGH the skin – not IN the skin – as the skin is the functional border, but this notion will be beyond this paper to describe.

An abstract boundary

The Semiotic Skin is to be understood as an abstract membrane in the sense of a socio-somatic-semiotic dynamic (Neuman, 2003) and from the understanding of human beings' ability to make things meaningful by separating them from other things in the life span. This ability also provides human beings with the notion of understanding this abstract boundary as a uniting device in the same time as it being separated (Marsico et al., 2013).

In order to be able to even describe the notions of the Semiotic Skin – as a 'skin-on-the-skin' – it is necessary to introduce a step-by-step specification of the skin as a physical and biological boundary before the psychological can be introduced. In this process, the first introduction must be a partition. This partition is then the foundation from where the notion of a border zone is explained. In this border zone, different characteristics will be included in order to create the vision of a skin or a border zone in which communicative aspects are incorporated.

Step by step into Semiotic Skin

Around this border zone there will emerge an asymmetry whilst there will be an effect on the border zone from both the inside and the outside. These two sides are obviously different from each other and thereby gives different influences on the border zone. Since the border zone is now influenced from both inside and outside environments/aspects, the border zone comes to represent a defining of the relations of system with environment within this zone. Meaning there is a communication across the border zone between the inside and the outside.

When the border zone is the area of defining relations between the system and the environment it also comes to represent the opening and closing zones of whether an impact from the outside, e.g. is in any way relating or not relating to the system. If an impact from the outside is not relating to the border zone the counter-impact from the inside will then maintain the border (Figure 1). When a human being takes on clothes, e.g. it does not raise any consciousness of feeling the clothes on the skin when wearing it. This non-awareness is maintained by a constant counter-impact from the system in order to lighten the amount of neurological information. In this process, the nervous system's coordination of the activities across the cell membrane means that the propagation of an action potential – the release of neurotransmitters – and the activation of receptors for these specific neurotransmitters are not reaching threshold as to emerge a synaptic transmission. The lower threshold is not reached (Innis, 2016). Even though the chemical transmission across a synapse is not initiated, the electronic signals – that spreads electronically via the passive properties of the neuronal cell membrane – are initiated by local current flows and decays with distance from their side of initiation (Rhoades & Bell, 2009, pp. 38–63).

The other scenario across the border zone is an impact from the outside that relates whilst it is located in an opening of the border zone. When an impact does relate, a counter-impact from the system sets up the relation WITH its counterpart from the other side and thereby creates a connection. In this connection is incorporated a communication or contact between the two impacts but also it creates a communication or contact with the rest of the system or organism (Figure 1). Returning to the nervous system and the function of signals, the process in this understanding is the action potential.

". . .an action potential is an electrical signal that propagates over a long distance without a change in amplitude. Action potentials depend on a regenerative wave of channel openings and closings in the membrane" (Rhoades and Bell, 2009, p. 39).

This action potential will only occur if a certain threshold has been reached. As Innis' (2016) description of Thresholds of sense, these action potentials also holds a notion of meaning-making relating to the environment (culture) in a psychological and philosophical way as Brinkmann (2016) explains. In this sense, these thresholds of sense become the direct links between the biological skin – that encounter the environment/culture – and the Semiotic Skin that holds the notion of connecting cultural psychology, philosophy (Brinkmann, 2016) and biology.

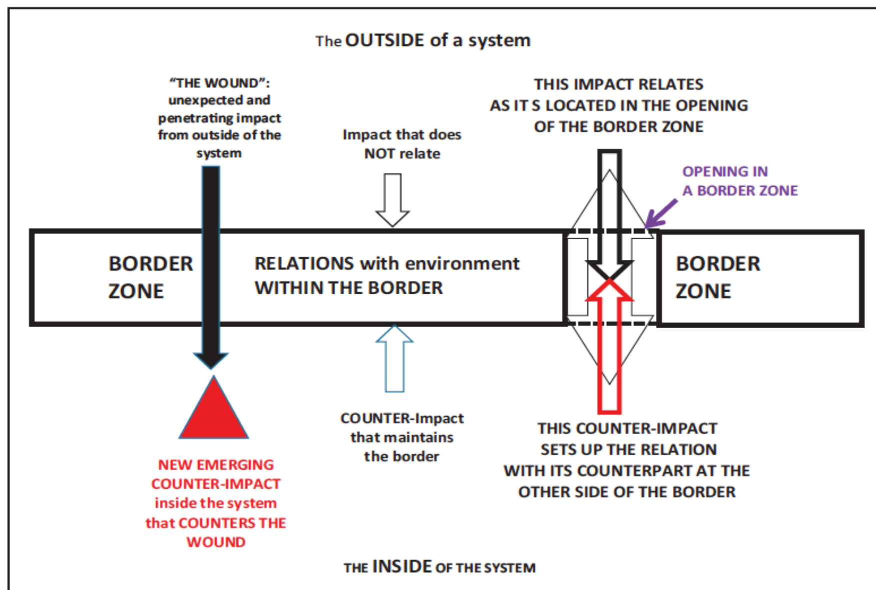

Figure 1. Penetration and counter-impact

From action potential to a flux through Semiotic Skin

An action potential's generation and propagation is a result of a depolarization of the axon hillock to threshold. When the electrical part of the nervous cell communication has reached threshold, the second part of the nervous signal occurs. This part, on the other hand, is a chemical signal in the synapse between two nerve cells (Baynes & Dominiczak, 2005; Rhoades & Bell, 2009). This notion of impact and counter-impact in the flux through the cell membrane by opening and closing channels during an action potential when reached a threshold gives a nice description and understanding of the flux through the Semiotic Skin as well.

Phenomenology of the wound: Border crossing and penetration

As a step further to understand the border zone in the sense of a skin – not only a cell membrane – it becomes crucial to describe the reactions of an unexpected and fully penetrating impact from the outside into the inside. By this penetration a wound in the border zone is created and a new emerging counter-impact from the inside of the system is activated in order to counter the wound (Figure 1). This 'wound' can be understood as both biological/physical and psychological. In this first presentation, the focus of understanding will be put on the first. The latter understanding will be put into play later in the description and exemplification of the Semiotic Skin. In a cell membrane a rupture causes death of the cell since the cell has no ability to exchange

materials by diffusion or osmosis. The interesting part of the cell membrane is the fluidity in the double phospholipid layer and hence the plasticity. This plasticity gives the ability to control where and how the communication between the inside and the outside of the cell is managed by, e.g. protein channels (transport proteins) and alpha-helix proteins (integral proteins).

Changing the scenario from the cell membrane to the skin, as the border zone, the counter-impact from the inside to the wound is very different. The counterimpact is a cell proliferation and activity towards the recovery of the tissue – creating a scar. In this biological approach from the body, the cells around the penetration are either ruptured or becoming a part of the regeneration of tissue in order to close the rupture towards the outside. A penetration of the skin is unexpected and unwanted – from the inside of the system – in the sense that it is not possible to maintain equilibrium for the system/body, if the rupture is not closed. In order to maintain this equilibrium, the signalling from the wound to the body causes activation not only in the cells just next to the wound but also to electrical and chemical systems in the body in order to increase the cell proliferation in order to close the wound – structuring scar tissue (Baynes & Dominiczak, 2005; Hebda, 2009; Rhoades & Bell, 2009).

The difference between a relating impact from the outside, with its compared and incorporated counter-impact from the inside, and an unexpected and penetrating impact from the outside with its NEW emerging counter-impact from the inside, is the acknowledged and expected reactions and influences in the relating impact that is already incorporated in the cascade of understanding and internalization of the impact to the sudden impact that the inside environment is not constantly aware of or open towards. This means that when an impact is unexpected, the counter-impact is drastic in a physical and biological understanding. But not only is the counter-impact of a biological notion – it also becomes psychological.

Semiotic Skin as a skin-on-skin

From all the above-mentioned aspects it only now becomes possible to build the theory of Semiotic Skin. The Semiotic Skin is to be understood as a skin-on-the-skin, which means it is presented on the outside of the biological skin. The Semiotic Skin surrounds any parts of the body and represents a layered sign-organized protection devise. Looking at the biological skin and the Semiotic Skin as a whole and understanding it as a psychological system, there will be an outside and an inside of these layers as described around the border zone. From the inside there will be a maintenance of BOTH the biological skin as well as the Semiotic Skin. This maintenance is anchored in the psychological positioning of both skins in order to make sense of any impact and counter-impact (Figure 2).

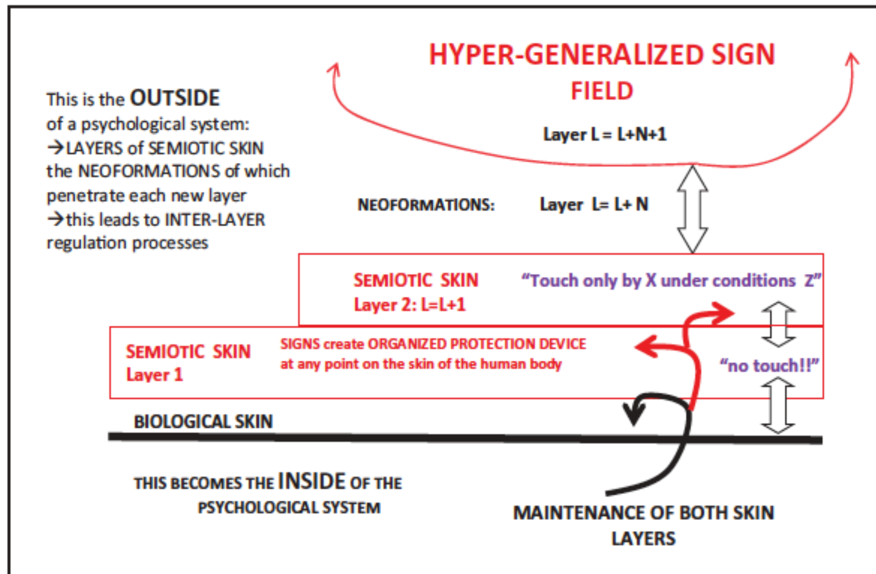

Figure 2. Skin-on-the-skin layers

The first layer of the Semiotic Skin – which is closest to the biological skin – will represent the perception of ‘no touch’. As described with wearing clothes but not registering the touch from it, the first layer of the Semiotic Skin shows the same ability since the neoformation under certain conditions is not being registered or even not occurs. Second layer represents the ‘touch by X under Z conditions’ and the third layer represents the ‘deep touch’. The forthcoming layer will be L=L+1 and represents higher hierarchical representations. Layers outwards of L+1 will be L+n and eventually reaching a hypergeneralized signfield, L+n+1 (represented by, e.g. ‘my home’) (Figure 2).

This means that the Semiotic Skin growth new layers which sets up new tasks of interlayer’s dynamic relations of opening, closing, neutralizing, redirecting, etc. these layers are locally set in the sense that many layered parts of the Semiotic Skin can be situated next to minimal Semiotic Skin Layers. These layers grow outwards from the biological body and even in some moments losing immediate contact with it in forms of clothing layers, environment across distance – which could be, e.g. home or neighbourhood, etc.

From the outside of the psychological system neoformations penetrate the layers of the Semiotic Skin and each new layer leads to interlayer regulation processes. This leads to a hypergeneralized signfield as, e.g. ‘my home’. And what does this mean? It means that at a certain moment new layers become cultural tools for creating places

and their corresponding hypergeneralized feeling (the actual place of home and corresponding feeling of home). But not only is the regulation of the Semiotic Skin internal, it also shows interlayer dynamics coming into action. An example of this interlayer dynamic could be: ‘Who can touch my body?’

- Layer 1, all over the skin: Only I myself;
- Layer 2: e.g. medical doctor or nurse. But only if they wear uniform;
- Layer L+n+1: e.g. hypergeneralized home feeling – which can ONLY be reached with a person with whom I feel completely at home.

Going back to the unexpected penetration of the skin from the outside to the inside – also the Semiotic Skin is being fully penetrated and the counter-impact from the different layers will be initiated as well as the counter impact in the biological skin (Figure 3). An example could be a police officer being shut in duty:

- In the biological skin the wound will start to heal;
- Layer 1: The ‘no touch’ layer – the response would be ‘This is ME – in my body. I wear my uniform as a police officer’;
- Layer 2: The response would be ‘how could he do THAT – it hurts’. I wear my bullet-proof west under my uniform – ‘I believe it protects me’;
- Layer L+n+1: The ‘hypergeneralized signfield’ (symbolic protection) – the response would be ‘I as a police officer. . .. It is not LEGAL to SHOOT AT ME’;
- The biological skin: The wound will start to heal from the inside-out in the biological body. (Healing of the Semiotic Skin is on a psychological/philosophical way – with interconnections to the biological healing. The specifications of this will though not be described in this particular paper).

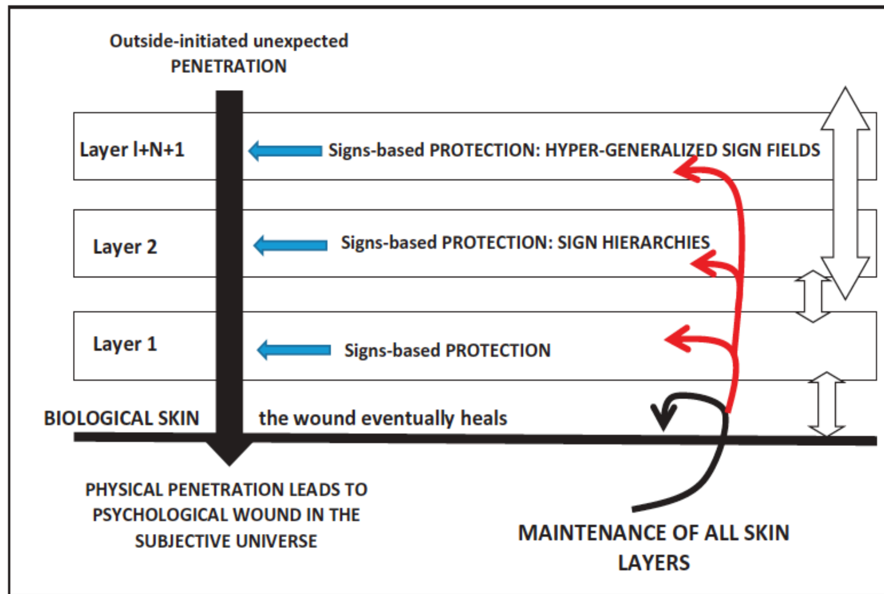

Figure 3. Semiotic skin regulation

All these above-mentioned examples – with many other examples – and theoretical descriptions become the foundation from where the understanding of the Semiotic Skin will emerge.

Semiotic Skin – The intersection for meaning-making

Innis' concept of thresholds of sense and Brinkmann's notions of a moral normativity are the exact fundamental issues needed in order to understand the skin as more than just a physiological and neurological (action potential) aspect. When a person reacts by reasons, which can be articulated, challenged and discussed, it shows through the flux across the Semiotic Skin exactly what makes a person a person – to copy Brinkmann's notion. This articulation, challenging and discussion is also exactly what happens in the intersection between the different layers of Semiotic Skin – meaning that moral normativity in connection with thresholds of sense gives the opportunity to see the skin as a lot more than just biology.

This biology is incorporated in the thresholds of sense and therefore directly connected to Semiotic Skin as to make meaning as a person. Both Innis' and Brinkmann's reflections which intersect between cultural psychology and philosophy create a theoretical foundation from where both the biological skin and the Semiotic Skin can be incorporated in these exact thoughts of acts and lived life within this intersection. In the process of meaning-making through interpretation and experience

with the person him-/herself and the environment, what is known will be constructed (Innis, 2016). This constant interpretation in the relation to thresholds of sense, described as a reflection between a self-reflecting system and an unending spiral of semiosis, the reflections between these two systems connect via an upper threshold (represented by a system of signs in cultural forms or even hypergeneralized signfields) and a lower threshold (limited by the embodied matrix of lived through life) is the very essence of a Semiotic Skin. In the intersection described above, the entirely unique body and mind rise from the manifold socially shared cultural resources that both internalize and externalize.

Above this level of internalization and externalization of cultural psychological processes, signs regulate the human psyche (Valsiner, 2014) as seen in the layer L+n+1 as a hypergeneralized signfield. At a certain moment the outer new layer L+n+1 becomes a cultural tool for creating places and their corresponding hypergeneralized feeling of this. An example could be the actual place of home and the corresponding FEELING of home or getting back to the skin – it could be the touch of a deity or rapist and the corresponding FEELINGS and perceptions of these touches. Not only is the regulation of the layers internal – also interlayer dynamics comes into play as described by the example of ‘who can touch my body’.

To create meaning through internalization and externalization, human functioning is both personally designed and socio-culturally guided. As described by Valsiner (2014) making meaning by integrating hierarchically and continuously differentiating signs, all experiences are related and understood according to previous experiences – meaning that it becomes possible, by these signs, to generalize beyond the original situation.

An example with a direct connection to the Semiotic Skin could be a police officer being shut a second time or even a woman having two C-sections where the second feeling, understanding and identification with the event is the foundation of a new meaning-making. This meaning-making is related to the intersectional communication, not only between the different layers of the Semiotic Skin, but also between the Semiotic Skin and the biological skin as well as the cultural, psychological and philosophical influences the person is disposed to.

A wound, creating a scar, from a full penetration as mentioned above is to be understood as a biological AND psychological wound. These two parts cannot be extracted from each other, since it is a full penetration. The plasticity, described in the cell membrane as an ability to control communication between the inside and the outside of the cell in the strict biological sense, gives a picture of how to understand the plasticity between the different layers in the Semiotic Skin in a psychological sense as well. The plasticity between the Semiotic Skin layers shows the same ability, while regulated by the owner of the Semiotic Skin, and hence also by the internalization of, e.g. the hypergeneralized signfields. This internalization, in a

plastic organization from the outside to the inside – as well as horizontally in the Semiotic Skin (multiple layer Semiotic Skin right next to very thin layered Semiotic Skin), creates the foundation from where further permeability of the Semiotic Skin is regulated. This emerges an anticipation of future actions and events. This leads to an externalization of these anticipations, which will all be incorporated into different layers of the Semiotic Skin. Eventually some of these will become hypergeneralized signfields, as regulative channels in the skin, and end in the L+n+1 layer.

The boundary in the Semiotic Skin, constructed, regulated and preserved by the owner, gives the ability to create identity and meaning through the flux across the layers. In these layers there is a significance of sign processes. As described by Hoffmeyer (2005), the skin becomes a type of brain for the infant and hence gives the opportunity to understand the Semiotic Skin as exactly the cradle from which not only meaning-making and communication is developed, but also where the identity lies.

The skin as an interface between the inside and the outside explains that what is inside (the self) only exists if it is in relation with the outside. This shows not only in, or through, the biological skin but indeed via the flux of information through the different layers of the Semiotic Skin AND the biological skin. Showing exactly that the Semiotic Skin is to be understood as an abstract membrane/boundary that gives the human being the opportunity to make things meaningful by separating them from other things in life span in order to unite them in hypergeneralized signfields, so to anticipate the future and identity creating. This interface between the inside and the outside, the border zone and the Semiotic Skin, has three different impacts. One that does not relate, one that does relate and the unexpected penetration. Looking at the two first mentioned – these two scenarios are directly linkable with the communicative interactions between the layers of the Semiotic Skin. Some of the impacts are not even recognizable, some will get right past the already open/permeable channels (while these are controlled by the owner of the Semiotic Skin). As for the latter – some impacts are unexpected penetrations. The 'light' version where only the Semiotic Skin is penetrated, but not the biological, could be an unexpected and unwanted hug. The full, unexpected penetration is already described via a shut wound.

The unexpected penetration, creating a rupture that the biological skin is healing in order to maintain equilibrium, also ruptures the Semiotic Skin and therefore the plastic communication between all layers (biological skin + Semiotic Skin) is fluid. BUT a scenario of a wound that might not penetrate all the layers of the Semiotic Skin could be a scratch from a cat or tree branch. This wound never gets to L+n+1 and therefore never becomes a hypergeneralized sign which the person related to either psychologically or philosophically. In this sense, the Semiotic Skin shows to hold expressions of culture, means of communication and one's self – creating meaning and identity.

Conclusion

Thresholds of sense and moral normativity show the very essence of understanding meaning-making, perception and interpretation of life in a multifaceted way as mental processes embodied as principal themes of cultural psychology and philosophical semiotic. Separation between psychology, philosophy and biology is to be seen as uniting entities as to really make sense of embodied meaningmaking in life.

In this sense, this separation that unites becomes the very foundation of understanding human beings meaning-making as embodied through the flux across a Semiotic Skin. This flux in this intersection becomes the essence of meaningmaking through interpretation and experience with the person and his/her environment as to construct what is known.

A constant interpretation as a reflection between a self-reflecting system and an unending spiral of semiosis is the ground from where the Semiotic Skin emerges. The description of a new born child as being its skin more than anything shows the skin as holding the identity through meaning-making of internal and external stimuli. Structuring an awareness via the skin also relates in adulthood with the symbolic protection, since the skin is structuring an arena from where identity is created and reflected into the world. Even as a meaning making phenomena, the skin as well as the identity it represents needs to be somewhat covered by a symbolic protection in order to make meaning – The Semiotic Skin.

The Semiotic Skin holds the reflections of a symbolic protection of identity as well as it creates a barrier towards the environment. This barrier is semipermeable and thus allows certain aspects of communication to the world to pass through, as well as it regulates other aspects to be let in, in order to protect one self and to register and control the hierarchy of signs in order to make meaning. Not only does the Semiotic Skin hold the expression of culture, communication, protection, one's self in the sense of psychology, philosophy and biology – It creates meaning and IDENTITY.

Declaration of Conflicting Interests

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4.2. EPILOGUE

When working in a biosemiotic frame of meaning making for human beings, doctors and patients create meaning and identity together. This mutuality shows when passages either opens or closes. These passages are either self-controlled or controlled or even manipulated from outside.

As described in the second layer of the semiotic skin, the touch of healthcare personnel can only occur when wearing uniform or in any other way represents the role and the status of this particular professional identity. This leads to the outer layer L+n+1 from where the hyper-generalized feeling of security in the contact is only reached with a trustworthiness from and to the healthcare personnel.

When generalizing beyond the original situation, the described way of creating meaning and identity through and via the semiotic skin now gives the opportunity to build upon the theory as to understand what is happening in an asymmetrical communication between healthcare personnel and patient. The inter-layered negotiations through the semiotic skin thus represents the process in which meaning making is crated for healthcare personnel and patient via mutual relations and interpretations. When relating and interpreting communication for both healthcare personnel and patient; meaning making is created as to decipher the actual meaning of the communicated as well as the individual creates and maintains identity (as a doctor, patient, human, empath, dying etc.) via hierarchical regulations and negotiations.

CHAPTER 5. BORDER INTO WONDERLAND

Introducing SST as the first foundation of understanding the multifaceted and complex, asymmetrical communication between healthcare personnel and patients in the aspects of identifying themselves as either doctor, nurse or patient calls for investigation of identity, making decisions and making meaning in the Danish healthcare system as well. This chapter describes these processes with a focus on Shared Decision Making and an analysis of a changing body (when ill or healthy; normal or changed) from Helle-Valle and Binder's (2009) analysis of Alice's Adventures in Wonderland by Carroll (1865/2007). This focus on the body as a communicative medium shows to be difficult to grasp, when the contact is non-verbal and thus has to be interpreted (from both participating parts) differently than with the spoken word (Moreira, 2006).

5.1. ARTICLE/CHAPTER 2.

Nedergaard, J. (2017). The Border into Wonderland: When Words Between Doctor and Patient is not Enough. In Freda, M. F. and De Luca Picione, R. (Eds.). *Healthcare and Culture. Subjectivity in Medical Contexts.* Charlotte, NC: Information Age Publishing

The Border into Wonderland:

When words between doctor and patient is not enough.

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Introduction

> Human beings are socially interdependent on one another. Yet they simultaneously create social distinctions among themselves that are the basis of creating new relations across goals, and become partners to one another.
>
> (Valsiner in Bibace, 1999, p. xxi)

When dialogues or communication in general between doctor and patient are assessed, models in which it is possible to explain these processes in a clear and simplified manner are preferred. As such this is no different from description of any other complex processes to make the approach more accessible. Reference to *sharing* is one of such ways - once we use that term it seems that complex processes become simple. But do they? Can they? The goal of this chapter is to dissect the communication processes in medical interaction.

The framework of *Shared Decision Making* (SDM) that has become popular at the borderlands of medicine and the humanities is an effort in this direction. But how can it be elaborated in the context of an ancient practice of the care of the ailing body where social roles of doctors, nurses, technical assistants, and, last but not least, patients, are filled with social power and expertise asymmetries? How can sharing happen under such conditions?

Traditions in medicine

Up till the 1980's the health sciences were, almost, entirely oriented towards the biological and physiological area. The lack of a humanistic approach in the medical area, in The United States, became the foundation of introducing the SDM, while it created an area in which the health personnel could relate to the 'old' virtues in their work (Charles, Gafni & Whelan, 1999).

There is a tremendous diversity in the different European countries and the American healthcare systems according payment, insurances and equity amongst the population. In some countries most of the health care payment is through private insurances or direct from the patient when treated (e.g. America), others are covered for all treatment by the public sector (e.g. Denmark) (Doorslaer et al., 2000).

As to the question of equity in the healthcare in Doorslaer et al.'s (2000) cross-country research, it shows tremendous differences in the payment of healthcare at a general practitioner and specialists. In countries with patients using insurances to pay for healthcare, there seems to be a positive preferential treatment for the rich. For patients

in countries with fully paid treatment by the public sector, there seems to be a larger extent of equity in treatment. For all countries it shows that the poor population uses the healthcare in general in a wider range than the richer part of the populations.

These differences gives rise for the question whether the treatment from the doctors to different kinds of patients also shows differences in the communication and the relationships between doctor and patient in general. These questions can only be answered by researching these aspects in every single country. One could though think, there probably would be a significant difference from countries with a health system where the doctors must be aware of payment from insurances and countries where there is no direct money issues between doctor and patient.

These issues are too wide to examine in this chapter, but it has to be taken into account if a further direction of research, to develop a generalized SDM model, incorporates the different personal approaches for the doctor-patient asymmetry can have its relevance.

SDM research shows that there is a positive effect on the clinical outcomes and patient satisfaction, when patients have experienced compliance with the practitioner through dialogue and contact. This communication between patient and practitioner gives a higher extent of satisfaction about the treatment while it gives the patients a better opportunity to consider themselves in control of events (Coulter, 1997; Robinson & Thomson, 2001).

Health science uses the concept SDM when describing a dialogue involving patients. SDM is a model that prescribes how decisions in the medical area ought to be made. The idea is to let the doctor promote the medical knowledge to the patients, and the perspectives, preferences and even rights of the patient are taken into account in the clinical conversation between doctor and patient. SDM is hereby setting the stage for an arena where the patient is having increased influence on the decisions of treatment (Charles, Gafni & Whelan, 1999).

From the 1980's and up till today there has become a more and more severe focus on the importance of both the doctor's and the patients' actions towards the best results of the treatment. This gives the SDM model a much broader foundation in the medical area, while it is considered a more ethical correct choice of treatment of the patients (Charles, Gafni & Whelan, 1997).

In the 1980's it became more and more emphasized that informed consent and individual choices, along with associations of patients of different kinds, had demands

of increased autonomy of the patients and likewise control of treatment. This leaded to the development of the SDM model (ibid.).

The partnership between doctor and patient will create a foundation from which they can reach consensus of choosing the best treatment (Say & Thomson, 2003).

However, reality often seems a lot more complex than an idealized model. As Roger Bibace et. al. says (2005), the casual observer of psychology and medicine would find the first to deal with the mind and the latter with the body (p.xiiv).

> *"Yet, it only requires slightly more intense observation to find myriad areas in which the two overlap."*
>
> (ibid.)

How to do this

The reader shall bear in mind that this chapter is most of all exploratory and speculative. The experimental evidence from theoretical documents described in this chapter is first and foremost reported in the intention to understand a non-explored area in a psychological meaning. The "evidence" reported from analysing theoretical texts from different fields, e.g. psychology, philosophy, medicine, children's literature and National Health Service, come from accounts of anecdotal exposition via the story of "Alice's Adventures in Wonderland" (Caroll, 1865/2007) and analysis of information from the diverse theoretical sources.

The information from all of these very diverse sources are used as a stepping stone towards the idea of identifying possible linkages between them, thus it gives the opportunity to create a systematic and empirical examination in future research.

The reflections and conclusions in this paper is neither reported as a characteristic understanding of the subject but instead as an approach that creates a focus which hopefully will develop further questions and totally different approaches so to be able to eventually develop a theory that holds the ability to create a new model of SDM. The purpose of this investigation is to map out some of the ideas behind the SDM model and the understanding of human experience incorporated in these.

These perspectives that I present is a very small selection of what can be found as fundamental of both the SDM model and human experience. I do not naively think that this approach is absolutely adequate of mapping the entire area. My hope for this

approach is on the contrary that my small contribution will elaborate a curiosity in the reader to help finding new ideas on the subject.

Alice (from Wonderland) sharing her health concerns with a doctor

Alice would be a model patient in our contemporary medical settings. Trying to imagine her in a doctor's office would lead us to George Herbert Mead's understanding of self and other, by which Alice's confusion of self will be reflected upon and further on lead to a comparison with a patient who is hospitalized.

An analysis of Alice's development of the self would be a beautiful example of how the overlap between psychology and medicine could be pictured. Alice is confused and feeling out of her comfort zone, not able to create security in her contact with her environment. This gives the feeling of lack of control. In this lack of control she finds it tremendously difficult to understand herself.

If Alice, as a character, is understood as a patient who is hospitalized and in contact with a doctor, these difficulties show to be similar.

Who is Alice?

And how is she? What happens when 'she' meets the hospital?

Helle-Valle and Binder (2009) describes Alice's world with her sister, in the very beginning of Carroll's (1865) '*Alice's Adventures in Wonderland*', as her secure base (Bowlby, 1988), from where she has the confidence to jump into the rabbit hole with an expression of independent exploration. When being in the corridor Alice notices the difficulties by being her own size when she eventually finds out how to open a small door. If she wants to enter into Wonderland she has to let go of the predictable physical self, which is manifested in the body as experiencing the self. So when she changes size, so she can enter through the door, it affects her sense of who she is (Helle-Valle & Binder, p.18).

There is a parallel in this description of Alice with a patient being hospitalized for the first time. In the beginning the patient is holding on to the well-known self, as a person in a known environment, that represents security. In this familiar environment the patient knows who he or she is and acts accordingly to this. When being at a ward in a hospital, the environment is suddenly changed and the experience of self is being challenged. To understand the culture of the hospital (the corridor before entering Wonderland), the patient has to change 'size' so to speak.

When the patient meets the doctor and tries to communicate through the well-known self it becomes difficult, because the environment has changed, and has become unknown/unexplored, it forces the patient to adjust his or her understanding of self. The self has changed 'size' as Alice's body. As Alice experiences it, with the words of Helle-Valle and Binder (2009):

> At first delighted to find she fits inside the tunnel through to the garden, she suddenly becomes aware of the nature of shrinking: *One becomes less of oneself and closer to non-existence.*
>
> (p.18. Italics added)

The patient uses his or her body in the understanding of self as well as Alice does, and it is through this body, communication with the doctor will flow. The patient has become ill – that is why he or she is hospitalized - which might be understood by the patient as delightful because this is the right place to be if one needs treatment for the illness. But then the patient realizes that being in that environment affects the understanding of oneself.

Also the understanding of our world and our self is sensed through embodiment (ibid. p.20). For the patient this challenges this, while the body is ill and therefor changing its expression.

Alice meets several strange and unpredictable characters in her way through Wonderland. Some of them, as the Rabbit, scare her while they are very firm in their way of expressing themselves according to their world. This way of reaction is affecting Alice and she is struggling with her changing self (ibid. p. 21).

As for Alice's relations, as well as the patient's relation to the doctor, emotions are the key issue. These emotions become *"…a central contributing factor to the uneven distribution of power."* (ibid. p. 21). When Alice tries to connect with the Caterpillar by acknowledging similarities (changing shape) between the two of them, the Caterpillar just snubs her and does not emphasize with her. He reflects to her that she is strange, disgusting and the opposite of great (ibid. p.23).

This way of relating to one another could be the relationship between a doctor and patient in worst-case scenario, where disgust is an issue for the doctor, and the power-relations between doctor and patient are uneven. When people relate to one another, no matter whether it is constructive or not, there will always be established a partnership from where the communication can flow. This will later be described

further by introducing the Partnership Model by Roger Bibace (Bibace, et al, 1999, 2005).

When Alice's neck grows explosively and her head ends in the top of a tree, a pigeon states that she must be a serpent. She refuses this diagnosis and says that she is just a girl, but the pigeon does not believe her. Her phenomenological truth is that she is a girl, which also is a cultural truth for her in her well-known world with her sister, above the rabbit hole. The pigeon forces her to explain what she is, but she hesitates while she understands how difficult it is to explain who she is, with the memory of how many times she has changed (Helle-Valle & Binder, p.24). The pigeons way of forcing Alice to describe herself, confuses her self-experience by *"…logically establishing her as a dangerous snake…"* (ibid. p.25).

For a patient with a hospitalization and several body-changes coursed by illness, it may also be difficult to keep the hold of an identity as the one in the secure environment with a healthy body. It becomes difficult to explain who one is, and hereby it becomes difficult to relate to a communication with a doctor that represents a logic, that is not understandable by the patients phenomenological understanding of self, environment and the interaction between these. The language used to explain a phenomenon by logic and phenomenological understanding becomes very powerful in explaining truth with irreconcilable content.

Throughout the whole story Alice behaves very polite and well behaved, as expected for a little girl in the world, with her sister, above Wonderland. When she is met by rudeness and misunderstanding, she is still keeping the 'right' attitude. The tea party is the culmination of all her struggles, where she finally answers back and acts somewhat angry. She ends up leaving the party and assuring herself, that she will never go back, while it was the stupidest tea party she was ever in. Helle-Valle and Binder (2009, p.26) interpret this as a resilience-mechanism when she is keeping a polite attitude in an attempt to bring in familiar structures to unfamiliar and confusing situations. In this way she protects her self by using well-known references through an expected behaviour for her.

As for the patient it becomes necessary to keep the familiar structure into unfamiliar situations to make sure there is something secure to rely on. That means that the patient, in the meeting with the doctor/hospital relies tremendously on well-known communication lines e.g. the language to keep the environment as known and understandable as possible, so the feeling of security can endure.

When language develops the self

For Mead (1934) the development of self and language is very tightly bound. When a person approaches another, through language, the other person reacts by language. But to understand the meaning of the gesture, it has to be expressed and perceived by *significant symbols*. For these symbols to have significance, the response from the other person has to be functionally identical with what the first person anticipated. By this, Mead (1934) explains that a significant gesture has to mean the same thing for both. Creating this meaning rely on the ability to consciously anticipate the response to symbols and gestures by others. All this through language.

When a person uses the language to contact another person, both the person speaking and the person hearing are responding in the same manner. This kind of verbal gesture becomes significant symbols when it arouses the same (expected) reaction from the person saying it and the person hearing it (Mead, 1934, p.47).

This might be the reason why Alice finds it difficult to explain who she is to the Caterpillar, while the responses between the two of them shows no understanding and anticipated reactions. They might use the same language and the same kind of words, but the mutual understanding of them between the speaker and the listener is non-existing. They lack the predicate 'significant symbols' (Mead, 1925, p. 288).

A significant symbol is the act, as a symbol, between two persons that arouses the same response in both the speaker and the listener. When using these significant symbols, they become a part of a repertoire that indicates the attitude of the generalised other in the processes of conversations (ibid.)

The communication between a doctor and a patient turns out in an interesting way, concerning significant symbols, in Moreira (2006). In this dialogue between a doctor and the patient's wife, the description of difficulties by feeling security in the dialogue, is very nicely shown (p.36).

Language and bodily contact that both fail

The patient has a brain tumour and is not conscious. When the doctor enters the room, she directs her questions directly to the wife of the patient. These questions were entirely focused on the somatic anamneses, and while examining the patient's respiration and cardiac rhythm (the physical connection), controlling blood pressure and blood tests, she did not speak. While not being satisfied with the blood test results, she ordered another, which was prosecuted by the nurse while the doctor was still there.

Moreira (2006) describes a conversation between a doctor and a patient's wife, which shows the questioning from the doctors side as just being informal to establish security for her in the preparation of the operation. As the SDM is described[1], the information is shared, but whether the decision is as well, is more complicated to answer. The wife becomes nervous and asks if something is wrong, and the doctor says no. So technically the SDM model is followed, but the outcome described in the theory is not.

However, reality often seems a lot more complex than an idealized model. To become a professional practitioner of medicine, feelings of e.g. desire and disgust are inappropriate, and therefore the students are taught "affective neutrality" (Smith & Kleinman, 1989). This neutrality shows in e.g. the gynecological area, when doctors categorize their patients by non-personal factors such as age (Galasinsky & Ziolkowska, 2007).

The doctor says: "With his age (73 years), it is better to know what we are in for, I do not want any surprises in the operating theatre." The wife seems worried when hearing these comments and direct her question, if something is wrong, to the doctor. The doctor says: "No, just that we do not want any surprises."

The doctor stays in the room with the patient, his wife and the nurse while she writes her observations. During this she informs the nurse about her prescribing sleeping pills, while the patient's blood pressure indicated some stress. The doctor says: *"He may not understand what we say but he knows where he is and he knows it's not good. The rest of the prescription is the same as any other tumour patient."* (Moreira, 2006, pp. 87f).

As for the situation with Alice and the Caterpillar, The doctor, wife and nurse use the same language and the same kind of words, but there is still a discrepancy in significant symbols in the understanding between the speaker and the listener. Also there is an asymmetrical relation between the doctor and the three other persons in the room. The doctors contact with the patient is tactile but with no empathy or even direct acknowledgement of the patient as a person. The patient's body is not a media for communication to the patient but only as a delivery of somatic results for the doctor to create security in further professional, medical approaches.

Roleplaying

The words spoken are turning back on the person who spoke them as well as they reach the person supposed to hear them. This reflexivity of the words enables the

[1] See the description of the SDM model later in this chapter.

speaker to take the attitude of the listener and hereby consciously adjust to the whole process. This concept of words reflexing both partners is the essential condition for the development of mind (Mead, 1934, p. 134).

The ability humans have to place our selves in another role and hereby anticipate other people's responses are the foundation of developing the self and self-consciousness. When a person learns the responses, and also behaviour, from a specific other, these will be internalized in the first person. When this happens the first person gets the opportunity to see his or hers own behaviour from the other persons perspective. The community or social group that gives the person the ability to this internalisation, Mead (1934) calls *the generalized other* (p. 154).

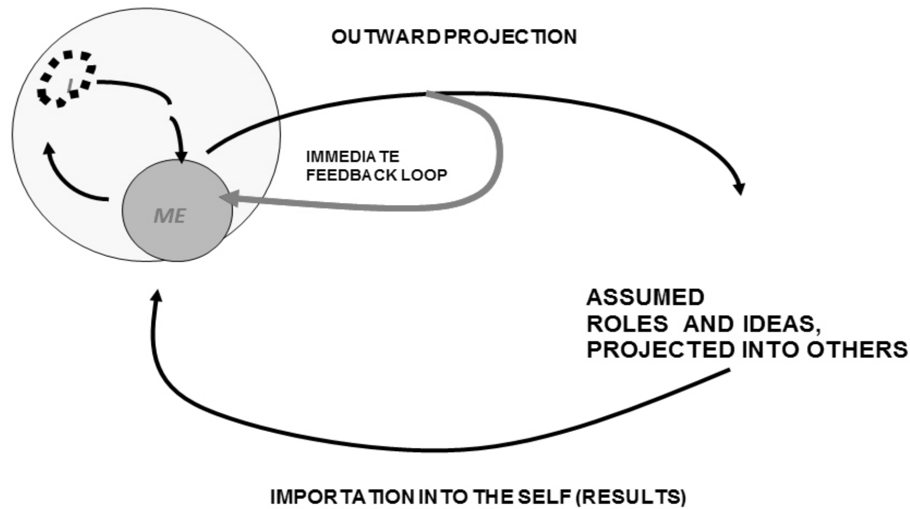
Mead (1934) had a significant description of the *I* and the *Me*. In the relationship to a specific generalized other, the self that arises in this connection is the Me. This Me is taking a particular position in the relationship with others and is observing the reactions of these other persons. The other persons' reactions are not exactly the same as they have been earlier, and these reactions are in the description of the I.

The objective Me cannot exist without the subjective I. The I is the acting part through gestures and the Me is continuously a store of experiences that is constantly reconstructed (Mead, 1913). Both the acting I and the constructed Me are representing complementary parts of the self. Not until the consequences of the action of the I have become incorporated into the Me, the actions can be objectively perceived (Mead, 1934, p.178).

A depiction of this look between the I and the Me and the projection into and from others in ones' environment could be depicted as in fig.1.

A schematic depiction of the core of development as understood by G. H. Mead:

Fig. 1.



(Source: Valsiner, 2014)

The responses, the I will make, are perhaps very similar with earlier reactions, but never exactly the same. As Mead (1934) also describes the I is that it gives the sense of freedom and initiative, which makes a person aware of himself or herself and act in a self-conscious way. The responses of this creative and initiative I are only known retrospectively, when the reaction has been reflected on (pp. 177f). The I is, so to speak, not available in the act, but it becomes knowledgeable in the objectified form as Me. And for ME to develop, on the other side, it needs to act upon the social world and get feedback from it.

Language as a facet of dialogue

> It is in and through language, that man constitutes himself as a subject…
>
> (Benveniste, 1977, p.75)

The ideal dialogue, in which humans constitutes themselves as subjects, is an interaction between two persons that both shows thoughts and feelings that are innermost sincere, when they at the same time remain receptive and sensitive toward the other part (Gadamer, 2007).

Interacting through language has been described by Rommetveit (1985) as an act in which the two actors perceive the message in ways that are personally linked by the multiplicity of possible perspectives each of them comprise. The aspects, in focus of the dialogue, are determined by the individual perspectives and engagements each of the participants have (p. 186).

A problem in the dialogue is to decipher what is being meant by what is being said. If this riddle is being pursued with an approach based on the knowledge of plural meanings, it will be based on the notions of how states of *inter-subjectivity* and shared social reality can be achieved in the meeting between two different persons with two different worlds. Some of the knowledge is basic meaning and embedded in the everyday language but some of it may also be embedded in very abstract ways and will therefore not be perceived as meaning making in a common code in a person's known social world (ibid., p.187).

Being in a dialogue with another person requires willingness to share one self with the other. Making sense of this shared dialogue needs the participants to mutually believe in a shared empirical world. Mutual commitment in a dialogue also indicates mutual role taking of the other part (ibid., p.189).

> *The speaker monitors what he is saying in accordance with what he assumes to be the listeners outlook and background information, whereas the latter makes sense of what he is hearing by adopting what he believes to be the speaker's perspective.*
>
> (ibid.)

In a dialogue with mutual commitment there is however no assumed equal responsibility. The person who introduces the subject being talked about bears the privilege of deciding what is being talked about. This privilege is held by the speaker, even if the message in the conversation is not being understood, by the listener. And the listener holds the privilege to keep a commitment to make sense of what is being said in the dialogue or not.

Understanding a symmetrical dialogue is an affair between both of the participants. The speaker determines the subject and the listener adopts the speaker's perspective temporarily in order to make sense (ibid., p.190)

But Alice's dialogues in Wonderland, and most of the dialogues between a doctor and a patient, is not symmetrical. Rommetveit (1985) puts it like this:

> *An entire dialogue or a given stretch of discourse is characterized by a symmetric pattern of communication control if and only if unlimited interchangeability of dialogue roles constitutes part of the externally provided sustained conditions of interaction.*
>
> *An entire dialogue or stretch of discourse is characterized by an asymmetric pattern of communication control if and only if the interaction takes place under sustained constraints contrary to the basic or "prototypical" dyadic regulation of privileges and commitments.*
>
> (p. 190)

In a conversation whether it is symmetrical or asymmetrical the words being used have multiple functions as attitudes and values as well as just the meaning of the word. Bakhtin (1986/2004) describes the words with three different aspects for the speaker.

1. A neutral word of a language (belongs to nobody).
2. An other's word, which is filled with the resonance of the other's expression.
3. My word, when I use it in particular situations with a particular plan in my speech, which makes it permeated with my expression.

(p. 88)

Rommetveit (1992; 2003) describes situations of dialogue where knowledge and understanding are socially distributed and a culture with multiple sides and experiences build upon dialogues being interpreted and the mutual understanding of this dialogue is fixed through negotiation. Negotiations under which meaning potentials arise. These potentials are understood as a way of mediating possibilities of meaning in a dialogue between two people.

The act of speech between two people is established dialogically in a situational context and perspective from each of the actors collaboratively. Both the speaker and the listener have a share in the dialogue (ibid.).

In this dialogue Goffman (1972, p.31) gives a description of a ritual game where the actors show themselves with a mask. Masks that are controlled by the owner and very carefully preserved. This mask can be disrupted by very strong feelings and hereby cause changed and mixed feelings toward the person who lost the mask. Loosing a mask can make the two actors in the dialogue aware of the lack of sincerity and hereby reveal another self than first assumed.

Human beings are interested in controlling their world

In 1966 Julian Rotter published his I-E scale to describe the locus of control internally and externally. With the use of this scale he tried to explain the reasons of a person's perception of the degree of control in life he or she has. The locus of control procures the perception of control and a reason for a basic orientation in everyday life for every individual.

Internal locus of control is characterized by believing in life events as being caused by factors that can be controlled by the individual. This could e.g. be preparation, having a specific attitude or doing an effort.

External locus of control, on the other hand, is characterized by believing in life events as being caused by factors that are UNcontrollable by the individual. This could e.g. be other people or environment.

Rotter's scale, and the corresponding ideas, was though criticized, but became the idea from which Rothbaum, Weisz and Snyder (1982) developed the Two-Process Model. This Primary-Secondary control model describes how people endeavour control through these two distinct, yet supplementary, processes.

> "*Primary control* consists of efforts to enhance reward or reduce punishment by modifying objective conditions (e.g., environmental events, one's grade in class, other people's behaviour) to bring those conditions into line with one's wishes"
>
> "*Secondary control* consists of efforts to enhance reward or reduce punishment by modifying one self (e.g., one's hopes, expectations, attributions, interpretations of events) so as to achieve goodness of fit with prevailing conditions."
>
> (Weisz, McCabe & Denning, 1994, p.324)

When communicating and acting in the world, people will generally try to create situations in which they have control. When Alice is in the corridor, she changes shape to fit in. This must mean that she is using a secondary control while she is trying to accommodate to existing realities.

For the patient this means that he or she acts in a way that limits autonomy and enhance the attempt to align with the circumstances in the environment and with the doctor. Also this show an external locus of control, while neither Alice, nor the patient,

shows ability to control the environment and the events in this. Yet the final recovery from an illness is the result of the body (re)establishing its own autonomous control over itself. What is "shared" in the medical setting is the two types of control, primary and secondary, through the actions of all participating agents in the medical setting.

Shared Decision Making

From the very beginning of the medical area and until today, there have been tremendous variations in the degree of patient involvement. In the beginning the doctor would make all the decisions and the patient would agree fully. This has developed till a degree where the doctor only informs and the patient makes the decision autonomously. This development over time can be divided into four types:

1. The professional decision. The doctor decides, the patient agrees.
2. Counselling as helper. The doctor questions the patient and after this makes the decision.
3. Shared decision. The doctor and the patient share information and reach a shared decision.
4. Consumer-choice. The doctor informs and the patient decides.

(Emanuel & Emanuel, 1992)

In the professional decision (1.) it is the doctor who identifies the necessary possibilities of treatment and present only the information to the patient, the doctor finds relevant. The chosen treatment will not be discussed. This model is severely criticized for the lack of knowledge of the patient's preferences and the lack of objectivity. The doctor will automatically make a decision from preconceived opinions about e.g. sex, age and appearance, which blur the objectivity as for the decision of the best treatment for the patient (Jensen, 2000).

In the other end of the spectre (4.), there is the consumer-choice. Here the patient decides his or her own treatment from the information given from the doctors and other medical experts, mixed with the preferences and values the patient already has. The responsibility is the patient's alone. The critique of this model is, it assumes the patient is conscious about his or her own preferences and values, and hereby is fully able to know how the treatment will affect these. This is often not knowledgeable before later in the progress. This model does not either take into account the knowledge that grows from dialogue through time (ibid.).

SDM is obviously somewhere in between these two extremes. The ideal of the model of SDM is the partnership between doctor and patient. This partnership is seen as the

most ethical way of dealing with the reality of uncertainties in the medical world (Charles, Gafni & Whelan, 1999).

Charles, Gafni and Whelan (1999) describe four criterions that have to be present to call it SDM.

1. Doctor and patient, as a minimum, have to be involved in the process of making a decision.
2. Doctor and patient share information with each other.
3. Doctor and patient are taking initiative in the process of making a decision by sharing their preferences with each other.
4. Doctor and patient are agreeing about the treatment when the decision is made.
   (ibid.)

Making a decision for the patient is often done on the basis of very little knowledge about the illness and/or the treatment, but with the severe wish to be healthy. Being healthy is the secure place to reach for and this attitude therefor becomes the foundation of which the decision is taken. Not the detailed information from the doctor. The patients are reacting from the notion of how they can get the best treatment. They so to speak become active in their own treatment (Strauss, Fagerhaugh, Suczek & Wiener, 1997).

The SDM model is describing a contemporary, idealized model of communication between doctor and patient. The patient has to be responsible of own situation and able to make a decision. This decision is made in solidarity with the doctor. The recommendations from the doctor are taken into account and the patient will estimate what personal circumstances are relevant for him or her to seek the treatment that satisfies this.

The ideal has not always been like this. 30-50 years ago patients would entrust his or her body to the doctor, and wait for the described treatment from the doctor. The patient was to cooperate with the doctor in any possible way, and if this were not accomplished, the patient would be responsible for his or her illness (Kirmayer, 1988).

Even though the latter description is from the past, some of this understanding of doctor-patient relationship is still present. For the patient when he or she is trying to understand what is expected from him/her, and for the doctor when he or she tries to figure out what role the patient wishes to have (ibid.).

As in Moreira's (2006) description of the patient, being examined by the doctor, without being conscious. The patient's body is fully in the hands of the doctor and the practitioners at the hospital in general.

Being hospitalized for having a brain tumour seems in this case also to establish a relationship with the doctor and agreeing in any treatment, while the thought of not to do so, would give the patient the full responsibility for his illness.

Compliance?

For Coulter (1997), Robinson and Thomson (2001) it shows that there is a positive effect on the clinical outcomes and patient satisfaction, when patients have experienced compliance with the doctor through dialogue and contact. This communication between patient and doctor gives a higher extent of satisfaction about the treatment while it gives the patients a better opportunity to consider themselves in control of events.

This is by far too general a conclusion, while it may depend on medical issues, relationships, emotions etc. These issues may be a part of an individual's understanding of self and environment, and through this he or she reacts in certain ways when establishing a doctor-patient communication.

Desire and disgust are both characteristic of being human. They are incorporated into lives by internal dynamics as well as culture and are especially accentuated in encounters with a medical system. Being a patient includes the body, which is taken out of the safe and familiar environment. As for Alice when she finds herself in an unknown environment, with figures she does not know or even understands. This creates an uncertainty that entails a secondary control in the attempt to preserve the feeling of control that keeps the self-secure.

Establishing a partnership

When establishing the contact between a doctor and a patient it encounters cooperatively a process in which they both mutually tries to make sense of the other. In this process both the doctor and the patient is establishing a relationship (temporarily though) that can be seen as a partnership in which they both find understanding of each other (Valsiner, Bibace & LaPushin, 2005, p.277).

As for Alice when she tries to connect with the Caterpillar and find a mutual understanding with it. This shows to be difficult and Alice is trying to find a way of making meaning with it by asking the Caterpillar who HE is, instead of trying to

explain who SHE is, while it is difficult for her to understand who she is herself, since she has changed shape so many times.

A patient in this situation would also try to find a mutual understanding with the doctor to make sense of the situation. But if the two approaches from the two persons involved have too different tasks for the communication, it becomes hard to find meaning in it for both doctor and patient.

Alice keeps her polite attitude towards the Caterpillar, even though he is annoying her, because she really wants to understand the conversation and her situation, to be able to become her 'known' self again. As for the patient who really wants to become well, he or she might tolerate all kinds of attitude from the doctor. If the patient is not that motivated, he or she will question every initiative the doctor will encounter (ibid, p. 278). Both for the doctor and the patient in the process of communication and meaning making it can trigger tensions between meanings in opposition (ibid. p.284).

In the Partnership Model (Bibace et al., 1999) it is emphasized that the communication between doctor and patient is a process of mutually meaning making. And by this mutual meaning making creating the ability to make decisions in a joint construction of knowledge.

The relationship between a doctor and a patient is asymmetric while the two partners assume different complementary social roles and difference of expertise. But in this asymmetry there is also symmetry while both partners seek to construct meaning together. To achieve both of their goals, whatever they might be, they rely on each other's participation in reaching each other and create meaning together. This meaning making is relevant for both partners while the psychological processes behind this should lead to the outcome, that both partners prefer. In this process, both feelings, personal meanings and internalized images from ones past is crucial, while they are generating the psychological outcome (Valsiner, Bibace & LaPushin, 2005).

Discussion

SDM has become popular at the borderland between medicine and humanities. But is it sufficient in an environment with social power and expertise asymmetries between doctors, nurses, technical assistants and patients? Is sharing even possible under such conditions?

Sharing can occur under asymmetrical conditions between the doctor-patient relationship, while they mutually try to create meaning in the dialogue, even though they have different approaches and different expertise.

When the body changes, as Alice's does, "One becomes less of oneself", so the idea of just using the SDM model in a dialogue, to get closer to a decision, shows to be too simple. The body is as important a communicator as the language, since the understanding of self is tightly bound to the feeling of the body. This feeling of the body contains both the somatic effects and the understanding of self. In this asymmetry in power between the two participants in the dialogue, doctor and patient, emotions become a key issue.

This uneven power shows in the asymmetrical relationship between the doctor and patient, while the doctor has the privilege to stay in the familiar environment and in a well-known emotional context. Also the doctor has the ability to stay on emotional secure ground, while he or she can stay professional neutral, and thus not show authentic, individual emotions.

This, for the doctor, establishes secure ground in creating communication with the patient, on the other hand creates insecurity for the patient. It becomes difficult for the patient to understand the situation in a dialogue with a doctor, since the doctor's mask fits the well-known situation for him or her, but for the patient with the changing body, and hereby also a change in understanding the self, the interpretation of the dialogue is severely damaged.

If the emotions shown from the doctor are professional neutral, the mask showing these feelings is not (no matter whether good or bad) sincere. When the feelings are not sincere, there is a discrepancy between the feelings shown by the doctor's mask and the person behind the mask. When interpreting this dialogue, not only the language is taken into account. So do the feelings behind the words, as well as the body. They also become participants in the communication.

When using the language in a dialogue between doctor and patient, it is for the patient a way of holding on to the well-known line of communication, that preserves the feeling of security. When this well-known line of communication has created the feeling of security it also becomes the foundation of creating a feeling of control via primary control, if it is possible to influence or change the environment – or by secondary control if the environment is unchangeable, and hereby creates the necessity for the patient to change his or hers own hopes, expectations or interpretations of events.

When a patient enters a hospital the body is no longer completely belonging to him or her. In one way or another the doctor will examine the body. Whether the patient is conscious or not. Whether the patient fully understands the purpose of the examination or not. And whether the patient likes or dislikes the tactile contact from the doctor –

but still allowing the intrusion. It is therefor not only the language as words that is the foundation of communication.

The words might not create security or the tactile contact might not either. No matter whether the words and the bodily contact creates security or not – both speech, body, environment and the self becomes participants/actors on the arena for establishing SDM.

When both doctor and patient show willingness to share oneself with the other part of a dialogue this creates a communicative constellation. It becomes possible to establish a partnership in which they both find understanding in each other. A doctor and a patient hereby create mutual meaning and thus show that it is possible to create shared decisions under very difficult circumstances. This is only possible if language, body, environment and self are taken into account as well though.

Conclusion

When doctors have learned to be professionally neutral, they do not know how to relate to all the other aspects of communication, such as tactile contact, understanding the changing of the body for the patient, mutually meaning making in a partnership etc. When words become the most prevalent way of communicating, it gives the opportunity for the doctor to avoid getting closer involved with the patients by verbalizing descriptions of the patients as age and gender, or somatic medical issues. This distances the doctor from the patient and the doctor avoids using a more intimate part of his or her identity to reach the patient in establishing a partnership.

The doctor not using parts of his or her identity as an individual, and instead just using the identity as a professional neutral doctor, it becomes challenging to use the SDM, as it is described today, in a nuanced way. To be able to develop the SDM model, the issues of communication needs to be further examined and taken into research.

Meaning making is the principal idea in the partnership between doctor and patient. This meaning making is much more than just words. When we incorporate the above mentioned into the SDM model, it might become more successful but also tremendously more complex. The SDM model known today is pretending to be simple – but that is perhaps the only thing it is not. By being aware of the complexity in the communication between a doctor and a patient and incorporating these aspects into a more detailed SDM model, it might be more complex but it will then become more honest. It might then become a way of managing a severe complex and truly ethical dialogue between a doctor and a patient.

(But are we ready for that?)

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5.2. EPILOGUE

The essence of sharing is crucial in communicative relations in the healthcare system. How this is being showed and played out in all participatory attendees is further developed from the ideas of this chapter.

In the process of creating and maintaining power in and of one's own life and situation (Weisz, McCabe and Denning, 1994), the further investigations will reveal resilience-mechanisms from both healthcare personnel and patients as shown in Alice's reactions. The way she tries to find something secure to rely on can be directly related to the hyper-generalized feeling in the very outer layer of the semiotic skin, which has to be created and negotiated in a secure environment and with trustworthy people.

This process is very much lacking in Moreira's (2006) example, but it also bears the notions of the contact with the patient's wife as a very special way of communicating and relating with the patient. This calls for further investigations, which will be developed in the next chapter.

Whether it is primary or secondary control, people are using these to accommodate to their realities, which can create discrepancies in the mutual relations between healthcare personnel and patient, since each their aspects of control are negotiated both internal in the individual and external as a process between the participants. This external process is negotiated via the intertwined and relating border-zone between the communicating participants, which is regulated by the semiotic skin (in connection with the biological skin and the inside body).

Both healthcare personnel and patients have established a platform of communication, where they both understand themselves and the others in particular roles with specific identities connected to these roles. This identity in the present context is negotiated and maintained through the inter-layered and hierarchical dynamics of the flux through the semiotic skin. Hereby the sincerity in the relation between healthcare personnel and patient is established. If – or when – the mask (Goffman, 1972) is disrupted though; the sincerity is lost and another role and identity of the person is revealed, which complicate the asymmetrical dialogue between healthcare personnel and patient further.

CHAPTER 6. COLLECTIVE DOCTORS AND PATIENTS

The Semiotic Skin Theory has now been introduced as well has the human communication in the intersection between medicine and psychology. This calls for an introduction of two new concepts: The *collective patient* and the *collective doctor*. These concepts are though not meaningful unless the very unique approach a doctor has in the professional contact with patients, demands a development of understanding new theoretical approaches in psychology. This approach will be illuminated via ideas of abduction (Peirce, 1967). This theoretical framing very clearly shows how natural science and humanistic science are interrelated and thus cannot be separated. Working with the framing of abduction is the result of understanding idiographic and nomothetic reasoning as not being opposites – as it is seen in contemporary psychology. Windelband's (1894/1998) original understanding of these two concepts thus become important components of understanding the multifaceted and complex communication between doctor and patient. Instead of separating idiographic and nomothetic theorization, they are connected via abductive reasoning in both diagnosing and choosing the treatment of a patient.

Understanding NOT to separate the two theoretical framings we learn how to understand and reflect on ourselves and the world as intertwined. We cannot separate these two if we truly wish to understand humans and the world we create and live in.

6.1. ARTICLE/CHAPTER 3.

Nedergaard, J. I. and Jensen, E. S. (2018). Communicative partnership between more than two: When a child becomes a patient. In De Luca Picione, R., Nedergaard, J., Freda, M. F. & Salvatore, S. (Eds). *Idiographic approach to Health*. Charlotte, NC: Information Age Publishing. (in press)

Chapter 8

Communicative partnership between more than two: When a child becomes a patient

Jensine Ingerslev Nedergaard, Elise Snitker Jensen

Introduction

When communication between a paediatrician and a child is established, it shows diversities in the quality of understanding, whilst not only the doctor and the child - as a patient - are participating. Also parents and medical colleagues become communicators. As well as recipients of the messages moving around in the network. Some messages are standard-form - others vary.

This chapter aims to discuss the idiographic perspectives of a standardized communication – in the healthcare system - between a patient and a doctor that becomes multifaceted, since the parents of the child often become the primary communicators with the doctor. These multifaceted aspects of communication and propagation of knowledge, intensions, experiences and feelings gives rise to the need of elaboration of the concepts of a patient and a doctor.

Elaborating the concepts of a patient and a doctor into a *collective patient* and a *collective doctor* - in mutual dialogue - also gives rise of the notions of the primary understanding of Wilhelm Windelband's (1894/1998) classic concepts of idiographic and nomothetic perspectives, which are perceived differently in contemporary psychology. As to understand this very complex communication between a collective doctor and a collective patient in the essence of diagnosing and treating the patient, both the idiographic and nomothetic processes will be organised in a revised understanding of an abductive approach, hence to connect the two concepts instead of only reaching them as disjointed opposites.

Dynamics of expert roles

In the standardized understanding of a communication between a doctor and a patient, represented by the theory of Shared Decision Making (SDM), the doctor is the expert of a somatic, theoretical knowledge of the body as a medical, physiological and biological object. On the other hand, the patient is the expert of knowledge of the body from the "inside", which aligns the asymmetrical communication between the two partners and basic impossibility to share these perspectives.

When a child becomes a patient, not only does it might lack the abilities to provide a linguistic competence in making him or her understood. Also the bodily expertise of knowing one's body from the "inside" is lacking since the parents become the communicators of these aspects between the doctor and the patient. This lack of mutual comprehension emerges an immense hurdle of gaining knowledge and understanding for both sides of the dialogue. In this sense knowledge of the inside of

the body of the child is equally directly impossible, since neither the child, the parents or the doctor have the ability to transmit these facts.

Sharing decisions

The medical healthcare system in American and European countries shows tremendous diversity in patient payment, insurance and equity. In a country like Denmark all medical treatment is covered and provided by the public sector and therefor gives the opportunity to study doctor-patient relations without fully considering socio-economical aspects of treatment and communication (Doorslaer et al., 2005).

As Charles, Gafny and Whelan (1999) describes, the health sciences up till the 1980's were very specifically oriented towards a biological and physiological approach in which the humanities were not represented. This lack of humanistic substance gave rise of introducing Shared Decision Making (SDM) as a new theory of communication between a doctor and a patient in order to provide the best possible treatment for the patient. The theory of SDM is an idealized model of this specific kind of communication in the health care system where the patient is expected to be responsible of own situation and able to make decisions according this situation. Ideally the decision is made in solidarity between the doctor and the patient and the doctor's recommendations are taken into account by the patient in order to estimate relevant circumstances to seek the most satisfying treatment. This way of introducing and executing the essence of the SDM by prescribing how decisions in the medical area ought to be made is to let the doctor promote medical knowledge as well as the patient's perspectives and rights are taken into account.

For a patient to make a decision of a medical treatment it is often made on the basis of a more or less insufficient knowledge about both illness and treatment. The decision though is very specifically made on the severe wish to be healthy or at least as healthy as possible (Innis, in this book; Klempe, in this book). This strive for being as healthy as possible then becomes the very foundation of which the patient decides and become active in own treatment – not the detailed information about the scientific knowledge of the illness and treatment provided communicatively by the doctor (Strauss, Fagerhaugh, Suczek & Wiener, 1997).

From triad to network

Focusing on the experiences from the work of a paediatrician with children and parents, the discussion will provide a new understanding of embodied communication in a healthcare system that tries to display a shared decision making - between doctor

and patient – as a success. This success is being challenged since there are several other participants in both communication and decision making connected in only one body – the child's. Also is the separation between a nomothetic and idiographic approach challenged in order to provide an abductive understanding of a doctor's work. Since it becomes crucial to comprehend the doctors work as abductive, the understanding of an embodied communication will be introduced as to connect a mutual communicative partnership with nomothetic based knowledge of medical aspects with the idiographic, psychological reach to the patient, as to come to a conclusion of healthcare system that needs to acknowledge a broader understanding of doctor-patient communication when sharing decisions of treatment and diagnosis.

A patient-process is always a single case and thus provides unique knowledge of unique situations. But this uniqueness is in every way represented in networks around the patient. These networks present the patient in very different ways, which links the patient with different categories that operates at the level of the healthcare system (e.g. diagnosis). The single case of a patient thus provides a network and sample of knowledge around the patient that not only relates to one single person, but as an inclusive category.

Even though the doctor with a specific medical knowledge and the patient with the knowledge of own body represents two very diverse aspects of a communicative process, there is shown SDM research of a positive effect on clinical outcomes and patient satisfaction through dialogue and contact, in situations where patients have experienced compliance with the doctor and thus express better control of events (Robinson & Thomson, 2001).

This conclusion is though not considering the very diverse dependencies on e.g. medical issues, relationships, emotions etc. and thus lack the patient's understanding of self and environment as to react in certain ways when establishing the communication with the doctor.

Natural scientific and humanistic separation

In a medical area and a line of work that often is understood as the very notion of a natural scientific approach, there seems to be a discrepancy between the execution of a very specific and relevant medical treatment and the execution of the communicative notions in this process. As for the medical natural scientific part of the treatment of a patient it is obvious that the doctor's skills as an executor of a natural scientific knowledge is crucial in treating a patient in order to better or relieve the patient's situation. What is not so obvious is how the communication with the patient in this process is executed or even acknowledged.

As for this connection between a medical treatment and the communication alongside this treatment there is a strong separation between a natural scientific and a humanistic approach to a single instance. The natural scientific approach is often connected to the nomothetic research and the humanistic scientific approach to the idiographic. But is this separation actually correct in the sense of understanding a full treatment of a patient?

The interesting part here is first and foremost the comprehension of the concepts of nomothetic and idiographic. The contemporary usage of these two concepts overall build upon the mistaken interpretation of them by Gordon Allport in his developmental psychology (Allport, 1962; Lamiell, 1998). The understanding of idiographic research in contemporary psychology is for the most part described as the research of the individual and of the unique single case. As for the contemporary nomothetic perception, it is the research of groups or the predominant quantitative research (Lamiell, 1998). Windelband – who introduced the two concepts – had on the other hand a very different construction of nomothetic and idiographic, which he firmly described in his rector-ship speech at Kaiser-Wilhelm University of Strassburg in May 1894 (Windelband, 1894/1998).

Idiographic research – from Windelband's view did not necessarily entail a study of just an individual – but it might *could* be the case. The enquiry of an idiographic approach was to a considerable extent relying on much more inclusive categories in which the individual enters. The decisive question was the nature of the coveted knowledge instead of the level of analysis and thus an idiographic approach is gaining knowledge of *what once was* (Ibid.). Hereby the emphasis is, that every first instance is ONLY ideographically available since it is the first. Only these first instances now have the ability to grow into CLASSES of instances if they re-occur.

For Windelband, nomothetic meant the knowledge of *what always is*, which is the only knowledge that can be expressed in the form of general law (Windelband, 1894/1998; Lamiell, 1998). In Windelband's 1894 speech he focused on the general laws of personality and thus he revealed his belief that any focus on a (nomothetic) *general law of personality* has to be *the individual.* This is precisely the focus of a medical practise that gives rise to build-up of generalization from this particular practise.

Working further into this example of personality it seems very recognizable to connect it with the work of a doctor who builds a diagnosis and a treatment of a patient from the approach of the idiographic, which deals with the individual as well as the surrounding in overall inclusive categories, and the nomothetic approach as for the understanding of medical, general laws of science. These general laws, Windelband

considered as necessarily connected to the particulars in order to determine whether something supposedly general in fact also is so.

> *"On the other hand, the idiographic sciences [Wissenschaften] require, at every step, general theses, which they can borrow in their fully correctly established form only from the nomothetic disciplines. Every causal explanation of some or other historical process requires general notions about how things take their course at all; and if one endeavors to formulate historical proof in its purely logical form, it always entails as its major premises natural laws of the event, and in particular of the mental processes [des seelischen Geschehens]"*
>
> (Windelband, 1998, p. 19).

Idiographic and nomothetic reasoning is thus not – as understood in contemporary psychology – opposites. Windelband hereby very elegantly shows how these two concepts – in their original meaning – become solid components of understanding the multifaceted communication between a doctor and a patient, approaching an abductive reasoning, as to diagnose and treat. But what happens in a schematized treatment and communication of a patient, when the patient is a child?

Dynamics of the unique

This becomes very noticeable when looking into a paediatrician's everyday work, while all the above mentioned issues are not only represented through one person – the patient/child – but through both patient and parents (and other relations as well).

In this very complex reality of a paediatrician, an idealized model as SDM seems insufficient since the partnership between patient and doctor comprise of more than two. Thus the creation of a foundation from where consensus - between doctor and patient - of choosing the right treatment is represented by an interplay, between a nomothetic and idiographic approach. This interplay is represented in the aspects of the very complex process both doctor and patient are part of when diagnosing and treating. First of all, both parts need to establish a connection in which it becomes possible to understand each other's aspects. Also both parts hold the specialized knowledge of own expertise and thus builds upon both a nomothetic AND idiographic reasoning as to reach mutual understanding of diagnose and treatment.

In this sense the paediatrician holds the very notions of combining these two very different approaches into one in order to be able to fully create a communicative partnership with both patient and parents. The combination of and ability to combine

these two approaches has the ability to characterize the dynamics of the unique as to arrive at generalization (Salvatore & Valsiner, 2010).

A partnership

The reality of a paediatrician shows to be a lot more complex than an idealized model and thus calls for a creative and very nuanced integration of a natural scientific and humanistic approach. As for this - both medicine and psychology has to be equally represented in the treatment. Generally - psychology is found to deal with the mind and medicine with the body. *"yet it only requires slightly more intense observations to find myriad areas in which the two overlap"* (Bibace et al., 2005, p.xiiv).

Introducing the concept of a partnership model in establishing a contact between a doctor and a patient, Valsiner, Bibace & LaPushin (2005) describes the encounter of a cooperative process. This cooperative process is defined by the mutual desire to make meaning of one another and thus from this desire the establishment of a partnership between both the doctor and the patient emerges.

As for the partnership model the ability and desire of mutual meaning making between the doctor and the patient is emphasized and thus encounters for the ability to make decisions while constructing knowledge in a joint approach (Bibace et al., 1999). Hereby the obvious asymmetry between the two partners' different complementary social roles and expertise differences arises the notion of symmetry. This symmetry is shown in two different aspects: first of all, they both seek to construct the meaning of this particular process together in which they will both achieve their goals in the reliance of each other's participation as to construct meaning together. Secondly they both bear the role of expertise since the doctor is the expert of a medical science and the patient is the expert of own body (Nedergaard, 2017).

In the sense of this particular partnership, a relevant meaning making for both partners is conducted through a psychological process, in which the outcome is leaded by the preferences of them both. This process of two, but mutual, preferences is holding feelings, personal meanings and internalized images from their past as to generate the psychological outcome as well as the physical (Valsiner, Bibace & LaPushin, 2005).

Initializing the partnership between a patient and a paediatrician shows to be much more complex than just a partnership between two individuals. Both parts are represented by more than one individual.

The collective patient

In the work of a paediatrician, a communicative process of two – how mutual it may seem – is not enough. Being a child in Denmark (and most other countries) does not give the right to make decisions on one's own until legal age, and thus the child needs the parents to be represented. This creates a communication network doctor-parent(s)-child where the direct knowledge of the body and its ailment is that of the child, but the decisions about its care are made by the other members of the network.

In the communication with the child as a patient we introduce the concept of a *collective patient* in the aspects of the parents as well. When examining a little child, the language is obviously not enough to provide the answers the doctor needs. Therefor the doctor has two very different approaches towards the child in order to provide the knowledge needed as to proceed in the process of diagnosing the child. First of all, the doctor's examination of the child provides a tactile communication – as well as an observational - and thus the understanding of the child. This gives rise of a (desired) mutual understanding and security in the child's relationship with the doctor. Secondly the doctor communicates with the parents, as the genuine understanding of the child is held by the parents. A paediatrician with many years of expertise in this speciality explains:

> *"The parents told me their little eight month old boy almost never slept and was crying all the time, no matter what they did. They were all very tired now and the parents told me they needed to know how to help their little child.*
>
> *I asked them to tell me all their observations of the boy when in pain and not seeming comfortable. They spoke for a very long time and showed their agony of not being able to help their child. Both parents had a very good and calm physical contact with the child and they were eager to provide me with all the knowledge they had of their son.*
>
> *I could see the child was not being well and I observed he had a very good connection to his parents, since he had good eye contact with both of them and was very good at seeking their physical contact as well. My physical examination of him supported my first observation of a general not wellbeing but also a trusting and cooperative child."*

In this case the child is the primary patient but in order to provide enough knowledge of an anamneses, the parents become a part of this process. Not only do they provide the doctor with their experiences of the child and its reactions in physical aspects.

They also very delicately give the doctor a significant insight in the psychological wellbeing of the child and its relation to his parents.

Had it been an adult patient, these two aspects of establishing a partnership between the doctor and the patient would be held between the two and thus give the opportunity to compare and support tactile, observational and rhetorical answers. In the situation of a child as a patient this comparison and support of knowledge is held by at least two separate sources. For a child with no language, the only way to get an idea of how the body feels from the inside, is by external knowledge through others.

As it shows, the child is one patient but represented by several individuals. This aspect of a collective patient is often extended from the notions of the child-/patient communication and understanding. This extension holds the notions of other people in the child's life and periphery such as siblings, grandparents, pedagogues, peers, teachers etc. This extends the collective patient tremendously in the sense of understanding the patient and provides the communication between patient and doctor with multiple voices and aspects. Not only does the collective patient give rise to an extended pool of knowledge, it also gives rise of limitations in this communication. An example of this limitation could be the doctor's knowledge of a grandmother's death of cancer and thus brings the doctor to lack a somatic diagnose of a child with e.g. stomach ache or problems of sleeping, with the acknowledgement of the psychological effects of sorrow.

This latter example is just a fabricated example and thus not provide us with any evidence in this particular aspect. But it does bear the capability of providing us with the idea of describing the next development of the contribution of a collective patient. In the issues to acknowledge and cooperate with the collective patient, it sometimes shows an *invisible (collective) patient*.

The invisible patient

The collective patient is not the very first object of interest when meeting a patient. The very first interest is the primary patient / the person who needs treatment. Secondly the collective patient becomes crucial since an anamnesis is provided through all the multiple representations of the child. Being the doctor to a very little child though requires an instant and direct contact to the parents as well. When the doctor examines the child physically though, the parents become peripheral and thus not a part of a direct communication with the child. The parents – for a moment – become invisible.

These invisible patients (the parents) very quickly become not only visible but the primary sources of rhetorical dialogue and thus provide the doctor with as much knowledge of the patient as the patient itself. As for the example of the eight months old baby as a patient it seems unlikely that the collective patient will diminish into a singular patient, since the tactile and visual examination of the patient often is not enough. Not strictly because the doctor is not able to diagnose the child without the parent's contributions of knowledge, but because the parents in particular become the bearers of the execution and acknowledgment of the treatment of the child.

In this sense it shows that one of the most important practices of a paediatrician is to construct and develop a partnership model of dialogue with the parents as to create a mutual understanding of the treatment as well as the acknowledgement of the parents as collective patients and thus are in need of the connection with the doctor as deeply as the child.

Another aspect of an invisible patient as a part of the collective patient could be the knowledge of e.g. siblings or other relatives in the child's life. In the very first communicative responses with and through the patient, only the parents are visible in the notion of the collective patient. When further examining this collective patient and detecting aspects of illness as to diagnose and provide a treatment, other invisible patients – e.g. a sibling – becomes visible when knowledge of their development or physical and even mental conditions becomes a part of diagnosing the patient. When this knowledge has been implemented in the work of diagnosing the patient, the sibling once again becomes invisible. In this sense the collective patient can be represented by multiple individuals but not all of them are necessarily visible all the time.

The collective doctor

If the collective patient represents the one part in establishing a communicative partnership - as the partnership model describes - then the doctor as the other part might look like it is under-represented. Is there such a thing as a *collective doctor*? For us it seems obvious that there definitely is a collective doctor in the sense of understanding the healthcare system in Denmark. When going to a paediatrician in Denmark, the patient needs a referral from a general practising doctor, who will forward his or her journal notes of the patient in relation to this particular referral. This referral then becomes the holder of the reflections from another doctor, which are taken into account by the paediatrician.

An interesting aspect of this collective doctor is the notion of e.g. psycho-somatic aspects or other functional illnesses/disorders. When detecting these aspects in the life

of a patient, the doctor might refer to a psychologist. In this example the collective doctor is also represented by another discipline and thus holds the notion of multiple voices as both a visible and an invisible collective doctor.

Last but not least - the collective doctor also holds aspects of the persons own relations in life and experiences of all kinds. Not only experiences in the medical professional line but indeed also in the personal and emotional aspects of life course and experiences. Thus the collective doctor holds the exact same multiple and complex facets of a whole, as the collective patient does.

The process of dialogue now shows to be ever so much more complex than initiated in the theory of Shared Decision Making. This multifaceted aspects of communication need to be approached from another – more nuanced – angle.

Processing dialogue

From the theory of the partnership model, it is now possible to analyse the dialogue between the collective patient and the collective doctor as mutually holders of the ownership of the dialogue. In this sense it becomes crucial to detect how this multifaceted dialogue is processing.

A processing dialogue between the two partners must first and foremost rely upon the mutual acknowledgement of each other's positions at competences. When this is established the essence is to internalize the growing aspects of an abductive approach in order to maintain the goal of both a diagnose and a treatment of the patient, in the sense of acknowledging all the facets of the collective patient and the collective doctor.

In order to describe this equally important and nuanced aspects, we will very briefly introduce the ideas of a semiotic skin in a mutual communication as to connect the collective patient and collective doctor with a revised version of Peirce's notions of the theory of abduction.

Semiotic Skin

As for a processing dialogue between a collective doctor and a collective patient it seems obvious to introduce a theoretical framing of a multifaceted and multi-layered concept – in order to understand this complex communication. Not only is the doctor and patient entering the dialogue as collective individuals, the patient is also accompanied by parents – whom are also collective individuals. All of these signals

emerging from several aspects in several individuals in the doctor-patient dialogue can be understood in the sense of the concept of *Semiotic Skin* (Nedergaard, 2016).

Semiotic skin is to be seen as “a-skin-on-the-skin” building from inside the biological skin and outwards. It surrounds any part of the body and works as a multi-layered sign-organized protective and communicative device. The biological skin as well as the semiotic skin builds upon the capability to register and perceive information from outside-in and inside-out.

The three layered biological skin functions as a protective boundary with a surface in contact with the environment and the inner metabolism. This connection shows in its ability to register and control/regulate e.g. temperature, pain reaction and absorption/secretion as well as blushing (Bojsen-Møller, 2002; Geneser, 2011; Rhoades & Bell, 2009), also it shows in e.g. scars and appearance (make-up, tattoos, hair etc.). Channels through the three layers allow communication by e.g. water, nutrients, waste products sensory/motor signals to flow, and thus shows a necessary active role in skin permeability. A permeability that communicates via thresholds of biology and psychology as to become meaning-making in the sense of communication between human beings (Innis, 2016; Brinkmann, 2016; Nedergaard 2016). Connecting biology and psychology shows very splendidly through the build-up of the semiotic skin, which is influenced of impacts from the outside and counter-impacts from the inside.

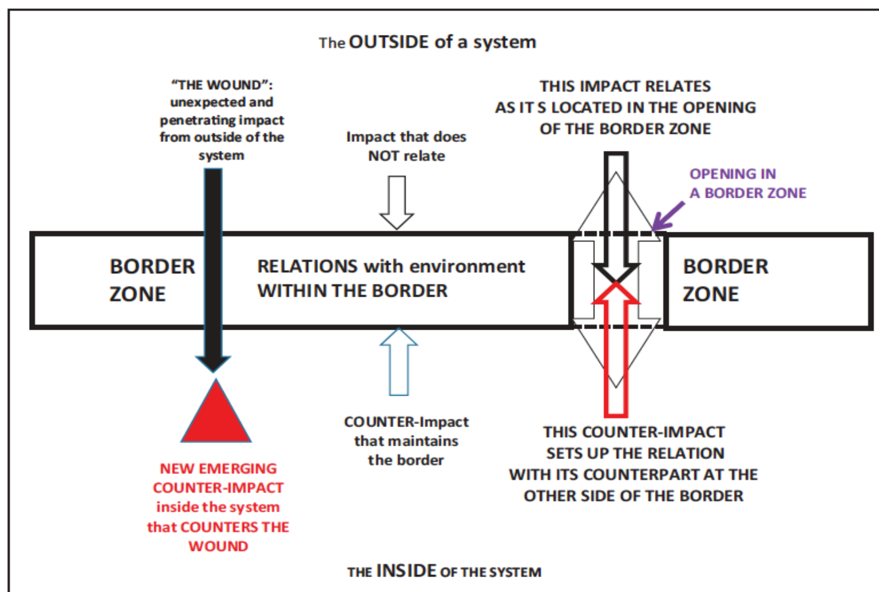

Figure 1. Penetration and counter impact.

(Nedergaard, 2016, p.395)

For the very first perceptions of a human being senses, the skin is vital. From a biosemiotic perspective, biological sign processes are perceived and played out on the skin as to sense and make meaning of the biological significant sign processes. These sign processes – not only the biological ones but indeed also the semiotic aspects – become extremely relevant to understand for a paediatrician examining an infant. For the infant the very beginning of life is intertwined with the skin as to understand the essence of an individualization, which is played out on and in the skin.

As to understand this bold statement, Hoffmeyer (2001) describes the skin of an infant as a type of brain, since the skin as a biological membrane holds the notions of both biological/physiological and psychological aspects of being in the world.

> *When a child is born it is its skin more than anything else……[It] is a kind of pre-actual atmosphere, and what enters the awareness of the infant is grades of intensities of touch, taste and smell. In a certain sense the infant's skin is a type of brain, while it is where, encounters with the world first freezes into the vague structuring of awareness.*
>
> (Hoffmeyer, 2008, p.33)

Going along with the idea of the skin "as a brain", it becomes even more significant to describe the embodied communication between a paediatrician and a child from the aspects of the skin as the holder of this multi-layered and multi-faceted dialogue.

The Semiotic Skin very elegantly describes this multi-layered and multi-faceted communication, since it shows how this sign-organized protection devise holds the notions of a psychological system that communicates both from the inside-out and the outside-in. The communication through and via the Semiotic Skin is represented by a complex and diverse flux of information between the different layers as well as a direct flux between inside and outside.

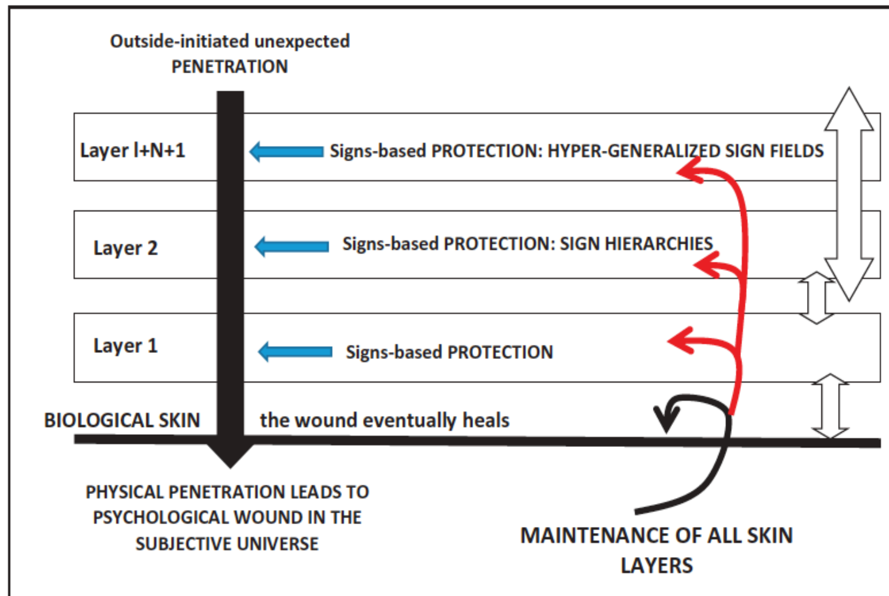

Figure 2. Semiotic skin regulation

(Nedergaard, 2016, p. 398)

The first layer of the Semiotic Skin – closest to the biological skin – represents the area of perception that is non-aware. By this is meant that reflections from this layer is usually not registered, even though signals from this layer very well can be. Wearing clothes is usually not registered and is therefore not perceived in aspects of awareness.

The second layer represents the perceived and registered touch, from where tactile signals are directed from outside-in. When these tactile signals are registered, an inside-out reflex can occur. When a paediatrician examines a child, the child may very well react either by the feeling of rejection (the doctor's hands are cold or it hurts etc.), or by e.g. comfort (the touch from the doctor is nice and calming).

The forthcoming layers holds the notions of deep touch and represents higher hierarchical representations. These layers shows to hold tasks of dynamic relations in openings and closings across layers and thereby become the holders of interlayer communications. From the biological skin, the Semiotic skin grows in multiple layers and from a perspective of inter-human communication regulates processes in which – eventually - a hyper-generalized sign field is established at the very outer layer of the Semiotic Skin.

As for the connection between a child as a patient and a paediatrician, this means that the new layers become cultural tools as to reflect upon the inter-human contact as a hyper-generalized feeling. For the little child or infant with no oral language this can be understood via the actual examination of the child by the paediatrician executing – for the child – known tactile contacts (e.g. taking off the clothes) and the child's emerged corresponding feeling of this action (e.g. relieve of wearing clothes).

Abduction with a twist

Charles Sanders Peirce (1839-1914) did a very dedicated and immensely crucial work developing the theory of abduction. Even though he had severe difficulties by describing a coherent theory with coherent elements of processing hypothesis. Some of this work of Peirce is brilliant but it also holds the aspects of further investigation and thus further development of the theory.

Peirce's late abductive theorization has three elements involved: Surprise, creativity and explanation (Kruijff, 2005, p. 442). As to get to these elements, the inference for Peirce to perceive of abduction he noticed:

> *"The surprising fact C is observed,*
>
> *But if A were true, C would be a matter of course;*
>
> *Hence there is reason to suspect that A is true."*
>
> (Peirce, 1967, p. 315)

Peirce's ideas of a surprising fact were as a breaking up of belief, since one cannot startle one self and thus it is genuine. This concept of surprise we will try to replace by the concept of *different.* The idea of the need of a surprising fact to induce an abductive process is just not adequate when understanding the work of a doctor diagnosing and negotiating treatment of a patient. There is not necessarily any need of recognizing a surprising fact as to emerge at an abductive processual approach, since not every patient gives rise to a surprising (and thus unknown/unpredicted) anamnesis.

The second line, Peirce had an explanatory reasoning of A as a novel explanation: *"a conception which does not limit its purpose to enabling the mind to grasp into one variety of facts, but which seeks to connect those facts with our general conceptions of the universe."* (Peirce, 1967, p. 475). In this sense he stressed that the formation of

A is a creative act, since this particularly is the only kind of argument that can provide us with an emergence of a new idea.

Connecting the aspects of not a surprising fact, but a different one, it seems that the doctor's observation and perception of the collective patient implement the creativeness of both a medical, scientific knowledge as well as a personal, psychological knowledge. The doctor reacts towards the collective patient as a unique case (different from any other case) even though other patients have had similar anamneses. As to reach the state of diagnosing, the doctor creatively connects all aspects of medical and psychological knowledge. In this sense the aspects of irreversible time give rise to anticipate a future in notions of the asymmetry between past and future (which Peirce was not able to deal with) (Pizarosse & Valsiner, 2009) and thus develop new ideas, new knowledge and new developmental aspects of a doctor's professional work.

This introduction of irreversible time in abductive reasoning does eventually not solve the entire problem of a surprising fact/different fact since the predictability of the future only emerges in a "steady state" in irreversible time. This predictability is though immediately converged into unpredictability, since infinite "steady state" of time is not possible and thus the idea of a stable process within irreversible time gives no novelty.

Connecting majorities

What does provide us with novelty is the connection of cases with seemingly identical trajectories and content. The first case could be the eight months old child with diffuse and constant symptoms of not wellbeing. The second case could be very similar to the first case, but both cases are equally unique in their own processes and persons being a part of it. Third case could on the other hand be very different from the two others. It could be a 15 years old boy with severe lack of physical and psychological contact to his parents and parents with a description of very directly located pain and not well-being. The child speaks it-self and says the same as the parents. But this third, unique case has an equal diagnose as the two first cases. Over time these three cases are fully connected in establishing experience of diagnosing the specific anamneses of all three cases.

Connecting these three cases in irreversible time (and eventually many more) the outcome of the events leads to a new level of meanings and thus provide the entrance of an abductive reasoning. Introducing irreversible time is though not enough to fully understand the abductive approach into making meaning of a doctor-patient communication.

Looking at the variability in the above mentioned individual differences from the point of Maruyama (1999) it seems obvious to build upon his mathematical introductions to psychological research as to redirect from the normal distribution in connecting cases:

> *"The uncritical use of the assumption of normal distribution—the bell-shaped curve—dominated psychology and social sciences. But in this assumption, something important was overlooked. Researchers tended to forget or never learned how the bell-shaped curve had been mathematically derived and defined. The normal distribution occurs when both the following conditions are satisfied: (1) The fluctuations are random; (2) they are independent of one another. But psychological and social events are neither random nor independent. Therefore it is illogical to assume a normal distribution."*
>
> (Maruyama, 1999, p. 53)

By this misfit of statistical methods in psychology, Maruyama introduces the notions of *deviation-amplifying-processes*, which connect in coordination of equilibrating processes with *deviation-counteracting* (Maruyama, 1963). In this sense the open systems we work with, generate increasing variability as well as reducing it, and thus, developing the theory of abduction shows the ability to connect the different traditions of measurements in psychology. Developing this transposition from one context to another, the units and above mentioned cases of analysis shows to be crucial elements of translating theory into investigations.

Theory translating into investigations creating novelty in irreversible time seems somewhat incomplete, since the actions providing knowledge as to emerge at an abductive reasoning, still lack a component. This component could very well be the notions of Baldwin's (1895/1897) *circular reaction*. This is a reaction to environmental inputs that introduces a novel moment, which can be connected to the semiotic skin as to the *re-action* and the *counter-action.* This re-action/counter-action of a stimulus gives rise to an anticipation of the next possible event, which again changes the environment as to emerge at a new way of understanding. The circular reaction produces - in near connection with previous forms – a novel reaction and thus creatively produces new versions of conduct. This is very nicely in line with the work of a doctor examining and observing a patient and from these inputs anticipate a specific diagnosing of the patient. Baldwin (1895/1897) introduces so to speak a future oriented feed-forward mechanism of constructing novelty in relation between inputs and internal processes of construction via circular reactions (Valsiner, 2007).

Threshold for detection of novelty now shows to hold a triadic sign structure, since it relates on a sign of something different or making a difference, irreversible time and circular re-actions/counter-actions as to arrive at an abductive reasoning via connecting nomothetic and idiographic notions as equilibrating processes.

Conclusion

Observations of something different provides the collective doctor with knowledge that leads to a creative act – combining idiographic and nomothetic aspects – as to end with a diagnosis that seems the most plausible. This abductive approach in diagnosing then holds the aspects of time and experience as to provide the (collective) patient with a range of treatment opportunities.

The collective patient holds all the implications of information of him/her and thus have the ability to provide the doctor with the knowledge to build-up a foundation from where a diagnosis can occur. The doctor then has the ability to connect several and similar unique cases over time, which are - in the build-up of a diagnosis – becoming an idiographic category. The collective doctor unifies this idiographic category with general knowledge from nomothetic (medical natural science) aspects as to end off with a specific treatment. Hereby the collective doctor extends his/her general knowledge and thus builds a further nomothetic generalization based on all the idiographic aspects as well as the network communicative inputs.

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6.2. EPILOGUE

Creating a partnership in communication calls for the necessity of the semiotic skin as to negotiate the various and multifaceted and complex aspects of a communication between the collective doctor and the collective patient. This creation of a partnership holds the three elements of Peirce's (1967) late abductive theory: different, creativity and explanation (Kruijff, 2005), which are all parts of every dialogue between doctor and patient. Hereby the connection of SST, abduction and the concepts of collective doctors and patients is described.

The aspects of the collective doctor and patient represents the very unique and specific description of the negotiative flux through the multiple layers of the semiotic skin. Voices in this sense the represents the process of open and closed channels of the border-zone, where relating of the impacts create new connections and thereby relations and identifications.

Understanding the essence of an individualization – as with the infant – this kind of individualization is only possible by the mutual negotiations through the multi-layered and intertwined semiotic skins of the participating communicators. Hereby it becomes evident that the individual's creation of identity and communicative negotiations as fluxes through the semiotic skin, combined with the biological skin, hold the notions of the collectiveness, which is played out on and in the individual's skin.

The theoretical framing of describing the asymmetrical communication between healthcare personnel and patients in the Danish healthcare system, now leads to a step ahead of solving the discrepancies in the SDM theories and practices. Now it becomes crucial to land a new theorization as to develop and implement a new culture of communication processes between healthcare personnel and patients. This theoretical description of a culture of communication hereby holds the notions of new practices in the sense of establishing communicative platforms between the participants, as to reach the hyper-generalized sign-field of feelings and identities for the communicative participants.

CHAPTER 7. COMMUNICATION IN HEALTHCARE SYSTEMS

As stated earlier, communication through and via the semiotic skin as well as the biological processes in understanding the border-zone between humans and everything between them, lacks a perspective of bodily non-verbal communication and contact in every relation. This perspective is very well internalized and interpreted in the aspects of musicians' embodied expressions and in their mutual performances. This shows very crucial when working further into the development of a new way of thinking communication in the healthcare system.

One way to do this is to introduce the non-verbal actions of musicians' professional work (Chan, 2013) and to relate it to the asymmetrical communication in the healthcare system via gestures, sounds, facial and bodily expressions and eye contact (Levasseur, 1994, Kurkul, 2007).

7.1. ARTICLE 4.

Nedergaard, J. I. (2018). Communication in Healthcare Systems. When Doctors and Nurses Become the "Tools". *Human Arenas.* Springer (In review).

Communication in Healthcare Systems

When Doctors and Nurses Become the "Tools"

Jensine I. Nedergaard[2]

Abstract

In healthcare systems all over the world, there has been a tremendously huge amount of research in how to communicate; as to reach compliance with the patients. This approach has been categorising the theories into Shared Decision Making as a tool for

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the healthcare personnel to communicate and relate to the patients. In continuation hereof the Decision Aids were introduced as to monitor and help patients to reach mutual compliance and understanding with the healthcare personnel.

These approaches are all very well performed in the sense of simplifying an extremely complex process – as all human communication is. They are just not good enough to be the foundation of creating courses in educating healthcare personnel in communication. They need the embodied understanding of these complex and multifaceted processes. Processes, which are non-verbal and performed by musicians and conductors every day, for them to do their job and create good music. Therefore, we need to look into theories in this professional area as to extend the SDM and develop a new understanding of communication as embodied. Further research must thus be developed as cross-disciplinary approaches between medicine, psychology, music and other relevant actors.

Introduction

Doctors and nurses working in healthcare systems meet patients, relatives and colleagues every day and are thus bound to communicate with them. This communication is multifaceted and complex. When doctor and patient meets in dialogue, a mutual communicative platform is created. On this platform, meaning making processes are held and expressed mutually by the participants. This mutuality shows to be multifaceted and complex since a dialogue between one doctor and one patient contains several "voices", represented by the collective doctor and the collective patient (Nedergaard and Jensen, 2018). Hereby emerges complex dialogical references, which can be difficult to interpret and thus relate to. On this dialogical platform - with a mutual difficult relational understanding - meaning making emerges and asymmetry between participants arises. This asymmetry is being revealed as to detect dialogical discrepancies.

The idea of detecting the discrepancies lies within the need to educate healthcare employees in communicative situations, as to balance the inter-relational dynamics between them and their patients. To do that, the theoretical frame (Nedergaard, 2018) needs to be solid, as to understand this asymmetrical, embodied and multi-complex communication. Therefore, a corporation with other professions – than healthcare employees - have been introduced. The relevant and most inspiring professionals in this research are conductors and classical musicians, which have a unique understanding and performance of non-verbal, embodied communication. Two in particular are, the conductor who has written a book about non-verbal, embodied communication when conducting (Ettrup Larsen, 2007) and a clinical psychologist and former solo clarinet player, Anette Søgaard Jensen. Their understandings and reflections as professionals in this particular area of research are extremely nuanced and thus bridge the gap between professions, cultures and mutual sciences.

Background

When doctor/nurse-patient contact is established, it requires a concurrent process where the will to cooperation is mutually internalized and conducted by both participants as to give and create meaning for one self and each other. In this process, both doctor and patient establish a connection - or a so-called partnership – where they find comprehension for each other (Valsiner, 1999; Valsiner, Bibace and LaPushin, 2005; Nedergaard, 2017). In a partnership model (Bibace et al., 1999), the communication between doctor and patient as a mutual process, is emphasised. This to implement meaning making elements via verbal and non-verbal communication. As a superordinate description, the multifaceted communication is bodily and thus becomes the object of the ability to regulate and administer the flux of information and signs that is incorporated and reflected upon by doctors and patients. This is a verbal, non-verbal, physical psychological and even silent process. Difficulties in inter-relational dialogues between humans are to decipher the actual meaning by the actual expression. Pursuing to decipher these difficulties needs an approach that is based on multiple meanings. Thus, it will be processed from the idea of inter-subjective and mutual-social realities, which are received and internalised between humans with different life-worlds. From this foundation, a part of the fundamental knowledge will be embedded in an everyday language and a part in an abstract bodily understanding. This abstract bodily understanding will not necessarily be perceived as meaning making – from a general understandable code – in a human's known, social world (Rommetveit, 1985, 1992, 2003). Human dialogue can thus have the purpose to create a basis of human development through the interaction between two or more persons. It can be a symbol, through which the interpretation becomes a meaning making element. When the dialogue precisely holds the foundation of the externally meaning making understanding via symbols, it gives the ability to internalise the manifold aspects of the external world in a human's mind and way of thinking (Valsiner, 2006/2014).

What have already been done?

Dialogues or even communication in general between doctors, nurses and their patients address (preferably) the development of models that are able to explain - clearly and simplified - the processes that emerge in this particular kind of meeting between humans (Woodhouse et al., 2017). Any complex process has been seen to prefer this kind of simplification as to approach the understanding of the process more accessible. There have been mutual attempts to this way of simplifying a multi complex communication. In healthcare systems all over the world the communicative process has been preferred to be referred to as *sharing*. This particular reference has the ability to make the complex processes SEEM simple and easily understandable. The decisions to be taken thus appears in a mutual *Shared Decision Making* (SDM) between doctor/nurse and patient (Charles, Gafni and Whelan, 1999).

In cancer treatment the decisions are especially complex and thus tools to support these decisions have been developed as to assist decisions in this process of meaning making for the patient. A review of SDM - and from this any use of *Decision Aids* (DA) - leads to somewhat inconclusive knowledge. SDM is in many ways a good and well-tested tool in communication with patients. On the other hand, it lacks to detect the nuances and complexity in these processes, leading to a poor gain of DA for the patients.

Patients' decision making and the framing of these processes have evolved into a collaboration of decision making between healthcare employees and patients (Stacey, Samant and Bennett, 2008). Options of treatment in especially oncology includes multiple combined variations of e.g. radiation therapy, chemotherapy, surgery etc., depending on the specific cancer. Hereby arises the complexity of the process of treatment, communication and decisions related to these processes, since one diagnose can have multiple appropriate treatments. It thus becomes difficult to communicate medical information in a way the patients will understand and the patients have difficulties in fully perceiving pros and cons of each treatment in the framing of their own values and preferences (Wong and Szumacher, 2012). In a multi-complex process as this, the patients eventually have to make a decision - though it is very sensitive of their preferences - and thus becomes the final decision in registering benefits and harms, taken in consideration of their values as well (O'Brien et al., 2009). Even though the different options of treatment have the same medical effectiveness, the individual outcomes may very well differ in side effects, recurrence patterns and cost etc. and are hereby also valued differently by each patient (Herrmann et al., 2016).

SDM in oncological care

O'brien et al. (2009) e.g. - finds that the growing involvement of patients in decision-making processes can ameliorate the healthcare outcomes and the SDM thus has become a significant element. In spite of these very positive findings, SDM shows to have its peak of usefulness in preference sensitive contexts where the medical evidence of benefits do not counterbalance the harms, and survival rates are inconclusive. From this inconclusiveness emerges a wide range of variations in patients' desire or rejection of the various treatment options (Arora et al., 2009; Katz and Hawley, 2013; Obeidat et al., 2013). For SDM to even occur, some criteria are to be present: 1) at least two persons must participate (doctor/patient). 2) they both share information. 3)they both work towards unanimity of a preferred treatment. 4) they both must agree on a treatment (Charles, Gafni and Whelan, 1999; Alden et al., 2014). Sharing the process as well as the patients' preferences and values distinguish SDM from the decision-making model, which only inform on the outcomes (Charles, Gafni and Whelan, 1999). In relation to this, examinations of processes of decision-making, preferences of treatment and patients' values have been made with bone metastasis participants who was to choose between longer or shorter palliative treatment. A

decision board was provided to guide the patients towards their preferred treatment. It was significant that a majority of the participants preferred collaboration with their doctor, AND they were more likely to choose a single fraction regimen – out of convenience – even though the multi fraction schedule had a higher rate of retreatment (Szumacher et al., 2005).

As the complexity in the communicative processes, so is the complexity in patients' preferences of desired involvement in the decision-making, which relates to e.g. type of cancer, medical knowledge, culture, gender, race, education etc. (Mead et al., 2013; Levit et al., 2013; Zdenkowski et al., 2016). Regardless of any preference, the alignment with the doctors' approach is mistaken and thus only 34-42% cancer patients get the treatment of their preferences and desires (Gattellari, Butow and Tattersall, 2001; Sheperd, Butow and Tattersall, 2011). Discrepancies between the patients' preferred co-determination and the actual involvement lead to lowered satisfaction of the process as well as a higher level of decisional regrets, which leads to lower quality of life (Wong and Szumacher, 2012; Epstein and Gramling, 2013; Tariman et al., 2010).

Decision Aids in oncology

As described, there are divergent outcomes of different research projects in SDM and DA approaches. It suggests that patients are challenged when understanding and perceiving medical descriptions during consultations with oncological personnel (Neuman, Charlson and Temple, 2007), and thus several interventions to include patients, DAs and training of communication skills for both parts as to prevent patient anxiety during the process, have been attempted. DA is described with qualities that prompt and improve the outcome information via e.g. brochures and even personalized programs to help the patient with his or her unique situation and register this process in a personally induced model (ibid).

DAs have in several projects been described as improving patents' understanding of own illness, lower their internal conflict when making decisions and aligning decisions with values and preferences. Patients are also more satisfied with their treatment as well as they trust their doctors and thereby lower patients' anxiety (O'Connor et al., 1999; Stacey, Samant and Bennett, 2008; O'Brien, 2009; Wong and Szumacher, 2012). DAs hereby represents an approach which is individualised as to help patients achieve the best decisions in line with their informed values.

On the other hand – projects concerning DA also show that the data collected in these studies are of poor quality with biases, lack of clear results from testing etc. Therefore, The International Patient Decision Aid Standards (IPDAS) have written up standards and criteria for evaluation of DAs quality (Coulter et al., 2013; Elwyn et al., 2006).

SDM in practice

As seen, the implementation of SDM in practice is extremely difficult from the approach under which the theory is described for now. DA is not seen to succeed in oncological practice either (Coulter et al., 2013; Kane et al., 2014). Some explanations could be a lack of awareness of the patients' individual personalization, passive preferences from either patient or relatives and a severe demand of time and significant communicative skills from healthcare personnel, that is not present (Neuman, Charlson and Temple, 2007; Spiegle et al., 2013; Holmes-Rovner et al., 2000). Doctors are seen to have limited knowledge of the SDM and thus gives medical information without considering patients' expectations, preferences or values (Stacey, Samant and Bennett, 2008; Graham and Logan, 2004). To prevent this, The Informed Medical Decisions Foundation have made a six-steps-model to follow (The SHARE Approach, 2014):

1. The patient must be invited to participate in the process.
2. The doctor must present options of treatment.
3. The doctor must inform on risks and benefits.
4. The doctor must support the patient – from their preferences – in options.
5. The doctor must facilitate the decision-making and thus deliberate.
6. The doctor must implement SDM.

The patient has a severe wish to be healthy and thus one should presume that making a decision for the patient would be done with a solid knowledge of one's own illness and opportunities of treatment. Unfortunately, it is not always so (Strauss, Fagerhaugh, Suczek and Wiener, 1997). The most important thing for the patient is to be healthy – whatever that means for each individual – and thus does this desire become the foundation from where any decision is being made. The patient reacts and make decisions from a psychological and existential position – not via detailed medical information provided by the doctor or nurse. According the SDM model, the patient has to make a decision on one's own, while the six-point direction from SHARE focuses on the doctor as having the leading role in providing the process of such decision making. How can the patient then become responsible – as required - of own situation and thus make a well-considered and nuanced decision in *solidarity* with the doctor? Not more than 30-50 years ago, patients would not be in processes of making decisions of medical treatment and showing ownership of own body. They would instead rely on the doctor and were in every way expected to cooperate with the doctor – if not doing that; any outcome would entirely be the patient's own responsibility (Kirmayer, 1988). Some of these reflections on doctor-patient relations are still present in the healthcare system today.

This being said, it calls for a new and different approach of researching SDM and DA processes with a severe focus on multi-disciplinary joint works with the implemented parties as leading parts.

Words

Words between humans have a unidirectional effect on the implemented parts. The spoken words will always return to the speaker as well as they reach the listener. This unidirectional effect facilitates the opportunity for the speaker also to become the listener and thus consciously accommodate words and attitudes in the process of conversation. Development of mind therefore holds the notions of unidirectional words between both participants (Mead, 1934). Hereby humans have the ability to anticipate other humans' reactions and responses, since they have the opportunity and ability to change roles (from speaker to listener) and thus put oneself in the other person's place. In this specific process it becomes possible to learn to decipher responses from others, which then will be internalized, as to reveal one's own behaviour from the other person's perspective. The responses emerging in this kind of process will be very much equivalent but never similar and thus reflect the person's self-conscious way of acting. Only retrospectively will the creative I's responses be recognised and thus reflected upon, which means it is recognised in the Me as object. The Me on the other hand develops when acting toward the social world which then gives feedback (Mead, 1934, pp. 177f).

Using language, and reflecting on the words in a dialogue, gives humans the opportunity to determine themselves as subjects, wherein both participants reveal sincere thoughts and feelings, under conditions of keeping receptive and aware toward the other person (Gadamer, 2004). The two participants in a dialogue using words as the tool of relating, becomes actors that both perceive the meanings of the dialogue in very personal ways. These ways are personally connected with the numerous perspectives each of them contain, which therefore emphasises main points of the dialogue from individual perceptions and conceptions (Rommetveit, 1985). What is actually being meant by what is actually being said has to be deciphered in any dialogue. In order to decipher any meaning in a dialogue, as based on the participants' specific and individual knowledge of multiple meanings; the process has to emerge from the interaction between (at least) two persons with each their unique life-worlds as to end with a condition as inter-subjectivity and shared social realities. This knowledge of multiple meanings is in some cases incorporated in our everyday language – in other cases it is incorporated in intangible processes and is thus not meaning making in the person's known world. This complex process of deciphering from two so different aspects requires that both participants are willing to share sincere parts of themselves with the other. For this sense-making of a dialogue to succeed, both participants also have to believe in a shared social and empirical world, in order to reach a mutual role-taking of the other participant in a mutual commitment (Rommetveit, 1985/1992). For this process of mutual dialogue to emerge, the speaker

observes his or her utterances in comparison with the listener's (assumed) life perception and background knowledge. Simultaneously, the listener will make sense of the speaker's utterances by adopting the speaker's perspective, as the listener presumes it is (Rommetveit, 1985).

In spite of this mutuality in commitment when being in a dialogue, equal responsibility in the process is however not necessarily present or even presumed. Emergence of a dialogue has to have an initiator – who speaks -and thus also a listener who attends. The speaking initiator has the privilege to choose the subject of the dialogue (even if not understood by the listener), whereas the invited and attending listener bears the privilege of withholding the commitment of trying to decipher and make sense of what is being communicated in the dialogue. This description of a dialogue implies a form of symmetrical positioning of the participants, even though they bear totally different kinds of responsibilities in the process.

> *"An entire dialogue or a given stretch of discourse is characterized by a symmetric pattern of communication control if and only if unlimited interchangeability of dialogue roles constitutes part of the externally provided sustained conditions of interaction.*
>
> *An entire dialogue or stretch of discourse is characterized by an asymmetric pattern of communication control if and only if the interaction takes place under sustained constraints contrary to the basic or "prototypical" dyadic regulation of privileges and commitments."*
>
> (Rommetveit, 1985, p.190)

Words being used in any communication - symmetrical or asymmetrical – have innumerable ways of performances and functions. The speaker though, have the privilege to use words in three different aspects when initiating a dialogue and when maintaining it. First of all, the words can be neutral words in a specific language, which belongs to nobody. Secondly the words can be an other's, which is holding the other's understanding – and thus expression – of the word. Lastly the word can be "my" word, which – when expressed in specific contexts and with a specific goal for me – becomes imbued with my individual expressions (Bakhtin, 1986/2004, p.88).

Dialogues can emerge where knowledge and understanding are socially shared in cultures with numerous understandings of a certain dialogue and thus it is being determined through negotiation. This negotiation is the very foundation of emergence of meaning potentials, which are understood as ways to mediate different opportunities of meaning in a dialogue (Rommetveit, 1992/2003).

Partnerships

Interacting in dialogues between doctors, nurses and patients is ever so much more complex and multifaceted than idealised models as SDM and DA depict. Not only does this calls for a new and creative way of developing new theory in continuation of of SDM and DA, it also calls for a very varied integration of cross disciplinary approaches, such as e.g. psychology, medicine and philosophy. Both psychology and medicine have to be equally represented in this process of theorising and implementing new practices in dialogues between healthcare personnel and patients. The two theoretical approaches are mutually dependent on each other as to succeed in initiating dialogues that creates relations without anxiety. Unfortunately, psychology is often seen as dealing with the mind, while medicine is dealing with the body. *"yet it only requires slightly more intense observations to find myriad areas in which the two overlap"* (Bibace et al., 2005, p.xiiv).

The process of establishing a contact between healthcare personnel and patients, requires mutual cooperation between the two parties and mutual intention to try to understand and thus make sense of each other. During this development of communication both parts create and negotiate a partnership, even though it is only temporarily. This partnership represents the communicative platform, on/in which they both find and provide each other with mutual understanding. Unfortunately, it becomes very difficult to establish this kind of communicative partnership, if the participants enter the dialogue with two too different approaches and intentions for the communication. Hereby the process of meaning making for both parts are collapsing. From one point of view, the relationship between healthcare personnel and patients are asymmetrical, since they both bear different social and cultural roles as well as roles of expertise. From another point of view, this asymmetry is non-existing, while both parts strive to construct meaning in a mutual context, and they both have to respect the role of expertise they BOTH bear. The healthcare personnel bear the expertise of medical knowledge and treatment opportunities. The patient bears the role of expertise knowing, understanding and feeling one's own body from the outside as well as the inside (Valsiner, Bibace and LaPushin, 2005, Nedergaard, 2017).

To enter into and establishing a partnership - in the partnership model - there is an emphasis on the mutual desire of making meaning and thus make decisions as a joint project while creating mutual knowledge (Bibace et al., 1999). Hereby this special kind of partnership is creating mutual meaning, conducted via psychological and physical processes which leads to outcomes that holds preferences from both parts. Preferences from both parts - thus evolved from mutual processes – holds the notions of individual meanings, feelings and earlier internalized symbols as to give rise to a psychological and physical outcome that both accept, rely on and respect (Valsiner, Bibace and LaPushin, 2005).

For both parts in a partnership to reach their initiate expectations, they have to have faith in each other's will to collaborate in connecting with each other and thus create meaning together. This particular way of making meaning is crucial for both parts, since the preferred outcome for both emerges from these particular psychological and physical processes, embedded in the partnership. The complexity and multifaceted understanding and meaning making gives a foundation of theorization that is very complicated.

When it becomes more complicated: The collective patient

Establishing a relation and communicating inter-relational for a doctor and a patient is complex when taking the above mentioned theory into account. Though this already seems complicated to manage, it is not the only complexity in this communicative process. A dialogue is often understood as a conversation between two or more individuals, with an exchange of ideas and/or opinions in particular issues (https://www.dictionary.com/browse/dialogue, 08.12.2018). This statement gives the impression that any single individual is contributing to the conversation with one angle or personal statement to exchange. From a physical aspect this of course is absolutely correct. From a psychological perspective on the other hand, neither doctor nor patient are contributing with only one "voice" so to speak. This is far from the communicative reality doctors, nurses and patients experience. There will always be *collective* individuals in these communications.

Taking an example of a paediatrician gives a very concrete and solid expression of the collective voices in a single person. When a little child, without any language yet, enters a paediatrician's consultation as a patient, the patient is never alone. The patient will be brought by one or both parents, which creates a dynamic triangle communication doctor-child-parents. In this triangle, the inside knowledge of the body and its ailments belongs to the child, but the reflections, negotiations and decisions concerning treatment of the ailing body belongs to the parents. The closest members of the network around the child are not only the caretakers, they are also the decision-makers – with the responsibility connected hereto to administer. Hereby the concept of the *collective patient* (Nedergaard and Jensen, 2018) is introduced. There is only one patient and one body to examine, diagnose and treat, but not only one individual to relate to in this communication, leading to diagnose and treatment. Examining this little child, the language and words spoken by the patient is obviously not enough to answer any of the doctor's questions. In order to get the information, the doctor needs as to perform his or her professional function; there will be two approaches. These approaches will be conducted as detailed as possible, no matter who the patient is, where the examination is or under any circumstances it is performed. First approach will be the doctor's physical examination of the patient, where a tactile, visual and auditory non-verbal communication is established and shared. This joint communicative relation gives the doctor information of the child's conditions and it establishes a unique mutual understanding between the two

individuals. Secondly the doctor needs more verbal information on factors that the child is without any ability to provide the doctor with, since it has no language. Instead the doctor turns to the parents and ask for their reflections of their genuine and varied understanding of the child and his or her behaviours. The very experienced paediatrician Elise Snitker Jensen explains it like this:

> *The parents told me their little eight month old boy almost never slept and was crying all the time, no matter what they did. They were all very tired now and the parents told me they needed to know how to help their little child.*
>
> *I asked them to tell me all their observations of the boy when in pain and not seeming comfortable. They spoke for a very long time and showed their agony of not being able to help their child. Both parents had a very good and calm physical contact with the child and they were eager to provide me with all the knowledge they had of their son.*
>
> *I could see the child was not being well and I observed he had a very good connection to his parents, since he had good eye contact with both of them and was very good at seeking their physical contact as well. My physical examination of him supported my first observation of a general not wellbeing but also a trusting and cooperative child.*
>
> (Nedergaard and Jensen, 2018)

The child is the one patient but if the doctor is to provide enough knowledge to create a detailed anamnesis, the parents become as important communicators as the child and the doctor. Providing the doctor with their experiences and observations of the child to understand the physical reactions, is the parents' most crucial contribution to the process of diagnosing and treating. Another crucial role for the parents' to communicate to the doctor is the delicate and significant insight in the child's psychological wellbeing and the relations between them.

Having this example of describing the collective patient in mind, and then looking into an adult patient, the descriptions still complies, even though they have a slightly different expression. Establishing a partnership between a doctor and an adult patient, within the two approaches of examination and conversation gives the doctor an opportunity to compare inputs from tactile, visual, auditory and verbal answers. But it is still not just from one source. When a child becomes a patient, the comparison of the different kinds of information and the support of this information – verbal and interpretively – gives knowledge from different sources. For the little child with no language yet, there is only one way to get any knowledge of how the body feels from the inside, which is by externally interpreted knowledge from others.

Patients – children or adults – will always be individual patients, represented via several others, as collective patients. This extension of an individual patient to a collective patient holds notions from several others in the patient's life and surroundings, as well of influences of any kind in the surroundings that in some way have been meaning making for the individual. It can be represented by a child's siblings, teachers or parents and by an adult's spouse, colleagues or children etc. the extension of the collective patient is numerous and thus it becomes tremendously important to understand what is representing this collective patient in the moment of communication. This will most likely be impossible in practice, but being aware of this collectiveness opens for the ability to question beyond the visibly noticed information as to understand the mutual dynamics between doctor and patient.

As described, the collective patient gives information of an extended pool of useful knowledge and thus a more varied foundation of information to work with in the process of diagnosing and treating. There is – though – the exact same effect of limitations in the collective patient, which becomes evident when there are collective voices of people not being present in the meeting between doctor and patient, but the patient is affected be these semiotic negotiations. Exemplifying this could be a patient who keeps asking for a specific examination or scan, which the doctor do not see relevant in connection with the anamnesis of the patient and thus finds the patient intrusive or even aggressive in his or her demands and expectations. What the doctor do not know is, the death of the patient's relative last year and the patient's fear to have the same disease. Or the doctor knows of the death of a child's grandparent a few month ago and thus ignores any somatic diagnoses of e.g. stomach ache or fatigue, with an acknowledgement of the psychological effects of sorrow. These last examples (which are JUST examples) leads to the description of the *invisible collective patient*, which is the one to be especially aware of, when communication becomes either difficult or stagnating (Nedergaard and Jensen, 2018).

Even more complicated: The invisible collective patient

In the very first meeting and the very beginning of any meetings further on - between the doctor (or nurse) and the patient – it always puts the patient as the most important object of interest. Secondly, the different and unique aspects of the individual as a collective patient become significant, while any anamnesis is created via all the multiple presentations, present at the time. Thirdly, the invisible collective patient becomes crucial, since this part often becomes the influence that is difficult and even sometimes impossible to detect and thus act upon. If any dialogue or communication of any kind seems to lack meaning for both parts and the partnership becomes difficult to establish, one might ask into unknown aspects of behaviour that seems incomprehensible, as to try to detect the invisible part(s).

Examining a little child with no language, puts the doctor's very first interest to the child, which could be eye contact with the child or a direct acknowledgement of the

child of any kind. It still requires an instant and direct contact with the parents as well though, since the description of the child's symptoms and behaviour comes directly from the parents – making them very central as the collective patient. When the doctor examines the child, the parents then become peripheral in the contact with the primary patient and thus the parents become invisible – at least for a moment (Nedergaard and Jensen, 2018).

Multi-complexity: The collective doctor

The collective patient and the invisible collective patient cannot be introduced without the counterpart at the doctor's side of the communicative platform, established between doctor and patient. Establishing a communicative partnership between doctor and patient from the theory of the partnership model (Bibace et al., 1999, Valsiner, Bibace, LaPushin, 2005), it is evident that the communicative engagement at the doctor's side cannot be less represented than the one from the patient's side. The *collective doctor* has the exact same features of collectiveness as the collective patient does. A doctor does not only work on their own, and thus need to cooperate with colleagues from different areas as well as they all have their own personal experiences, values, preferences and feelings in the play of a collective doctor. Some are very open and known, e.g. reading the journal from another doctor to get to know the anamnesis of the patient already provided. Contacting a psychologist when the patient is in need of a specific therapeutic process on an oncological ward. Or being an oncological doctor who would never make inappropriate jokes with a patient in despair, because he or she had a supervisor who told them and showed them another way of communication. the *invisible collective doctor* on the other hand, is slightly more difficult to get into in the communication, since the cultural acknowledgement of the doctor as professional, does not apply for the patient to ask the doctor what is bothering him or her, if the communication does not lead to establishing a partnership (Nedergaard and Jensen, 2018). As described earlier, the doctor bears the responsibility of creating the communicative platform between the doctor and the patient and they both establish the partnership with mutual acknowledgement of each other and thus also respect each other's roles in the asymmetrical relation. It is not for the patient to ask personal questions to the doctor, which is necessary the other way around.

Even though there will be established a partnership between the doctor and the patient, and they both bear severe aspects of responsibility to make it work, there is an asymmetry in responsibility of creating the foundation and manoeuvring the communicative platform. Acknowledging this symmetry and asymmetry in the exact same communication and the symmetrical and asymmetrical responsibilities connected to these processes holds the ability and information to develop further from the SDM and DA as to reach a more satisfying and nuanced way of communicating in the Danish healthcare system.

Embodied communication

As described, not only words are the foundation of communication between healthcare personnel and patients. The body is as crucial in the process of establishing and maintaining a partnership, and thus we need to extend the theoretical foundation from SDM, DA, theories of words in dialogues and the partnership model.

Any cognitive aspects for human beings are inseparable from the body. When communicating, language is intimately connected with the whole body (inside and outside) and thus both symbols and bodily gestures are transmitted. These bodily actions create contexts in which other participants are invited to participate via e.g. a gaze, pointing, emotional facial expressions etc. (Richardson et al., 2007). Bodily communication shows tremendous flexibility and abstraction ability, since it bears the expression of different signs. In any bodily communication both iconic, indexical and symbolic signs are represented. An icon as a symbol carries the meaning of it in itself and thus characterize something by relating it to similar aspects. the length of a fish e.g. can be showed by hand gestures and is thus an iconic sign in embodied communication. Indexical signs in bodily communication is – as well-known – any kind of pointing gesture, and fairly easily detected, interpreted and understood. Symbols – on the other hand – can be slightly more complicated to decipher, since the participants in the communication need to share social background, customs and practices. Expressing embodied symbolic signs in everyday life is expressed through playing music, dancing or simply everyday conversations (Peirce, 1902/1965). All three types of signs are normally expressed in unity throughout any human conversation. These embodied human conversations carry the importance of sharing the information and further the reception as well. Processes which are both conscious and unconscious, and thus holds the notions of *dynamic* processes of the transmission and perception.

Conductors and musicians

Working into the area of embodied communication, it became evident that a conventional and single aimed approach would not be sufficient to cover the multi-complex variations. The non-verbal and bodily aspects of the process of communication between healthcare personnel and patients were not covered yet. Both the doctors and nurses reflected on their physical contact with the patients and how this contact affected the process of communicating and their own perception of their work.

Conductors and classical musicians express themselves through non-verbal approaches and are very aware of each other's signals before during and after the performance. This awareness is crucial in understanding and reflecting upon any contact between healthcare personnel and patients, since most of the signs and signals to be interpreted in a communicational meeting relies on non-verbal aspects – even

though they become less reflected upon, since the verbal aspects become stronger (Chan, 2013).

Conversation between healthcare personnel and patients indicate a social skilled practice – so does music. Both are results of group efforts and both holds the notions of non-verbal communication, which e.g. shows through gestures, sounds, facial and bodily expressions and eye contact (Levasseur, 1994; Kurkul, 2007). In music the non-verbal aspects of becoming a musician and a conductor is very well supported and respected as both social and artistic skills, necessary to reach the communicative goal in performing good music (Jensen and Marchetti, 2010). This acknowledgement of importance of the non-verbal interaction allows musicians to tune-in on each other as to reach a flow of the group that either creates a genuine musical cohesion or it gives the opportunity to correct each other's mistakes in a group-performance without interrupting (Davidson and Good, 2002; Sawyer, 2006).

Even though the non-verbal communication in music is acknowledged, it is still not being recognized as a special skill. It is a tacit knowledge that cannot (or at least with great difficulty) be shared via verbal descriptions, since the performers of it are not fully aware of them expressing it (Polanyi, 1983). Performing non-verbal communication in music is for any individual including habits and behaviours, which are internalised through observations and interpretations of other musicians' actions (Kurkul, 2007; Jensen and Marchetti, 2010). In studies of this non-verbal communication there are three categories contact: 1) *Kinesics*, which is eye contact body postures standing or sitting, nodding hand gestures and facial expressions. 2) *Proxemics* is the physical distance or touch of the other's body. 3) *Paralanguage* expresses both quality of voice and silence (Kurkul, 2007; Jensen and Marchetti, 2010). These factors of non-verbal communication are expressed e.g. through piano duos who uses bodily expressions, eye contact and facial expressions as to register and synchronize markings in the music (Blank and Davidson, 2007). The conductor in particular represent this kind of non-verbal communication through gestures to communicate timing, flow and mood of the piece of music being performed as to interpret and create the music in cooperation with the orchestra (Cottrell, 2002). As for this mutual cooperation to function optimally, the musicians are to be able to see and relate to both the conductor and the other musicians (Davidson and Good, 2002; Luck and Nte, 2008). Hereby the orchestra profit from the conductor's timing and expressions and via observations of the other musicians they perform more precise indications of the music. Performing music in this context provides for creative approaches from both conductor and musicians, since any performance is temporal and thus creates the music in *the sonorous now*[3] (Ettrup Larsen, 2007), in a mutual responsive performance (Sawyer, 2006; Jensen and Marchetti, 2010). Performing music via non-verbal interaction thus becomes a tool for group creativity.

[3] Translated from Danish: *Det Klingende Nu*

The three categories of non-verbal contact, the tacit knowledge and the creative group performance applies to the communication between healthcare personnel and patients as well, since all of these aspects are present in the process. Instead of focusing on the spoken and written word, it must be emphasised that this particular way of understanding and implementing non-verbal performance during interaction has to be taught and registered as semiotic tools of changing the communicative culture of dialogue in the healthcare system.

Non-verbal interaction in music is often initiated by a leader who then guides through non-verbal expressions. This shows a hierarchy in negotiating positions and flux of information as to make meaning and prevent anxiety and eventually reach the hyper-generalized feeling of the situation (Nedergaard, 2017), which is similar in communication between healthcare personnel and patients. It is the doctor or nurse's responsibility to create the communicative platform, the patient expects them to do so, and it is both parts' responsibility to create the flow in the communicative dynamic as in a partnership. The leader sends non-verbal clues as to guide in a hierarchical context as to relate and make mutual meaning of the performance.

Establishing a partnership in a hierarchical context in mutual understanding of each other is very beautifully described by Claus Ettrup Larsen, solo flutist who supervised a younger colleague:

> *"She plays beautifully but lacked the true expression in the musical phrase. I asked her to keep the tone a little longer. And she did. She performed what I meant, not what I said – because she should not play the tone for a longer period of time; she should hold the FEELING of the tone longer."*

Music is felt in the body as both tones and silence, and becomes well performed and emotional when the performers have the feeling of self-believe and self-efficacy. Behaving out of this belief as a motivator leads to success (McPherson, 1997). For a clinical psychologist at an oncological ward, this specific skill is an epoch-making professional expression. Anette Søgaard Jensen is a skilled solo clarinet player AND a skilled clinical psychologist at the oncological wards at Aalborg University Hospital in Denmark. She described an episode with a patient like this:

> *"He was in despair and I didn't know what to say to him. I just FELT he needed to be hugged. So I did. We just stood there and his body slowly relaxed. He looked me in the eyes and thanked me with his words and his body."*

Anette hugged the patient without asking or verbally introducing her coming act. She dared to act non-verbally and was confident in her anticipations of his reactions, while she read and acted upon the non-verbal signals from the patient because she already relies on her ability to be aware of others as to adjust her expressions in MUTUAL

performance. This particular way of relying on one's ability to register non-verbal signals as semiotic tools, we should practice more exclusively.

What is lacking?

The severe difficulties in implementing SDM and DA – as successful tools of communication – in healthcare systems seems very obvious for a cultural psychologist with medical experience. Doctors work with the patients' bodies every single day, but they do not take their own body into account when communicating with the patient. Nurses have another approach to the caretaking of the patients' ailing bodies as well as using and understanding their own bodies as communicative tools, which brings them in a culturally and communicatively more accessible position with the patients than the doctors. The psychological theory of communication, which is well developed are not being taken – enough – into account, and the culture and signs connected hereto is not either being implemented in the theorization of understanding the complexity that will ALLWAYS be present in human relations. Of all kinds.

Understanding and acknowledging the asymmetry that inevitably arises between communicative situations between doctor/nurses and patients, also seems to be totally lacking in describing, reviewing and even developing the theories of SDM and DA. Hereby it becomes very difficult to detect and understand each participants' roles in the communication.

Conclusion

All the former approaches in categorising and simplifying a theoretical description of communication and compliance in healthcare systems all over the world, such as SDM and DA, are a very well-considered and important tools. Unfortunately, they also bear the deception of trying to implement security and understanding of human processes that are far more complex and complicated than indicated. Therefore, we need further research as to investigate these communicative processes as embodied and complex beings – with all the complex aspects combined hereto.

This makes it absolutely impossible to create a course in communication that fits all healthcare personnel and thus we need to develop courses that demands a lot from the lecturers of the courses, since they need to relate to each participant of the course, as to gain a solid understanding of one's own reactions and deficits in certain communicative situations. This approach thus requests for a **cross-disciplinary cooperation**, which has been started between medicine, cultural psychology and music for this article to be written. We need to understand the feeling of *performing* communication – as Anette Søgaard Jensen – in order to relate.

This – I boldly claim – applies for a very early introduction of this special way of communication in healthcare systems. Medical and nurse students thus should be

introduced to new theories of this specific area. Also experienced personnel need regular courses, as to keep in touch with their own embodied reflections on communication.

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7.2. EPILOGUE

Complex processes of deciphering – as to make meaning - and the following mutual willingness to share sincerity from and to one another is crucial for the relations between healthcare personnel and patients. When mutual commitment is established, it becomes possible to communicate on and through the border-zone between the communicative participants. This border-zone is represented by the fluxes through the multi-layered and intertwined semiotic skins of the participants, along with the connections between the psychological skins. This rises the notions of the connections between the psychological and physical aspects of verbal AND non-verbal communications between humans.

Musicians' non-verbal performances includes individual habits and ways of acting - internalised meaningfully through observations and interpretations of the other musicians – should not only be seen as a tacit understanding. This inclusion of habits and ways of being are interesting to compare with the asymmetrical communication in the healthcare system, since this platform of communication bears the same non-verbal issues of deciphering and trying to make meaning together. This leads to the next and last article.

CHAPTER 8. ROLE DIFFERENCES IN HEALTHCARE SYSTEMS

Borders have a very special and specific position on distinctions between humans and their surrounding world. Understanding it as a border-zone thus implements the idea of semi-permeability and aspects of controlling the flux of information across and through the border-zone.

Border-zones between personnel and patients in the healthcare system holds the notions of negotiating the role differences in this Crossfield. The semiotic skin is the theoretical tool to connect the two sides of the border-zone, which hereby places the border-zone as containing the semiotic skin, the biological skin, the surroundings and the inner body and mind. This leads to the ability to analyse how communication between humans can be interpreted. This interpretation only occurs when the borders between humans and environment is overcome, whereby the basis of communication is established – also holding a collective identity (Rayner, 2011). Identities set up contrasts that lead to communication.

8.1. ARTICLE 5.

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Role Differences in Healthcare: Overcoming borders through semiotic skin is the basis for communication

Jensine I. Nedergaard

Abstract

Role differences in healthcare systems are the very foundation of communication in this specific field of environment. It has to be understood as a collective corporation between *collective* individuals and thus connect through intertwined border zones.

These border zones between collective communicators holds the notions of individuality, which is represented in the ability to decipher and negotiate the multiple layers in the communicative border zone. These processes in border zones of persons - in relation with others - are dealt with by the Semiotic Skin Theory. In addition, the biological skin is central for human lives and the *Semiotic Skin* is conceptualized as a socio-somatic-semiotic, layered and dynamic membrane that operates as a semi-permeable, communicative boundary. A constant interpretation between a self-reflecting system and an unending spiral of semiosis is the emergent of the semiotic skin. It creates a semi-permeable barrier that holds the very notions of the multi-layered skin-on-the-skin that is reflected in an embodied communication between humans and environment. In this theoretical understanding of an embodied aspect of not only meaning-making but also the regulative aspect of embodied interaction with others, the very idea of borders of individuality becomes the notion of interpretation. Any communication in a medical setting involves actions on the border of mutual understanding - e.g. communication between a pediatrician and a child. The concepts of a *collective patient* and a *collective doctor* are introduced as to understand the aspects of the multiple dynamics of the semiotic skin as the holder of an individual's personal ideas/interpretations in the interaction with one other person, holding multiple aspects from others as well. Examples of the interaction between patients and the healthcare system in Denmark illustrate how a new theoretical and practical performance of mastering the communicative partnership in the cross field between the healthcare system and psychology is born.

Introduction

Working in the cross field between psychology and medicine in the theorizing of new communicative developments, calls for a collective approach. The collective aspects in this statement is an integration of multiple fields of theory. Therefore, this article will build upon cultural psychology, philosophy, quantum mechanics, chemistry and medicine. Not only is this necessary – it is crucial – if further development of human interaction is to be understood and implemented in future communicative theories in the above mentioned fields of theories.

Cultural psychology has the only theoretical position to develop this approach of science, since it specifically works in cross fields of multiple sciences. The bold statement of this theorizing is the connection and mutuality between different scientific theories and their similarities. Even though this is commonly denied; psychology, philosophy, physics and chemistry are very much alike in the approach of interpretation and facts.

Borders and Boundaries

To even get a grasp of understanding how these theories are related and intertwined, there is a need to understand the connecting areas between them. This applies as well to the connections between human beings as to understand communication and asymmetries in multifaceted, complex and collective aspects. Borders and boundaries thus become important concepts to integrate in the theorization of communication in healthcare settings. Hereby it allows to implement this new theoretical approach in an empirical conduction.

Not only are borders to be understood as a demarcation between countries, estates or other geographical areas, where a distinction between the two areas is necessary. This particular distinction also holds notions of e.g. economic and political demarcations where a hierarchical aspect of power becomes notions of a social constructed border. This emphasis on borders as social constructions emphasizes process rather than the product of the borders. The process is meant as what leads to build-up of the borders i.e. who, why and how these acquire their shape. This process reveals the nature of the borders rather than determining their course or shape at any time i.e. changed locations and the look of borders. The product is - so to speak - the outcome of the process (Popescu, 2012).

Distinction between a border and a boundary opens for further investigation as to emphasize a process – maybe even a flux – via and through a demarcation between at least two sides. One on each side. Using the terms borders and boundaries are – at least in geographical senses - about marking differences (in space) with clear associations of identity and power. There is no accurate meaning or distinction between the two terms. However, *making or crossing boundaries* has by society been seen as a complex and problematic process for as well description and understanding of *making borders* has varied through time in meaning. This suggests that humans have always been in charge of establishing criteria to outline the meaning of the terms borders and boundaries. Indicating these terms are best understood as human made phenomena to help organizing lives and understandings (Popescu, 2010).

This kind of organizing is very evident at the moment we cross geographical borders. We need passports to cross some borders and we do not question the process of this movement. The role of the passport is though ever so interesting since we do not question the inherited acceptance of it as a legal document, but seems to lack the incorporated abilities of it. It is symbolic, as to hold up a cultural definition of national identity and political as to serve legitimization of processes of exclusion (O'Byrne, 2001). Borders and border-crossing thus becomes ever so much more complicated to grasp.

Not only do borders and boundaries refer to a geographical, economic or political etc. understanding. Biology, physiology and even quantum mechanics (Oeckl, 2003) have for centuries implemented the terms in understanding human life and our world in their respective theoretical areas. As for understanding the complex communication between a doctor – especially a pediatrician – and a patient; not only do these terms have to be understood in the sense of space or biology - they need to hold the notions of personal individuality as well as mutual relations.

There IS a border or distinction between every human being, but this does not refer to a rigid or impermeable zone or area. To understand this distinction between human beings in the setting of an asymmetrical communication, we need to understand the build-up of this border-zone between them.

Demarcation and/or border-zone

In mathematical terms, borders are represented by a demarcation between two sides (Tapp, 2012). Looking into the theory of boundary *lines*, it seems obvious that this particular definition works very well in both geometrical – and inequality boundary lines. They represent an outer edge of a geometrical shape, an area/a space or a line representing an inequality graph (Anikonov and Konovalova, 2011). A geometric boundary line indicates the outer edge of a shape or figure that represents the perimeter. The interesting aspect of this description is the common understanding of a 2-dimentional drawing - and thus perception - of the concept. We find the perimeter of a shape by measuring the boundary line. A graph of an equation makes a line if it is a true equation. Having an inequality in the equation on the other hand, gives different values on each side of the mathematical sentence; which gives a line with a shaded area around it.

This shaded area is the first step of understanding boundaries from a psychological view and with aspects of demarcations of a human being. Our skin is of course a clear demarcation of the physical existence of our bodies – the psychological reach into the world is a lot more complicated than this geometric demarcation of a shape. As the inequality line with a shaded area; the human psychological reach into the world and others lives, shows the demarcation as a border-zone. A zone that is not represented by the same extension all of the time or the same permeability either. The shaded area of a human border-zone between one human, the surrounding world and other humans represents a semipermeable zone with multiple layers. These layers are created and maintained by both the owner of this border-zone but also by the surrounding world as well as the people around that makes a person relate in one way or another.

This demarcation becomes multi complex when understood from a mereotopological aspect of mathematics and psychology. Mereotopology is in many aspects seen as the most evident tool for ontological analyses today – but it also holds open questions that needs to be answered. Some are of philosophical origin some are of the difficulties in application. Still they need to be answered as to gain a systematic development of formal ontological theories (Varzi, 1998). I will not claim to answer these questions - which Varzi does not do himself either – but the connection between different theoretical sciences are very much present in the essence of systemic development. Mereotopology not only describes boundaries as lines but as wholes – they need to be understood as complex phenomena, that needs to grow from a very simple notion into the multifaceted complexity it really holds.

A border's most simple structure is a line:

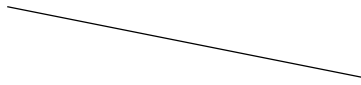

Figure 1. A border

Understanding a demarcation as a border-**zone** thus, does not apply to only one line separating two sides (Marsico, 2018). There must be more layers:

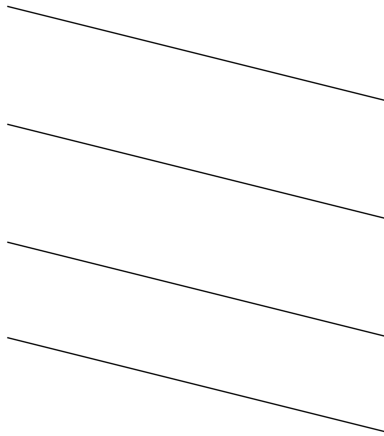

Figure 2. A border-zone

This border has now developed from a demarcation to a border-zone. Still it seems very rigid and without any possibility of crossing. Humans relate to each other and

the surrounding world in a physical as well as a psychological way. This relates to a border-zone that cannot be rigid and impermeable. There must be a permeability in which it is possible for both the owner of the border-zone as for the humans relating to it, to cross it, penetrate it or even to merge together. Yet the navigation through this border-zone must be performed by individual solutions and depends on the level of constraint across it.

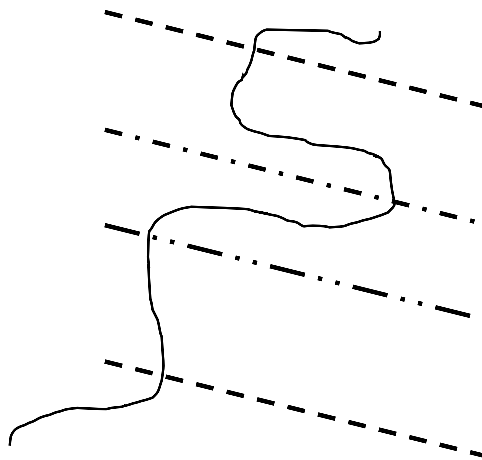

Figure 3. A permeable border-zone

Building the channels and maintaining them is a joint effort and emergence between participants. Chemistry works with a topology of the electrostatic potential gradient, which is the negative of an electric field. This has revealed positions of zero-flux surfaces and critical points with local electrophilic and nucleophilic sites. These sites visualise influence zones, which are delimited by the zero-flux surfaces. This means that the complex topology of the molecule's outside (combined with the inside) shows a partition of the space in so called primary bundles, which are electric field lines with the same starting and ending points. Primary bundles are thus intersections of one electrophilic and one nucleophilic influence zone that result in electrostatic interaction with the whole molecule. If a primary bundle would be charged inside, it would be directed toward either the positive or negative extremes of the bundle depending on its charged nature from beginning. Borders of these electrophilic influence zones contain critical points while borders of the nucleophilic influence zones points are observed. These points are important while they correspond to maximum or minimum charges on the surface. Hereby they indicate points of most likely overcoming the potential barrier before entering the influence zone. This is thus the points where an electrophilic or nucleophilic attack is most favourable. This is interestingly enough

determining where the borders of the influence zones are and if the influence zone extends without limit outside the molecule (Mata, Molins and Espinosa, 2007).

Corresponding points of and in a border-zone - holding the human bodily communication – also relates to this way of overcoming potential barriers and finds its way through the multiple layers of the communicative zone. Or there will be no openings in the zone, which then does not allow further penetration of either meaning making or relating (figure 3).

A dynamic membrane

As very well known, the biological skin is an extremely dynamic, layered, multi-functional and semi-permeable membrane that connects the inside of the body with the outside. It surrounds all of the body and functions as a protective and regulative boundary of - and for - the physical body as well as it holds the notions of an interpretive connection to the environment in which it communicates through the layers via different grades of permeability. This kind of permeability across a boundary is highly restricted both consciously and unconsciously (Rhoades & Bell, 2009; Nedergaard, 2016). In this sense it gives the skin a very central position in the psychological aspects of meaning-making through embodiment.

This kind of embodied meaning making across a boundary is not only a physical demarcation but also the foundation from where the multi-layered semiotic skin as a-skin-on-the-skin co-exists with the biological skin. Both the biological skin and the semiotic skin holds, and hierarchically regulates and organize, signs from which auto regulation and generalized meta signs emerge. In this regulative process the biological skin and the semiotic skin as a united dynamic become a boundary that both separates and unites – as every boundary does (Marsico et al., 2013).

This separating and uniting device has the ability to make meaning of information, experiences and inputs in any way and thus has to be seen as a socio-somatic-semiotic dynamic membrane (Neuman, 2003). It will be affected from both the outside and the inside and thus holds the ability to regulate the flux of information - consciously and unconsciously - across the dynamic membrane by open and closed zones. These zones regulate the flux of information across the semiotic skin as a-skin-on-the-skin and thus represents a multi-layered sign-organized device as to make sense of any impact and counter impact (Nedergaard, 2016).

Layers of semiotic skin

The semiotic skin is a multi-layered sign-organized device – connected to the biological skin - and makes meaning of any impact and counter-impact. The very first

layer of the semiotic skin - that is closest to the biological skin – represents the perception of “no-touch”. Under certain conditions some impacts of the semiotic skin does not encounter neoformations that entail any counter-impact (e.g. wearing clothes). The second layer represents the “touch by X under Z conditions”, where the touch is registered under certain conditions and processed through the semiotic skin and further through the biological skin (e.g. penetration of a needle through the skin). When activating the second layer of the semiotic skin it shows huge differences in the interlayer semiotic dynamics of making meaning of the impact. Anticipating relief of pain by a self-chosen penetration from an acupuncture needle and a violation of the intimate border-zone of a patient’s body by e.g. a doctor injecting any medicament can be perceived very differently. The forthcoming layers represents the “deep touch”, which eventually reaches a hypergeneralized signfield. This could be the FEELING of relief when acupuncture needles are being put into my skin *by a person that I feel secure about* (Figure 4).

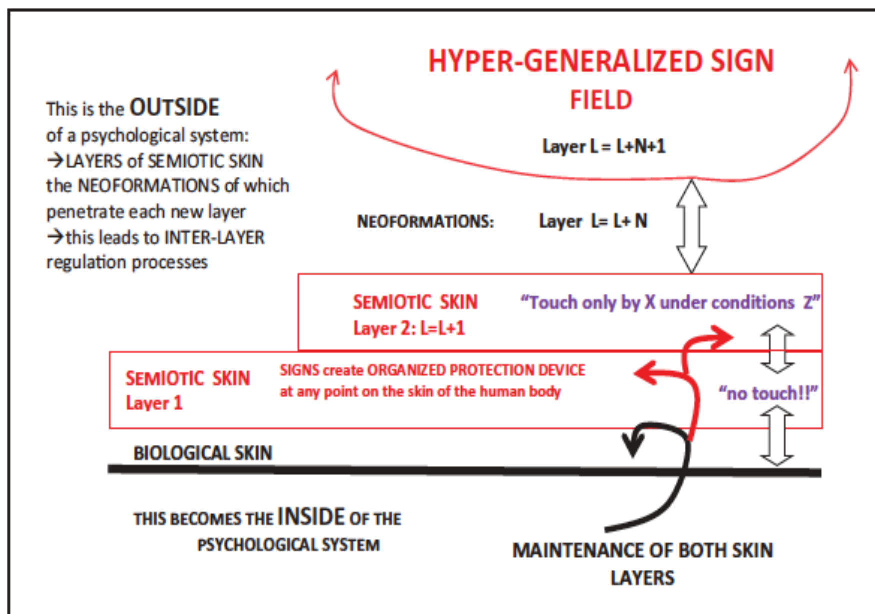

Figure 4. The skin-on-the-skin layers.

(Nedergaard, 2016, p. 397)

As the biological skin, the semiotic skin also shows an interlayered communicative flux that is regulated both consciously and unconsciously. In the intersections of all

layers, the internalization and externalization of cultural psychological processes are sign regulated as to reach a hypergeneralized signfield. This hypergeneralized signfield is connected to the *feeling* represented and negotiated in the underlying layers (Valsiner, 2014; Nedergaard, 2016). The outer layer L+N+1 becomes cultural tools when creating psychological aspects with their corresponding hypergeneralized feeling (e.g. a touch of a doctor, the subsequent corresponding feeling and the perception of this touch).

Meanings on the border

Meanings on the border: Building the "psychological membrane" Looking at these processes of meaning making by interpreting the experiences between the person her-/himself within and the environment, a construction of known will proceed. The known is not a coherent sense of "cause of knowing", but instead an outcome of complex processes on multiple levels and types (Innis, 2016). An incorporation of sense making in the notions of an organized flux of information, experiences and inputs - through the skin – leads to conceptualizing the psyche. Psychology has usually been all too "cerebral" in its localization of the arena where meanings are made—in the "mind" or its biological basis, the brain. Here I widen the perspective to emphasize the centrality of the skin—which obviously includes the regulatory role of the brain. Manifold socially shared cultural resources are regulating the human psyche through signs and a feed forward process (Valsiner, 2014; Nedergard, 2016) in which a boundary between the internal personal endless and the external world outstrips. This boundary is not only the biological skin, as a rigid demarcation, but also the semiotic skin - as a-skin-on-the-skin – that co-exists with the biological skin. These two aspects (biological- and semiotic skin) mutually holds and regulates signs in a hierarchically organized form from which auto regulating – and generalized meta signs emerge.

Human beings build semiotic skin with biological skin

The borderline between the biological skin and the semiotic skin is the scene for playouts that very specifically holds the notions of connecting the inside (mind) with the outside (social environment), all incorporated in and with the body. How can this be displayed as an example of connected skins?

This connection of skins is constantly in dialogue. As Rayner's (2011) logic of natural inclusionality, the evolutionary standpoint is the constant dialogue between any living system and its natural surroundings. This happens on the basis of both independent and co-evolutive processes that are all involved in context and organism. The space cannot be cut and the dynamic relationship between space and individuals as well as collective identity is evident.

Inter-relational communication between organism and surroundings are very well founded in biosemiotics as processes' and systems' impact or effect and interpretation of semiotic relations in the physical, biological and psychological areas (Hoffmeyer, 2008). Semiotic theories and biological knowledge are mutually integrated in new theory as to understand reactions between biological organisms and their internalized understandings of their surroundings (von Uexküll and von Uexküll, 2004). This leads to the combining of semiotic systems of natural origin with those of cultural origin.

Acupuncture is an ancient Eastern medical practice which over the past 50 years has proliferated into the Western world and is now widely practiced among both professionals and amateurs. The most common use of acupuncture is to relief pain but it is widely used in numerous other aspects such as stress relief, indigestion and impotence (Hai, 2013). The mechanisms of acupuncture in pain relief has been massively investigated and it shows an artificial activation in a system of a biological cascade of effects. The sensory stimulation of the needles triggers a physiological change by activating receptors in the affected tissue as to reach threshold of action potential for the nerve fibers to signal. The activated nerve fibers show to be similar to those physiologically activated by strong muscle contractions. Also a light superficial needling excites cutaneous touch receptors which are related to the response as a "touch". This kind of registering a "touch", has a role in the feeling of well-being and social bonding. In this sense acupuncture cannot be explained by the one physical mechanism, since pain is not only connected to a physiological entity. Instead it is a multifarious of varying neuroplastic and psychological changes as well (Lundeberg, 2013).

My bold claim here is that the brain is not singularly capable – from a cognitive neuroscientific viewpoint - to receive and perceive our surroundings-- but also manipulate the way in which we perceive them. This has been covered in "older" psychology by the focus on apperception —a term rarely mentioned in our times. It describes human sense making of any idea by mental processes where they assimilate to already possessed ideas and previous experiences (Merritt, 2009).

In order to incorporate sense making as a flux of information, experiences and input, the biological skin as well as the semiotic skin needs to be actively connected in order to create the ability to incorporate the inside (mind) and the outside (social environment) to identify one-self as a certain kind of person, that responds in certain ways to pain/no-pain in a full penetration of the skin – connecting the biological skin with the semiotic skin (Nedergaard, 2015/2016).

Beyond the original situation

To generalize beyond the original situation, all layers of the semiotic skin must be activated and interacting. The dynamic boundaries within the semiotic skin are very easily registered in the inter-layer communication. The example of a doctor

examining/touching a patient shows how these inter-layer communicative aspects are organized through regulative fluxes which are either conscious or unconscious.

The interesting aspects of what happens on the border and how these events are meaning making for the individual becomes crucial when addressing the space-in-between two sides (Marsico, 2011). The border zone can be exactly where the biological skin is connecting with the semiotic skin, but the zone can also be both connected skins as a whole, and connecting with others and the environment

Being a patient with severe anxiety of needles might not be perceiving the comforting touch and the accomplishing soft voicing from the doctor as any kind of relief. The negotiation of how to relate to the needle, no matter who is injecting, is the primary focus and thus is the perception of touch and voicing from the doctor mainly being negotiated in the outer layers of the semiotic skin as to make meaning of the event to come. The patient knows of the fear of the needle but how the negotiation of the need to have the injection is communicated in the inter-layer dynamics that eventually reaches the hypergeneralized signfield, is the main outcome. This dynamic inter-layer communication and maybe even rejection of relating to the event, gives rise to the outcome of the patient's identification with oneself as being afraid of needles, having the injection anyway, relating to one's own bodily reactions in the moments before, during and after the injection (transpiration, heavy ventilation, screaming, crying, silence etc.).

In the moment of penetration of the needle, the biological skin and the semiotic skin becomes the one bodily agent which is the arena where relationships between individuals are played out. The semiotic skin is physically connected to the biological skin and thus is the registration and control of the sign hierarchies through the flux – as a regulative and dynamic flow - of the semiotic skin making meaning as to understand oneself (identity) in the interaction with others and the surroundings. As to generalize beyond this situation the body becomes the arena of relationships between individuals but also collectivistic dimensions. These collectivistic dimensions are represented in and around all of us.

Borders of individuality: The collective patient

The semiotic skin, with the processes of communication and flux of interpretation, is the embodied act of meaning making between humans and environment. This border of individuality and meaning making between two persons is challenged when the interpretation of meaning is represented by more than two individuals.

In the work of a paediatrician, a communicative process of two – how mutual it may seem – is not enough. When a child enters the medical healthcare system it is accompanied by parents (other adults) and thus creates a communication network doctor-parent(s)-child. In this network the child has the direct knowledge of the body and its ailment but any decisions about the care and treatment of the child is taken by other members of the network. If the child is very little or has no language, the direct knowledge of the body becomes very difficult to reach. In order for the doctor to gain this kind of specific knowledge needed to proceed in the process of diagnosing the child, he/she must have two different approaches to the child. First of all, the doctor will examine the child, which provide a mutual tactile communication as well as a visual observation. Secondly the doctor communicates with the parent(s), as the genuine understanding of the child is held by them and thus gives them the ability to provide the doctor with crucial knowledge of the child's wellbeing.

Not only do the parent(s) provide the doctor with their experiences of the child and its physical reactions – they also very directly give the doctor a significant insight in the psychological wellbeing and the relation between child and parent(s). Hereby the comparison and support of knowledge is held by at least two separate sources (child + parent) as to give an idea of how the body feels from the inside, by external knowledge through others (parent + doctor's examination/observations).

The child is one patient but represented by several individuals and thus emerges the concept of a *collective patient*. This aspect of a collective patient is often extended from the notions of the child-/patient communication and understanding. This extension holds the notions of other people in the child's life and periphery such as siblings, grandparents, pedagogues, peers, teachers etc. This extends the collective patient tremendously in the sense of understanding the patient and provides the communication between patient and doctor with multiple aspects – represented by the people and influences from the patients' surroundings. These influences are not only voices as in the dialogical self theory (Hermans, 2001/2015); instead it very clearly represents specific others and influences, which are internalized via semiotic skin negotiations. Semiotic skin negotiations thus does not represent different voices; they represent the ability to either open or close the permeability of the border-zone of both semiotic skin and biological skin. Hereby the negotiation is not between voices, but an internalized process as to create meaning of a situation as well as creating identity – mentally AND bodily.

Not only does the collective patient give rise to an extended pool of knowledge, it also gives rise of limitations in this communication. An example of this limitation could be the doctor's knowledge of a grandmother's death of cancer and thus brings the doctor to lack a somatic diagnose of a child with e.g. stomach ache or problems of

sleeping, with the acknowledgement of the psychological effects of sorrow (Nedergaard & Jensen, 2017).

Borders of relations: The collective doctor

In the communication between a collective patient and e.g. a paediatrician, the doctor also holds aspects of multiple participants. The doctor will read the patient's journal from earlier - and from other doctors perhaps - and thus reflections from other doctors will be taken into account in the approach of understanding the patient.

An interesting aspect of this *collective doctor* is the notion of e.g. psycho-somatic aspects or other functional illnesses/disorders. When detecting these aspects in the life of a patient, the doctor might refer to a psychologist. In this example the collective doctor is also represented by another discipline and thus holds the notion of multiple voices as both a visible and an *invisible collective doctor* [4] (Nedergaard & Jensen, 2017).

Last but not least - the collective doctor also holds aspects of the persons own relations in life and experiences of all kinds. Not only experiences in the medical professional line but indeed also in the personal and emotional aspects of life course and experiences. Thus the collective doctor holds the exact same multiple and complex facets of a whole, as the collective patient does.

Individual and collective dimensions of meaning making

When two people meet and interact, not only two individuals are present. This becomes very visible in the interaction between a paediatrician and a child, since the parent(s) are physically present. This collective dimension of meaning making is though not as visible at the sight of the doctor. Nevertheless - the collective doctor is just as present as the collective patient. Each verbal, non-verbal and physical interaction are provided and processed by the presence of multiple dynamics from other people and environmental socio-cultural influences. Hereby the embodied communication and reflections of any type of input becomes multi-faceted and complex in the flux across the border zone of the body.

[4] An invisible patient and invisible doctor are defined by parts of the collective patient/- doctor that is not always represented. E.g. when a teenage child attends the doctor with the parents because of fatigue and stomach ache and the child is afraid of having cancer because a cousin had the same symptoms and died of cancer last year. This "voice" of the cousin is invisible until it is being explicitly described.

The biological skin does not rigidly surround all of the body and creates an impermeable border-zone around the individual. Instead the biological skin - as a border zone of psychological meaning making - extends with the outer layers of semiotic skin and thus becomes a socio-somatic-semiotic dynamic membrane in which meaning making (and identity) is negotiated. This border-zone has two intertwined parts – the biological skin and the semiotic skin – which is a dynamic, semi-permeable membrane in which the flux of communication of any kind is negotiated and restricted.

Some impacts encounter neoformations in both the biological skin as well as the semiotic skin and thus provide counter-impacts either by closing or opening interlayer communication zones. When a paediatrician examines a child in pain, the child reacts physically towards the tactile, neurological signals from the touch as well as the psychological contact with the doctor, such as soft speech, cold/warm hands, eye contact, parent(s)' reactions etc., which all are sign regulators. The doctor on the other hand has the exact same processes of interlayer communicative flux and closing/openings of border-zone "areas". The touch of a doctor that gives rise to the subsequent corresponding feeling of pain and the perception of this touch as very unpleasant, eventually – in the outer layer L+N+1 - becomes a cultural tool by the hypergeneralized feeling. By internalizing ⇒ perceiving ⇒ processing ⇒ externalizing psychological processes, they become sign regulated as to reach the hypergeneralized signfield.

Overcoming borders is the basis for communication

The infant as a collective patient is interesting in many aspects as to understand the hypergeneralized signfield of inter-layer negotiation through the semiotic skin via the embodiment of relations.

The preverbal communication between mother and child – such as the activity of feeding the child and playing with the child - has been described as e.g. "vocal congruence" or "rhythms of dialogue" (Beebe et al., 1988), and shows mutuality in this interaction. There are different approaches towards these findings which either focus on affective and attentional interactions (Als, Tronick and Brazelton, 1980) or gaze and vocal interaction (Kaye and Fogel, 1980), which is interesting since neither of them can be extracted from each other and thus does the theory of semiotic skin produce a theoretical foundation from where both aspects can be understood as connected. As Rommetveit (1983) describes, the child learning to communicate AND speak is relating and relying on the mother/caretaker as to understand his/her own words AND reactions, which are all produced and negotiated through the semiotic skin as embodied in relation with another individual and the surroundings. This

capacity to use vocal sounds as a means of communication seems to emerge from two mutual sources. The infant's vocal expressions of both emotional and behavioural aspects and the parents' bodily and vocal responses to the infant's behaviour. A successful communication between parent and child therefore relies on the ability to complement each other in perceptual dispositions and thus decipher the ongoing information between the two parts.

Papousek, Papousek and Symmes (1991) focuses on the parent's complementary perceptual predisposition to decipher the child's behaviour via vocal sounds and thereby respond adequately as to create a successful communication. I do not disagree with this focus – it only lacks the child's ability to percept and react adequately as well. The aim in the study is the vocal interactions and thus lacks the rest of the bodily factors in a mutual interaction which establishes between both parent and child. As for the parent to decipher the child's behaviour and vocal outbursts, not only the auditory and visual components of interaction are active. The entire body is active as to percept and negotiate the interaction in order to make meaning of the relation as well as to establish the identification of oneself and the other self in a collective and mutual establishment of the partnership.

Borders of individuality

As seen, the borders of individuality are extremely difficult to fully integrate as an abstract, rigid border-zone. This becomes very visible and comprehensible when the case is a very little child with no language and he/she is being examined by a paediatrician. The *Theory of Semiotic Skin* (TSS) – which is an integration of both the biological skin with the semiotic skin as a whole, dynamic entity – shows these multiple dynamics in an individual's personal interpretations and perceived acknowledgements. These interpretations are thus negotiated THROUGH the semiotic skin layers and eventually holds and creates communicative meaning. This meaning making through the semiotic skin with the clear connection to the biological skin - and thus the intertwined embodiment between inside and outside of the individual – gives rise to understand this process as a holder, retainer and creator of identity.

Hereby - as Brinkman (2009) explains – the identity is not only an aspect of one self and one's singular, unconnected reflections. It is held, maintained and created via the persons around us and the environment that affects us. The environment is not only the very near, visible or touchable surroundings of the human body, but indeed also the technology and reflections affecting us from very far.

Borders in role differences

Data of this research is collected via corporation with medical specialists, nurses and psychological clinicians in the Danish healthcare system. As to further develop and integrate a new theory and practical education of healthcare personnel, this theoretical development is crucial as to process meaning making of all participants.

So - how do these descriptions of psychological theory, philosophy, quantum mechanics, physical chemistry and medical treatment (with descriptions of full penetrations), relate to communicative role differences in asymmetrical relations? It is not as far reached as it seems – since communication of any kind needs a connection. This connection is very nicely presented via the connection between the biological skin and the semiotic skin as to relate at BOTH an individual, as well as in the collective aspects with others.

A doctor-patient relation seems obviously asymmetrical – at a first glance – with a superior doctor and an inferior patient. Though – it is not that simple. The doctor is superior in the connections of diagnosing and treatment of the human body and - in psychiatric circumstances – the psyche. But when it comes to superiority in knowing and understanding one's body as a whole; only the patient holds this advantage (Nedergaard and Jensen, 2018). Communication between a doctor and a patient then must be understood as a collective corporation with two collective individuals, finding their mutual way through semiotic skin as well as biological skin as to make meaning of each other's approaches. The border-zones between these two collective communicators thus holds the notions of individuality. This individuality must be represented via the ability to decipher the negotiated aspects of the multiple layers of communication through the semiotic skin and the bodily reactions.

Conclusion

These interlayered processes of communication and flux of interpretation through the semiotic skin – connected to the biological skin and its responses – shows an interlayer regulation of the semiotic skin. By this regulation, humans make meaning via personal designed and socio-cultural guided functions, by hierarchically organized and differentiated signs. Hereby the foundation of generalizing beyond the original situation emerges.

The semiotic skin is semi-permeable, it registers and controls the hierarchy of signs in order to make meaning. This meaning is crucial in understanding not only one self but indeed the multi-layered communication between more than two. This multiplicity shows when the body becomes the arena of relationships between individuals and

collectivistic dimensions – and thus does the theory of the semiotic skin gives the opportunity to create communicative meaning and identity.

To advance (theoretically) in defining the body as arena for the emergence of both individual and collective dimensions of psychological life, TSS provides a step on the way. TSS looks at skin as a uniting and separating device and constantly reflects the work of a self-reflecting system in an unending spiral of semiosis, in which a semi-permeability holds and regulates all aspects of communication. This communication leads to the notions of a hierarchical build-up of sign regulated processes in meaning making and identity.

There is a need for theories of borders, SST, philosophy, biosemiotics, quantum mechanics and the like to create a chance of grasping the dynamics of communication in healthcare systems. The role differences in these environments are far too complex and multifaceted to be understood from a single and simplified theoretical angle. It is thus crucial to be willing to connect the above mentioned disciplines as to create new theory to overcome the borders in the sense of understanding human communication as a whole.

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8.2. EPILOGUE

Borders of individuality represents the collective individuals in a semiotic negotiation. In this negotiation the hierarchical aspects of power - which every person tries to control, since humans strive for the ability to control lives and any development or actions herein - is described in the reference to Alice in Wonderland.

Parents' and child's mutual non-verbal actions toward deciphering meanings and respond adequately in creating successful communication is also very elegantly represented in the description of the work of musicians in their approach to create good music in collaboration with each other and conductor. These two directions of theory in two very different disciplines thus can be connected as to create new theory of healthcare communication.

This article also manages to decipher how biological skin and semiotic skin is connected, as to explain how these become the components of creating an intertwined communicative platform between humans. This platform creates the foundation from where an individual's collective negotiations of meaning making and identity grows and is maintained.

CHAPTER 9. METHODOLOGY

Working in the area of a cultural psychological sphere of theoretical relating - with and to human beings as individuals - calls for a methodological approach that cannot be built upon statistics and exactness. At least not the type of exactness we see in the constant of e.g. gravity acceleration. There IS a constant though, when we observe, acknowledge and analyse human thoughts and behaviour – that is, they are always different and individual. Every human being is different from every other human being and thus are thoughts, identities and behaviours different. Situations, settings and environments are as well different from case to case.

Working in the cross-field between medicine, music and psychology has shown to be both very difficult and in other aspects very easy. The difficulties have shown in the work of communicative courses with doctors, who are classically schooled and educated in the area of natural sciences and thus expect answers to be either true or false. The answers in the courses in communication between doctor and patient were though not in any way exact or built upon a "one-fits-all" course. Instead the doctors were confronted with themselves as the tools of individual exactness. It showed to be very difficult for the doctors – in the beginning of the course – to relate to a system and a method in which there were no exacts or models to follow as to gain the right outcome. Instead they learned to engage themselves and to manage the uncertainty and difficulties in this specific area of their professional lives, which will be explained in the next chapter.

Using the term "easy" as an explanation of corporation between nurses and doctors on the one side and a cultural psychologist on the other side, might be a bit of a misrepresentation. Working with research in a cross-disciplinary area and with different educational positions are never easy. Although it was not easy, it was definitely not always difficult either. Being a psychologist with cultural focus and a theoretical foundation that resonated with the everyday work of a nurse and a doctor became a crucial connection between me and the individual participants that developed a tremendously large personal security and thus provided the same amount of information.

Conducting and performing classical music is in terms of bodily communication very much similar with communication in the healthcare system. Not only are the power relations represented - but indeed the bodily experience and interpretation of an asymmetrical communication is as well represented. Working with and being inspired by classical trained conductors and musicians were neither easy, nor difficult either. The hardship of working 100% nonverbal became ever so much easier, when understanding the ability of the body as a tool of communication in the everyday lives of these professionals. Then being replicated into understanding the essence of the

work of a doctor, nurse and definitely also a cultural psychologist became meaning making beyond expectations.

Being a patient with a scar from a very traumatic incident showed to give a very crucial connection of aspects of a new theoretical framing. From here, a new practical approach of communicative education in - especially the healthcare system of Denmark – became visible. Eventually this theoretical approach will be generalizable into all kinds of asymmetrical communicative professional situations.

A study of nurses, doctors, patients, a healthcare system, conductors, classical musicians and a new theoretical approach of understanding interactions between all of these parts, gives rise to a methodological approach that can contain and interpret all aspects with equal amount of specificity. As to accomplish this, it showed beneficial to build the data collection via an overall qualitative angle. Observations, interviews, written answers of personal reflections and videos became the chosen approaches as to analyse and interpret the material as further described.

These overall three focus points – interview, observation and filming - of this research comprise into very specific categorizations in qualitative studies, with each their theoretical positions, ways of collecting data and interpretations. Historically they also have each their specific foundation in the work of qualitative research, which will be further outlined. The written answers from the doctors will be approached as would it have been a transcript or a self-reflecting narrative description.

9.1. ETHICS

Before entering the areas of methodological approaches in this research, the ethics must be addressed. Developing qualitative research designs includes ethical considerations – like any research project does – thus it requests for well-considered reflections before starting. Research in qualitative areas are built on the experienced, discursive, subjective and social constructed world in which the individual human has unique reflections upon (Brinkmann, 2010). In order to perform these kinds of research approaches, it demands for a severe internalization of justice, truthfulness, respect and empathy, which must be perceived as such from the participants as well. A constructed research design in qualitative methodology is though neither subjective, relative or social constructed (Brinkmann, 2010).

The constructed qualitative research design has two different approaches, though they are connected. First of all, there is a micro-ethical element which provides the security for the participant via e.g. informed consent and the ability of the researcher to create a platform of confidentiality between researcher and participant. If these micro-ethical components are not established, the research will never be conducted. Next, the macro-ethical elements are grounded in the issues of the surrounding world, which

means there must be implementations of the greater interest of the world and society in which it is performed (Brinkmann, 2010; Sanjari et al., 2014).

The micro-ethical aspects have been fulfilled and thus the collected material in this research gives a tremendous amount of new information, which creates the foundation of fulfilling the macro-ethical aspects by establishing the opportunity to create new theory for further cultural psychological investigation and for the surrounding world in the sense of creating a new way of understanding communication in the healthcare system in Denmark (and perhaps the world).

9.2. INTERVIEW

Interviews – narrative as in this research material - has an approach focusing on subjective viewpoints (Kvale and Brinkmann, 2009) and is theoretically framed within a *symbolic interactionism* and *phenomenology* (Flick, 2007). The latter shows reflected throughout all analytical aspects of methodological theory in which this data material has been interpreted, but will in its description of theory and approach only be explicated in the following part.

9.2.1. STORYTELLING

When performing a narrative interview one needs to keep focus on the theoretical aspects of a such. The important aspects of this particular sort of interview is how to reveal interrelations between the individuals' self, his or her lived life and the narrative they produce to describe these aspects of existence (Kvale and Brinkmann, 2009). In a cultural psychological frame this emphasises the interviewee's position both inside and outside of the interview situation. Hereby the expression of the psychological and social lived life reveals. In narrative theory, stories told are always created as a reflection of how the lived life is understood and represented in the person him- or herself (McAdams, 1993/2012). The trick in conducting a narrative interview is to reveal the kind of truth the narrative represents, since the narrative is personal and thus an integrated part of the interviewee's identity. This identity is created and maintained in part through themselves, people around them and the social world in which they live as connected and intertwined parts. The aspects of this multi-layered understanding of one's own world and hereby identity reveals via oral presentations as well as cultural moral resources accessible in the social environment they live in and/or are raised in (Crossley, 2000/2002). Ontology of this narrative psychology and theory of analysis is the story itself (Christensen, 2009; Kvale and Brinkmann, 2009), and thus the emphasis of analysis in this thesis will be built on the following described ideas of e.g. Gadamer, Riceour, Polkinghorne and many more, as to create a solid platform from where it is possible to notice *content* and *themes* in the narratives. Even in observations and film these theories will be represented in the analysis.

9.2.2. NARRATIVE ANALYSIS

Narrative theory shows difficult to delimit or specifically define, since it is represented via so different aspects as e.g. psychology, therapy, history, literature, social theory etc. (White, 2006). Each of these directions have each their special terminology and definitions of the theory, and still they are all intertwined and occasionally overlapping (Bruner, 1991). This multiplicity in terms, understanding and interpretation of a theory, makes it an arduous work to choose a specific direction of interpreting and analysing data-material of this thesis. Conceptualizing work in this theoretical framing though, gives the opportunity to work with directions and mixed view-points as to create a solid foundation of meaning-making, that in essence gives an advantage for detailed and solid analyses. In this case the further described psychological and philosophical theories will be the foundation from where the narratives will be interpreted and thus understood as a whole, from where conclusions can emerge.

Narratives are – from a phenomenological aspect – a foundation from where the experienced world for human beings can be understood. A so-called narrative method as mentioned, is difficult to outline as a specific procedure of practice. In this case, instead it is based on psychological research of a storytelling as method (Ricoeur, 1984; Polkinghorne, 1988; Bruner,1991), which gives the opportunity to interpret internalization of a past in the present as to anticipate the future (Valsiner, 2014). Hereby the build-up of a theory of method can be positioned in two directions.

First direction is with a focus on the interaction between human beings - individuals' experiences and perception of realities are described (Gergen, 1994). For one person to make his or her intentions understood, stories become the medium for this action. Meaning-making of life anticipates the individual to create stories/narratives from both experiences and relations, which makes a narrative statement a description of something specific as well as a social act that can be interpreted. The function of a narrative and the following interpretation thus becomes the essence of meaning-making.

Second direction leads as an individual to understand his or her own intentions and consciousness, they have specific expectations of how the world is organized. That gives them a sense of understanding the world and ability to anticipate their direction in life. If then a rupture of life-course appears (Zittoun, 2009) and this anticipation fails, a narrative is created. This new and specific narrative has the purpose of making meaning of the event, as for the individual to be able to cope with the situation and even reconcile with the consequences of the rupture. Eventually the outcome is to end the narrative as/or to find a solution of the event that created the rupture (Bruner, 2002).

In narrative analysis the main aim is to let the subject of investigation speak (or write) freely as to motivate free speak (writing) in a storytelling flow. Hereby a context is created in which it becomes the subject's own insight that does not generate a contextual pre-determined construction of meaning. There are three components in which the narrative analysis is to be build up as to analysation. First of all, stories are constructed and internalized by and in the individuals as to make meaning of their lives. Secondly, these autobiographical stories encompass as much psychological meaning needed to be further reported as narrative accounts. Lastly, these narrative accounts are analysable for (psychological) researchers as to identify themes of content, structural properties, functional attributes and categories within their psychological, cultural and social meaning (McAdams, 2012, p.15).

Working with a narrative analysis - as described - it is firstly conducted in two stages. First of all, there will be either a transcript of an interview or a thorough review of written answers or notes. This phase is the underlying basis to achieve a profound knowledge of the narrative, as to be familiar with the *structures* and *contents* incorporated herein. Consequently, the key figures of the narrative are emphasised as to later detect the connections between these key figures. Secondly, the interpretive phase is initiated in order to connect the key figures and further on assemble these connections with a theoretical framing and content. All of this is necessary to closely interpret the narratives (Murray, 2000), whether it is an interview, an observation (with notes) or a recording. In this research it does not makes sense to create a written transcript, from where the analysis emerges. The reason for this is the profound focus on understanding communication as a holistic representation of human beings' relations and inter-relations, which are claimed here to be severely intertwined and thus cannot be separated in analysis of a spoken language, a body movement, intonation, bodily contact etc. The analysis will be founded in the complex and multifaceted whole of the interactive processes. In the whole and connected material there is a profound emergence of themes[5], which are not entirely acknowledged through a written text, but via a comparison and connection with the spoken, the written and the observed aspects of all data.

As will be noticed, these above mentioned directions – as well as the following theoretical descriptions - will be used intertwined in the interpretation and analysis in this thesis as to generate a solution and eventually a conclusion.

9.2.3. SYMBOLIC INTERACTIONISM

Historically and philosophically, symbolic interactionism has been known as linked to the pragmatism of Peirce, James, Dewey and Mead. Influences from these thinkers in the development of Blumer's descriptions of symbolic interactionism - as will be

[5] Such as e.g. the feeling of being taken seriously and being a professional for a police officer, healthcare personnel and musicians.

foundation of analysis in this research – is seen as dividing into two branches. One as Peirce's social realism in his way of describing pragmatism and one as James' social nominalism[6]. Dewey and Mead on the other hand position themselves with aspects from both Peirce and James. Dewey closer to James' and Mead to Peirce's principles (Lewis, 1976).

Mead as a pragmatist noted that every human being selects any stimuli and constructs responses accordingly. A researcher on the other hand has no direct possibility to observe these subjective processes. Instead the researcher has to make them meaningful via observed behaviour (as a behaviouristic psychologist) (Mead, 1932, pp.162ff; Denzin, 1970). On the one hand, Mead hereby says that if the observed act is not an obviously evident symbol, the researcher has no chance to interpret it as a such. On the other hand, Mead also describes an act as a significant symbol, it can indicate the individuals very perspective at that moment. The meaning of any such kind of symbol or act is therefore given in the performance of it. Mead (1938) thus also means that the problem is not to interpret the meaning of the act or symbol but instead to order them (p.38). This order is the very foundation from where a coherent conception of an actor's social position emerges - and where the process of thinking is the inner conversation between an individual and its generalized other (Mead, 1938, p.152).

Peirce is by many scholars seen as the founder of the pragmatism from where James, Dewey and Mead each developed their contributions to the philosophy (Morris, 1970). In his studies of integrating science and philosophy, he brought reality into the area of human experiencing as an individual human cognitive structure. Peirce rejected, that perceptions could only be determined by external objects and he thus addressed philosophical problems from a scientific view. Hereby he determined reality – completely social - as that information and reasoning, that it would eventually result in – independently from "me and you" (Pierce, 5.311). Pierce's philosophy has been compared to Whitehead's and shows great similarities (Feibleman, 1970)[7]. This links Pierce with Mead, since Mead VERY rarely refers to Pierce but very frequently to Whitehead (Lewis, 1976). For both Pierce and Mead, a physical object is real if it can be sensed in a contact experience and thus the physical object can be noted in law of action and reaction (Mead, 1938; Pierce, 1,24). Despite of this bold statement they both believe that the mind of human beings interprets actualities according to perspective and thus describes it as an object that is present but not in any way reflectively analysed. An analysis can only occur if the objects are there and not disturbed by analysis, but presupposed BY the analysis. Hereby all the observers within a given perspective to anticipate, can experience qualitatively similar contact

[6] This philosophical approach is beyond the scope of this thesis.

[7] A deeper analysis of Pierce's, Mead's and Whitehead's philosophies is beyond the scope of this thesis.

experiences. For Mead and Pierce a social science replaces the individual for the community as it being both the questioner and the object of questioning (Lewis, 1976).

Dewey's transformation from Peirce's ideas shows in his conceptualization of reality as inseparable from inquiry – since nothing is independent of the inquiry's mind and perception. In contrast to Peirce and Mead, Dewey did not introduce anything like the ideas of contact experiences leading to dualism. Instead he developed a subjective and nominative thinking. Dewey believed that an inquiry should build upon a systematic doubt of all earlier ideas or opinions. This idea was inspired directly from Peirce's descriptions of the exact same (Peirce, 5.358). Beliefs cannot be neutralized by an act of will and thus experiences have to be cause to belief as to then change to doubt. An act from one's beliefs will be transformed into hesitance of acting, which leads to his conclusion that thoughts are the tool to manage doubt by building belief instead (Dewey, 1938). Dewey insisted that reality and existence were determined by the inquired activity and thus explained that things have no existence unless they are part of the conditions under which they were experienced (Dewey, 1910, p.260).

Compared to James, Dewey believed that the meaning of ideas (like described above via reality, existence, things) were of a rational organization in a community; while James believed it to be experienced in individual selves. Meaning for Pierce were social AND realistic, while James' were individualistic. Despite this difference, James' philosophy was the greatest inspiration for Dewey, which he and the whole Chicago School supported (Thayer, 1968). Looking into the implementation of science – or the scientist – in this theorization seems peculiar, since it shows difficult to acknowledge the essential differences between universals and particulars. The consequence of this is NOT seeing the scientist as being genuinely concerned with an inquiry, which address the importance of the particularly exceptional aspects of any experimental situation (Reichenbach, 1971).

All together does these four gentlemen influence the philosophical, sociological and psychological environment in the time before and during Blumer developed his ideas of symbolic interactionism, and thus manifested the theoretical background from where he was inspired.

Symbolic interactionism in its earliest form was described by Mead (1883-1931), although he never himself introduced the term (Manis and Meltzer, 1972). Instead his student Blumer (1900-1987) introduced it in his lectures at the University of Chicago and later writings. Further it became the well-known term of today. (Blumer, 1969; Gerhardt, 2000). Blumer (1969) conceptualized symbolic interactionism within three main aspects. First of all, he emphasized that human beings act towards other humans as well as things in the exact kind of meaning they have for them. This is particularly important as the consciousness of an actor is interpreting the very actions – and thus it is important to emphasize the meaning of an object to one individual, will be different from another individuals meaning and interpretation. He hereby claims that

human actions shall not be reduced to social rules or norms, since the danger of this would allow subjective meanings of human actions to be directed by the rules and norms of society. Secondly he states that the meaning of things, objects and situations arises from interactions between human beings. By this he explains that this constructed meaning is a social product and thus not by default inherited in things, objects and situations. Blumer (1969) lastly points that meanings of all kinds are perceived and modified via an interpretive process, in which a person deals with encountering. Meanings for the individual are therefore seen as interpretive actions, in which objects and situations are given a certain meaning, which is being acted towards accordingly – based on earlier meanings – and further revised as to guide future actions. During this process of meaning-making, the individual will generate an internal conversation in which the meaning will be determined as to encounter something from the ordinary.

The importance of thinking is perceived through the individuals´ view on different objects. Objects, for Blumer, were classified into three different types. Physical, social and abstract. The physical ones are things as chairs, art and books. Social objects are people in ones´ life, such as friend, mother or teacher. The abstract objects hold notions of mental conceptions such as ideas, feelings and moral principles. In summary, Blumer's (1969) principles of symbolic interactionism can be described as humans' capability of thinking as shaped by social interaction, and thus are meaning-making of objects, situations and symbols demonstrating the capacity of thinking. Meanings and symbols are the basis for action and interaction between human beings and the modification of these meanings and symbols occur via interpretation.

A unique human process – for Blumer – is the complex interaction between meaning-making, actions and objects, while these demands for reactions based on symbolic interpretation / interpretation of symbols; rather than reactions based on environmental stimuli. Social life is a negotiable process and to be able to understand one another, humans have to directly and indirectly engage in symbolic interaction as to make meaning of the situation as well as the future to come (Blumer, 1969; Gerhardt, 2000). Blumer (1969) criticised social science of his own time for creating false conclusions about humans by reducing their decisions and actions to a social press such as social (power) positions and roles. Instead he him-self was founded in theorizing in psychological interaction, where he states that the meanings of the symbols are not universal. Instead they are indeed subjective and related to symbols and the receiver, accordingly to the humans' interpretation of them.

This way of interpreting symbols, actions and objects from an individual and subjective perspective, is described in the phenomenological and hermeneutic way of theorizing human analysis of others and the environment around them.

9.2.4. PHENOMENOLOGY

The perhaps most important aspect of experiencing phenomena for humans, is to make meaning of them as exact as possible – in the exact contexts as outplayed. This is indeed not easy or even possible and therefore we need a way of describing this process of meaning-making as closely related to the individual as possible. Phenomenological theory approaches this task with a narrative focus that puts the lived world into account as to understand these experiences as they appear (Giorgi and Giorgi, 2003). In the development of phenomenological theory, psychological issues became possible to interpret. In this theoretical process, it worked its way through Husserl's (1982) epistemological project - till Gadamer's hermeneutics (Moran and Mooney, 2002).

Phenomenology is a matter of defining the human life-world and thus not objectivizing human nature. According Husserl's ideas, human experiencing cannot be extracted from world experiences and thus any experienced phenomenon is conceptualized via the conditions in the outside world, in which they appear in the individual itself. The subject hereby becomes the central part – not the world – hence the world becomes immediate experienced in the subject's conscious (Zahavi, 2003).

Husserl's (1982) mission with his epistemological project was to develop a phenomenological theory that had the ability to direct science and philosophy into a school of thoughts that he found as the "right" one, and which would be built from the idea of impossibility to separate the object (an experienced phenomena) from the subject (the individual experiencing it). Experiencing for Husserl was always conscious and thus always directed towards something specific and thereby it had to be intentional. This *intentionality* showed that it would be impossible to feel (in general) without thinking or feeling anything. The idea was that at any moment an individual is conscious about something, it will be directed towards something in the subject's outside world. Interpreting the concept of *epoché* in phenomenological theory means rejection of sciences assumptions of e.g. existence of the physical world and then only study human pure consciousness (Spiegelberg, 1978). As a *phenomenological reduction* this shows that everything in the experienced world have equal values and thus lack any prioritizing in understanding. In different stages of this reduction it then should be possible to fundamentalize the understanding of phenomena (Langdridge, 2007).

The theory of phenomenology is not only developed from understanding the conscious reflections of phenomena and the surrounding world. Being - as a subject - in a wider understanding of one's *life-world* is also related to bodily, culturally and socially investigations (Merleau-Ponty, 1964). This understanding of life-world is a never static and thus eternally changing world and likewise interpretation and examining of it. In the essence of interpreting data from this research there had to be a distinction between understanding phenomena by detailed descriptions

(translations) or interpretations of all the different data. No matter how detailed descriptions there are, there will be an interpretation and thus the interpretation occur on all levels of managing the data (Heidegger, 1962; Ricoeur 1970; Gadamer, 2004).

Heidegger's (1962) existential understanding of *being* in a phenomenological framing described that it will require being of something. Being in the world thus presuppose being of one's own; which is a circular process in any investigation of *Dasein*[8]. The basic structures under which individuals understand their own essence are disguised by the individual itself and it thus becomes necessary to overcome these hindrances as to understand one's own being. Relating to the (detailed) descriptions - that always include an interpretation - the *hermeneutic phenomenology* relies on the possibility to generate new understandings of phenomena via these. The interpretation of phenomena does then not change the phenomena – instead it becomes what it is in itself and thus the interpretation reveals what it is AS (Stolorow, 2006). Understanding the ontological aspects of experiences, being in the world then become situated in time and space. This spatio-temporality shows when humans are situated in a world – pre-existing – with humans, objects, signs, language and culture, all founded in the individuals' existence. For the individual this factual being is based on how things are done and practiced in the world (Dreyfus, 1991). How a person experiences the existence in the world is thus making meaning temporally, situated and contextualised in past, presence and future. This is meaningful since any experience is understood situated and contextually shared with others that creates a history – and through this a narrative – which cannot be extracted or withdrawn from anyone. This world of contextual and situated positions represents unconscious pre-conceptions of it, which humans cannot explain and thus the phenomena do not show exact or even transparent for the individual. Phenomena then becomes known by not representing what they really are – from which point they have to be interpreted in order to make meaning of them for the individual (Smith, Flowers and Larkin, 2009).

Heidegger (1962) anticipated a narrative approach for understanding any phenomena, which was inspired by Ricoeur (1980) - which emphasises the choice of a narrative interview and methodological technique in this thesis; even though language and narrative interpretation is nearly not enough for understanding these kinds of complex phenomena in human communication. Interpretation of any narrative/oral, bodily, cultural and social phenomena needs a wide understanding of this specific concept.

9.2.5. HERMENEUTIC

Understanding mental psychological processes in a meaningful way as to improve and enhance human's insight of one's self is the psychological core of the concept of

[8] Dasein: How humans characterize, understand and appear for them-selves. Not WHAT they are.

hermeneutic.

The hermeneutic way of phenomenological theorization and interpretation also have a philosophical description, which clarifies the role of humans' understanding of the world and how this understanding dictates their actions in it. Hereby the philosophical branch of hermeneutic describes the understanding of something AS something. *Intentionality.* As for this intentionality to be understood, rules were created as to interpret any phenomena. The better the rules were developed and incorporated in the interpretation, the more truthful the interpretation became (Højbjerg, 2004). Interpretation - and understanding this interpretation - as to make meaning for the human beings are basic conditions to exist. This way of understanding the foundation of existence then rules out any exact or true method. Instead there must be a conditional relation in human processes of cognition, existence and experience as described by *the hermeneutic spiral*, which is infinite and gives a way of structuring the world. Then it makes meaning and the world is understandable.

Understanding any interpretation demands the right language as a tool, as to create a basis for any phenomena to present itself. The mutual language needed to understand these phenomena is dialogical and gives the opportunity to understand through *fusion of horizons*, which is both collective and individual. It is created by experiences, body, language, culture, context, history and time (Gadamer, 2004). All these aspects cannot be separated from each other and the individual in the process of interpretation of a phenomenon. Any understanding of this process will be specifically and individually contextualized in which it becomes impossible to exactly understand a phenomenon, since all the above mentioned aspects are different in every person at every time. *Being-in-the-world* from Gadamer's (2004) hermeneutic phenomenological aspect is a subject. From this point of view, REALITY is then embedded in its display in the world, thus the individuals are paramount essential and unhidden behind anything else. In essence, this phenomenology depends on the subject's (individual's) ability to realize and hereby display reality in context of experience in a system of opinions and validity as it is for itself. This makes the phenomenology an analysis of the subjects' experiences as they are shown in their consciousness (Zahavi, 2003).

In this set of lights, intentionality describes phenomena/objects as appearances OF something – FOR something, which has to grow from first person perspectives as to analyse any understanding of experiences, making meaning thereof, and cognition. Further investigation of phenomena thus requires a starting point on how it (the phenomenon) appears for the individual/subject him- or herself (Zahavi, 2003). Subject and world are intertwined as for being-in-the-world since the world is not experienced as something separated and in front of humans. Hereby phenomenology becomes the foundation from where the search for understanding, making meaning of the world and being in it, appears individually in the humans' consciousness (Gadamer, 2004).

9.2.6. EXISTENTIAL EXPERIENCES

Ricoeur (1980/1981/1984) did not put himself in line with the idea of describing human existence from a fundamental aspect. Instead he directed his work towards hermeneutic interpretations of existential experiences described in the medias, which he acknowledged as narratives with symbols and metaphors. As Gadamer, he focused on the existentialistic aspects of being-in-the-world. His point of focus was though texts, from where he reflectively and indirectly interpreted differentiated existences of human beings through symbols. Hermeneutic phenomenology from this point developed.

Recognizing meaning of a text has to emerge from acknowledging phenomenological issues, which then have to be interpreted hermeneutically. This process has to involve symbols and metaphors as to understand the underlying – and often hidden – meanings of not only the text but the human existence and experience incorporated in it. In order to make meaning intrinsic to humanity – metaphors, symbols and narratives have to be analysed and thus understood. This means that any attempt to interpret the meanings of a text, it has to be approached from the value of the obvious writings with a phenomenological aspect, and from which it will be interpreted from a hermeneutical aspect. This specific process involves acknowledgement and interpretation of symbols as to detect hidden meanings as well as specific uses of words (Ricoeur, 1981). In this kind of a process of understanding narratives, a fundamental linkage between actions and events for human beings as to create a whole was introduced by Polkinghorne (1988). These wholes become relatable when narratives are constructed as meaning-making of experiences by organizing heterogeneous elements. Narratives thus places the individuals into being-in-the-world in situated experiences in a specific time. Identities are thus created via the individually and personal constructed narratives. From this aspect the phenomenologically narrative analytic method emerges (Langdridge, 2007).

9.3. OBSERVATIONS

Observing participants of a research in a qualitative study is historically positioned in a theoretical framing of ethnomethodology and constructionism. This qualitative approach is mainly focused on the everyday life and in this aspect – the making of social reality (Flick, 2007). Therefore, it makes sense to approach processes revealed in this research material from this specific theoretical frame.

9.3.1. ETHNOMETHODOLOGY

Ethnomethodology has its roots in the sociological theoretical studies and emphasises the way humans create order in everyday life. This creation of order is processed via analyses of the interplay between humans, their everyday routines and the following reflectivity from which they make meaning of, and explain their behaviour and

sayings (*conversation analysis*). Garfinkel (1967) criticised the traditional and very structural sociologies for emphasising the societal structures as the main basis of humans' actions. Hereby the humans as individuals were pictured as unreflective and thus in no position of understanding perspectives of their own actions. In his line of work – on the other hand - the phenomenological approach was very visible, hence he described individuals as practical oriented, negotiating and improvising. In the light of this approach, he positions the individuals as able to act reflectively according microstructures in society. Phenomenology mostly describes individual consciousness, whereas ethnomethodology has its focus on observing and describing everyday routines, actions and the mutual knowledge amongst a group of individuals. These individuals follow very specific procedures in everyday life as universal aspects – *ethno-methods* - of living and making meaning in this everyday life. Hereby it becomes possible for humans to reflect, be observant and create insight as to be able to anticipate others' reactions of what the individual says and does. This should create a fundamental social order (Garfinkel, 1967; Liberman, 2013).

The world is a chaotic place, where humans use different methods to understand this chaos and create control and stability, as to produce and re-produce ones' own reality. Ethnomethodology focuses on everyday life from a micro perspective without a pre-positioned hypothesis or assumption. Ethnomethodology builds upon discourses, which are usually dialogues where the parties mutually reciprocally orient themselves towards each other. In this sense, meaning making is a mutual, conscious, cultural act – even though (unfortunately) we still have the habit of ascribing consciousness as an individual phenomenon and the cultural and social as an additional character (Halliday, 1992)[9]. In this dialogical process, the words do not hold their meaning unambiguously. Instead they are a discursive whole, made to carry the sense of them as to help the discussants to communicate meaning. Hereby the meaning must have something to do with the words, but is not found directly IN the words solely (Liberman, 2013). Sentences are created by words, but the words are not merely parts of these sentences. This means, sentences cannot be reduced to the sum of the parts (words) in them, since the meaning of the whole therein is an interplay of the components (Benveniste, 1971). The essential aspect of sentences as wholes is the vital work both speakers and listeners do with the *syntagmatic* elements as to create opportunities of sense-making, which are always in flow as a flux. This particular flux is attempted to be tamed by the participants, while relying on the outcome they can create (Liberman, 2013).

Language is a relative, *diacritical* and oppositional system of signs - which is never static – and leads us to investigate the meaning-making for the individuals understanding of the sentences, and thus the study of understanding itself in creating order (Merleau-Ponty, 1962). These signs and orders elaborated are sense-making for

[9] The Theory of Semiotic Skin has the ability to integrate all these aspect as intertwined in the process of sense making as well as creating identity.

people, as they use rules reflectively in sensible processes to create a context that is understandable in itself (Garfinkel, 1967; Liberman, 2013). Signs in the language system utilise co-emergence of interdependent, important potentials, as to naturally objectify significant routines. These routines are used by the speaker and the listener to stabilize their shared meanings, thus these routine communicational practices becomes habits incorporated in the language system (Hanks, 1966; Liberman, 2013).

Every day conversation holds routines that shows, relations and semiotic connections between words are ever so flexible. If – as done in this analysis – the emphasis is not solidly put on EITHER words OR behaviour but instead on the interconnections and interrelations between the multiple facets of communication; the meaning making becomes indistinct. This is necessary as to let the speaker and listener keep their openness towards any (new) vital and unanticipated meaning. Thus becomes the ambiguous distinctiveness of the meaning of the words - as a whole - both creative and constructive (Greimas, 1990). Humans thus, in a both isolated and simultaneous way defines order together, in cohesion, construction, maintaining, transforming, validating, questioning and defining manner (Garfinkel, 1952, p. 114). Ambiguity is thus the permanent obverse of multi-meanings in a multi-faceted language (Ricoeur, 1974). The interesting part of this theorization is that meanings do not emerge by negotiation of perceptions when communication is performed – instead meanings evolve when the speaker and listener reflectively use semiotic resources present at the time of communication (Liberman, 2013, p.145).

In everyday communication, the speaker and listener only knows what is being said when words and all the semiotic signals are displayed and experienced. This statement makes it clear that the listener bears as much responsibility in the meaning making of a communication as the speaker does. The interpretation of the communication is so to speak a collective and collaborative work and management. Therefore, it is crucial to implement ethnomethods in the interpretation of these collaborative experiences of meaning-making. The extension of this particular method thus has to render the semiotic signals visible, as to take them into account as bodily actions and experiences as well as the words. The words become meaningful when the collaborative interpretation holds notions of words, body, culture, social environment and semiotic interpretations.

In a specific interaction, the participants put an effort into an at-the-moment register as to coordinate the mutual discourse. Hereby they mutually share the emphasis on the attention towards each other’s actions. To achieve this shared orientation towards each other, it insists on a very skilful collaboration. The important thing in this process is the collaboratively produced, public displayed and witnessed presentations that can be shared. These displays thus play a role in instructing the participants in their further actions as to make meaning of any situation in a continuously social context and praxis (Silverstein, 1992).

> *"Meanings are not transmitted and, hence, communicated by Sender to Receiver; rather, they are jointly made or constructed by the ways in which interactants co-deploy the available social-semiological resources on a given social occasion of discourse"* (Thibault, 1997, p. 131).

Meaning-making in any communicative situation thus always extends further than a sign explicitly means, even though a meaning may be implicitly present. This implicitly present meaning is thus already familiar when it may be explicitly articulated. In other situations, the meaning-making might be unexpectedly revealed – even for the speaker – and may be collected and reflected later on as to be put into order or re-organized (Liberman, 2013).

Any interaction - between humans - bears the notions of thoughts, expressions and meanings. These three components are mutually interrelated.

Thought ←→ Expression ←→ Meaning

(Figure 9-1, Liberman, 2013, p. 150)

All humans' reflexive understanding of any interaction thus represents a hermeneutic circle (or spiral - since one never gets back to the same basis from where one started). This means that no subject is supreme in controlling any parts of the process and they are all subjects to the unstable semiotic system. This unstable semiotic system though contains all the possibilities that gives rise to any communicated idea and in that sense it facilitates a social expression for communicating meaning (Liberman, 2013).

9.3.2. CONVERSATION ANALYSIS

Conversation analysis (CA) is an interdisciplinary, empirical approach to study fundamental human communication – investigating those processes that make this interaction possible and how meaning emerges from this. CA explicates how humans conduct and perceive actions when interacting, as performed in very different kinds of oral performances as well as other conducts in innumerable multiple social settings. CA research has also shown applicable in many other areas than just language, and has thus been implemented as a methodology in diverse communication areas as interpersonal, mass, family and health (Bolden, 2017). The first and latter, as main focusses in this thesis. CA as a sociological approach has developed from the 60's – as method and theory – into linguistics, anthropology and psychology, as to deal with and analyse everyday social events as they really occur. To reach this goal, the emphasis is put on not only interview, questionnaires and documents, but also in particular recordings and film. It is strongly influenced by Garfinkel's ethnomethodology, with its emphasis on the methods humans use to overcome their everyday lives and activities (Greiffenhagen, 2011). From this ethnomethodological

angle, CA also emphasizes that the social world is both described and interpreted by its humans even before researchers enters the “scene of interpretation”. With this aspect in mind, the crucial part of analysing communication and interpretation of this in a social world, is how humans THEMSELVES discover and perceives their own world in a practical and everyday manner, when performing the society’s cultural everyday affairs.

A way of accessing this data - and following interpretation of ethnomethodological - seen-but-unnoticed and taken-for-granted - everyday interactions, is recordings and films of these events. Hereby the events are captured in real time and can thus be repeatedly reviewed and listened to (Sacks, 1992). Usually there will be produced a very detailed transcript of the data material as to investigate thoroughly. This has not been done in working with the material of this thesis, since the data is very diverse and thus invite for a visual and auditory approach with an emphasis on continual and multiple repeated work through of the data. Along with this there has been made multiple and thorough notes for important and ground-breaking events in the multiple interactions. Hereby it has been possible to highlight e.g. prolonged sounds, syllables, gestures, overlap of speaking, gazes, physical contact etc. as to reach a solid and well-reflected point of interpretation and analysis of the events. The reason for this approach is to comply with the multifaceted research design, which almost only consists of elements in which I (the researcher) is an active part of. Hereby I become both a speaker and listener at the same time and thus I also become an embodied analytical factor in the process of interpreting. As will be described in the work of a conductor and a musician; this kind of embodiment has to be accounted for without a written transcript, since the analysis lies within the inter-layered negotiation of the semiotic skin. This specific focus on DETAILED transcripts has been modified, since it is impossible to transcribe nonverbal conducting and playing. Instead the focus has been on thorough listening and visual evaluation of the different kinds of material. Body-language analysis is not enough – so conductor and musician have described their experiences afterwards – meaning that body, language AND their own interpretations have to be a part of the analysis as to be able to reach a collective point of understanding.

Originally CA was developed to focus on oral conversations, but has later on emerged into two directions. First of all, there is an emphasis on the character of institutional conversations as e.g. doctors’ delivery of good or bad news to patients, legal interrogations etc. (Heritage, 2005). Secondly there has been an extension of this approach in order to be able to analyse non-verbal interactions between people such as e.g. conductors working with an orchestra, timing of gestures related to both verbal and non-verbal expressions (Hindmarsh and Heath, 2007).

The praxis of CA is built on four ideas of human interaction. First of all, social interaction is viewed as organized in a certain way as to advance the progress of interaction to arrange future actions, as e.g. receiving medical treatment, ask for help

etc. This approach does not focus on sharing information, thoughts or feelings. Secondly, interaction is organized in a certain order, hence every interactive contribution is impressionable to (just happened) events and understood in the present chronological context. Researchers working with the CA as their foundation of interpretation thus examines both single actions as well as especially the sequence of actions. Thirdly, mutual understandings between the contributors in an interaction are negotiated in the sequential process and is thus adjusted if inaccurately understood. This i*nter-subjectivity* shows the speaker's understanding of prior events of the interaction, and if misinterpreted it will be corrected or at least adjusted by the listener. Lastly, there is an emphasis on order at all details in the different levels of communication. This order contributes the participants to make sense of each-others conducts. A so far unnoticed part of the CA is the relevance of silence (Bolden, 2017). Silence in particular has as central a part of the analyses as do language and bodily behaviour, which is extremely relevant for psychologists, doctors, nurses, conductors and musicians as to make meaning of and for themselves.

Data analysis in CA is described as an inductive approach to interpretation, where the main elements are recordings, film and transcripts. The analytical process is typically based on a single case analysis, which lets the researcher start with a single fragment of the material. Further on, these fragments accumulate in the process of analysis and thus represents a collection of instances of an interactional phenomenon. This phenomenon is the basis of acknowledging continual practices in the interaction. An example could be an observation of a single case with a doctor's silence with a patient, which the patient has a negative response towards. This particular response will then be acknowledged and verified via comparable cases of single observations. The interesting aspect of this peculiar way of handling data is a mix of qualitative and quantitative orientations. The single case approach is a solidly qualitative part, while the multiple comparisons of other single cases as to reach generalizability of phenomena has the implements from a quantitative approach (Bolden, 2017). A twist of this focus on both qualitative and quantitative approach has been implemented in this data analysis, via the abductive approach of analysis (Nedergaard and Jensen, 2018). CA handle the analysis of interactions by emphasising basic, returning actions. This analysis is built-up by six sections (Bolden, 2017):

1. All communication of any kind is expressed and experienced as a turn exchange, which is not relying on explicitly acknowledged rules. There is no description for one's time to speak or be silent – instead there is a constant negotiation of turn-taking.
2. When speaking, it is done to do or express something. E.g. to get in contact with others, tell a story or as questions. In CA the turn-taking actions are being analysed as to discover how they are recognized and internalised between communicative participants.
3. Actions in communication are sequenced, which leads to the expectation of a certain response from the other part. When either agreeing or disagreeing

with the other part, the response will be coordinated within this frame as to react accordingly[10].

4. When misunderstood, misheard or misspoken becomes a reality in human communication, the reaction is to repair the communicative organization.
5. When speaking, the words are being (carefully) selected. CA analyses these choices of words in order to survey the underlying principles under which they are taken. Why is one word chosen instead of another and what does it means in the interaction?
6. CA analyses overall structural organizations such as visiting a doctor and how this occasion is organised in the communicative encounter.

CA has been used in the healthcare communication in analysing medical consultations between doctors and patients as well as the communication between healthcare personnel. Doctors delivering a good or bad information to patients have been assessed in healthcare contexts as well as the interaction between patients and their relatives (Maynard, 2003; Maynard, Cortez and Campbell, 2016). Via CA and ethnomethodology, it was reported that bad news from the doctor was fundamental of the sense making every individual makes in the world they live in. Further, this means that any news – good or bad – are connected to the structure and acknowledgement every human being have of the profane world and life in this.

9.4. VIDEO RECORDING

Filming or recording participants in a qualitative research study can be built upon the same theoretical framing as observations. Mostly the analysis of these data collections will be conducted with an emphasis on a hermeneutic foundation as for the interviews. In other situations, it makes sense to analyse from the same methods of interpretation as for the observations – namely conversation analysis and discourse analysis (Flick, 2007). A special feature of filming in particular as well as the observations have an incorporated factor of bodily expression. These moments of insight in communicating with one's body and not using any oral expression rises the dilemma of interpreting with enough details. Therefore, it has been necessary to develop a new mix of methods as to reach an overall methodology in analysing these extremely complex phenomena.

This means that the filmed, recorded and observed material in this thesis is analysed with a mix of above mentioned approaches as to gain enough knowledge of the background of actions, gestures and thoughts in order to make meaning. This meaning thus helps to eventually give an estimation of the quality of the communicative theorization as well as to develop – not only new theory – but also a new practical approach of teaching communication in the Danish Healthcare system.

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[10] Sequence and preference organization.

These three perspectives of investigation – interview, observation and filming/recording – have all different approaches in both research focus and employed methods. These differences are though juxtaposed and cannot easily be separated, since the angle of interpretations of the data material from specific theoretical aims are overlapping and thus not solidly separated. The first – interviews – emphasises the subject's viewpoint, while the second – observations – describes the processes of production of existing – e.g. social, institutional or everyday situations, as well as environments, cultures and social orders (using ethnomethodological analysis). The third perspective – filming/recording – aims to a (mostly) hermeneutic reconstruction of generating actions and meanings (Lüders and Reichertz, 1986; Flick, 2007).

Videos in research designs have been used in numerous areas in qualitative approaches (Jewitt, 2012). Despite of this broad recognition of the media as a research tool, it has not reached the full acceptance as a theoretically and methodologically acknowledged media yet (Kissmann, 2009). Therefore, it is necessary to learn how to use video recording in a reliable analytical way.

First of all, it is necessary to choose the right way of using the video. There are several approaches of this area, which includes (Jewitt, 2012):

- Participatory video.
- Videography.
- The use of existing videos.
- Video elicitation.
- Video-based fieldwork.

With the ethical aspects of the research design in mind, the truth of video-data, objectivity/subjectivity and the positions (roles, power, asymmetries etc.) of researcher and participants, this must be acknowledged before any performance. Therefore, the choice of focus in this research is the video elicitation that can be used in combination with interviews and observations of any focus group (Roth, 2009). Reflections of video material can be divided into three different aspects: 1) reconstructing past thinking, 2) post-activity narratives and 3) construction of reflections on present and future actions (Tochon, 2009). All three of these aspects are represented in the material from video recording the oncological doctors. Video elicitation also gives the opportunity to display invisible phenomena in contexts of everyday routines and reflect the practice and professional development (Schubert, 2006; Jewitt, 2012).

Video recording gives a registration of a specific time with a specific event with its detailed gazes, facial expressions, postures, body movements and gestures etc. In this multimodal registration, words and bodily actions are kept in the specific context in real time, which gives the opportunity to examine the data in a stringent process. A limitation of the data collected via video recording is the huge amount and

overwhelming sensory influence, which could lead to a weak analysis, if managed in-properly (Snell, 2011). To overcome this obstacle, it is beneficial to focus the data in an in-depth analysis in combination with written work from the same context, observation notes and interviews alongside a solid theoretical foundation.

Video recordings are especially advantageous when exploring social organizations and interactions with interest in gazes, facial expressions, postures, body movements and gestures etc. between different objects in a multimodal communication. It also shows to be beneficial when the research is in inter-disciplinary areas with a requirement of participatory perspectives (Jewitt, 2012). In this context the video data is coded in a very theoretical process in connection with practices performed and observations of actions embedded in the specific methodology. Coding of the data can be done in many different ways and are relying on the research design as well as the theoretical framing. Some coding is systematic from pre-established coding schemes, others build new codes from their material and others again analyze from description of the case level and thus do not use any coding.

Video data can be used and manipulated in numerous ways as to view repeatedly, in different tempi, in silence etc. and thus gives the opportunity to analyse and code in details. In either to speed up or slowing down the video it becomes possible for the researcher to develop an analytical distance and reflexivity via denaturalizing the material. This enables the researcher to notice details that has not earlier been acknowledged in observations and thus develop new or more detailed understandings of the material (Lemke, 2009).

CHAPTER 10. WHAT IS THE FUSS ABOUT?

The build-up of the following chapter will firstly describe the interview with the police officer, which is the foundation of developing the very first steps into the SST. It will focus on the dynamics of the identification through the memories of the trauma embedded in the scar and how this is negotiated through the semiotic skin layers in connection with the biological healing from the inside of the body and out.

Following this interpretation, the empirical data from the communication courses with the doctors and nurses at AUH will be analysed in a flow with incorporations of the theories of the collective doctor, collective patient and the non-verbal communication in the world of musicians.

As described in the previous chapter in methodology, these approaches will be the very foundation of interpretation of data material. Since the methodological descriptions are explicated severely, they will not always directly be referred to in the following analysis.

All names referred in the following analysis are fabricated as to keep the participants anonymous.

10.1. HUSBAND OR POLICE OFFICER – OR BOTH?

Benjamin is a 39 years old man when interviewed, a police officer, a father and husband – and fully (physically) recovered from being shut in duty in a terror attach. He is also a GOOD police officer, father and husband.

When describing himself as a man, he reflects on his membership in a Facebook group for his team of police officers. They wrote about the attach and mentioned his name in the group and his reaction was anger: *"We have a Facebook group. It's closed, so only our team can see it. My name was written in there – then I could feel that… ehm… I got really pissed.* He mentions that all written material and pictures belong to Facebook, which makes it really stupid to mention someone by name: *"Why are people so stupid?".* His concerns in this particular situation was for his family. If his name got out in the public in any way, they could be attached by sympathisers of the terrorist. His reaction as an individual allows him to get in touch with his feelings connected to the experience and thus he reflects on his response in this situation: *"I was afraid of a mental reaction".*

As a police officer, the reflections on feelings and behaviours are different from the ones as a man. As a police officer he is proud of the role and the professionalism: *"I*

know what is going on – I've been a police officer for ten years". In this identification of being a police officer he also reflects upon his professional attitude: *"I solve my mission"*, which is a reflection on the demands of being a police officer with direct contact to riots and turmoil areas, which he is proud of being able to control.

Not only is Benjamin a police officer – he is also a good police officer. When explaining his work, the day of the shooting, he reflects on his role with a female colleague: *"I am taking good care of my female colleague"*, which positions him as professional and empathetic for a colleague in a less powerful position than his. Later in the interview he describes the hospitalisation after the shooting, where he shares a room with his colleague who was with him during the shooting and also got hit. Benjamin recovered quicker than his colleague but was concerned about him staying at the hospital alone and he therefore asks the nurse/doctor: *Is it possible to stay with him? We came in together – we leave together"*. Being concerned about his colleagues is not the only reflections on the role and identity as a police officer, Benjamin is sharing. He is securing his feelings connected to the professional role and his professional actions and concerns, when the shooting episode was analysed by the police department. He was questioned about his actions and the chronology in the events in order to establish a full description of actual happenings during the shooting: *"I keep my attitude – I'm not changing my opinion… I reacted correctly"*.

As a father and husband, Benjamin is very much aware of his role and responsibility, which made him respond to the feelings during the shooting. He, his colleagues and terrorist could be shut, and if Benjamin himself had to shoot someone – no matter who – he is very clear about his reflections about such a moment: *"Rather him than me. I HAVE to go home to my family"*. When questioned about the time after the shooting and his role as a father and husband, he is worried about his children's life if someone finds out, he is their father and what then might could happen to them: *"The thing I felt the worst about was my children… Then they will be the target for the line of work their father has chosen"*. Also he is aware of his responsibility toward his wife even when he is about to get into the search of a shooting terrorist. When it becomes clear for Benjamin that he will not be able to come home from work the scheduled time, he writes his wife a message, not mentioning the seriousness of the situation, but with concerns for her extra work with transporting the children – which he was supposed to have done: *"I'm writing my wife I can't come home with the car. She has to find a way to get the kids to the station"*.

Being a father and a husband is very important for Benjamin and he sees himself as good and concerned in these positions in family life. He takes good time and energy in comforting his children, so they shall not be worried or afraid when he goes to work, and he tries to demystify the shooting incident: *"I sit down and talk to my children about all this"*. His connection with his wife and his reactions after the shooting makes him share his feelings of concern, and he reflects on his wife's reactions in that situation: *"Yes we have talked about it – and I regret I gave her my*

misgivings… She was unduly worried – she has enough to think about". Her reactions are to get worried and angry with him, since she does not think he takes good enough care of himself. If something happened to him, and he would not be able to come home, he would have let his family down. She says, he was only lucky this time not being killed. His response was: *"This is not luck – I don't operate with luck. My wife said I should NOT say that. This is no way to say it. So now I have withdrawn a bit and I'm not saying it anymore".*

Benjamin holds the roles of both a police officer and a father/husband in his identity and these roles are constantly negotiated during the interview. He keeps touching the place on his body where the scar from the shut is placed. His hand either lies still over the clothing or he calmly strokes it. Both physically and psychologically he is relating to identification through the scar in which his memories of the incident that connects the different roles are embedded. The reflections of these roles - negotiated through his layers of semiotic skin as to connect physically (the scar) and psychologically – are sometimes conflicting and he thus must find a way of overcoming this. He sees himself as a professional and good police officer, but his wife is concerned and does not agree on the focus of his professional approach into life. This professional position is for her what could undermine their life as a family and thus Benjamin's role as a father and husband. As to overcome this discrepancy in his connection of the two roles as a police officer and a father/husband, as to keep seeing himself as a GOOD police officer and father/husband, he changes his behaviour and amount of shared information with his wife. Instead of changing direction or position in his professional life, he stops talking to his wife about his own emotional reflections as not to concern her more than necessary.

These roles of Benjamin are very different and are constantly negotiated through the semiotic skin layers as to eventually reach the hyper generalized feeling of either being a GOOD police officer or father/husband. The hyper generalized feelings are reached through the flux and negotiations but indeed also through his connections with people he feels secure in the different roles with. As for him to be a good father/husband he adjusts his behaviours with his wife, so the feeling of being a good father/husband is connected with the relation with his wife (and children). His feeling as a GOOD police officer is reached via the reflections from his colleagues as well, who he takes care of and protects.

These negotiations of roles, changes of behaviour, reflections of identity and creation of narratives, gives the empirical foundation from where the theoretical development of a new communicative direction can evolve. This SST (Nedergaard, 2016) thus becomes the foundation from where the analysis of the doctors' and nurses' actions and reactions via identity negotiations can occur. Their professional identities are the very foundation from where the asymmetrical communication between healthcare personnel and patients emerge. This asymmetry thus reveals through the multi-layered negotiations and fluxes through the semiotic skin, which then holds the theoretical

point of understanding how doctors/nurses can create a sincere and somewhat symmetrical platform of communication with their patients.

In the approach to the patients, the doctors are in both roles as a doctor and a private person, which sometimes shows to be difficult to combine and connect. The doctor is pragmatic and the private has a more holistic and spiritual attitude. When asked about what death means to them, the doctors are pragmatic in their responses: *"Life is over"; "The person is definitively gone"* (Participant 102), *"That it ends*", *"A chapter has ended"* (participant 103), *"A part of life"* (Participant 105),[11]. The private reflections on the question on the other hand holds notions of rather different characters, while they reflect on their personal feelings: *"Sorrow. Loss", "Something sad"* (Participant 102), *"…you leave the world. Maybe to a better place and unintelligible for people on earth"* (Participant 103), *"Thinking that death can be very lonely and I believe myself that in that situation I would need to believe in something after death"* (Participant 105) [12].

10.2. ALICE AND THE CATERPILLAR

Benjamin is negotiating two roles – as a police officer and as a father/husband – which shows to be conflicting when the shooting puts him in a new situation of understanding himself in these roles. His body has changed in the process of healing and with a scar to represent and remind him of the feelings connected hereto. He negotiates the roles internally when changing his way of communicating with his wife and withhold information and reflections of own feelings as to not worry her more than necessary. Another aspect of this behaviour is for him to be able to keep BOTH roles as a good police officer and a good father/husband intact. Externally his roles are negotiated, when he relates to hyper-generalized feelings of being e.g. at home with his family or being with his colleagues, and feeling it is not legal to shoot a police officer and he thus feels secure.

Alice negotiates her roles internally and externally when changing her physical appearance (big/small) as well as when she tries to connect with the caterpillar. It is confusing and difficult for her to establish a connection with the caterpillar if she

[11] Danish answers:"At livet er slut"; "Definitivt at personen er væk".

"At det blir slutt", "Det betyr slutt på et kapitell".

"En del af livet".

[12] Danish Answers: "Sorg. Afsavn.", "Noget trist".

"…man forlater verden. Måske til et sted som er bedre og uforståelig for mennesker på jord."

"Tænker at døden kan være meget ensom og tror selv at jeg i den situation ville have brug for at tro på noget efter døden."

cannot relate to him and thus it becomes difficult to make meaning of the situation. She asks the caterpillar who HE is instead of explaining who SHE is, since she is not sure about herself (Helle-Valle and Binder, 2009; Nedergaard, 2017).

This way of reflecting others in order to make meaning of one's own role, position or even identity is very common between doctors and patients. Ten out of 12 younger doctors refer to conversations with patients, where they have been asked, what THEY would do if they were in the situation of the patient. The patients hereby ask the doctors as private individuals and not with the focus of a doctor's professionalism. In these situations, it is difficult for the doctors to respond, since their two roles as private and professional may very well be in discrepancy.

A younger doctor, Andrea, explains how it becomes very difficult for her to answer the patients, since she very deeply feels how terrible it must be to be in the patient's position – but she is unable to share her personal feelings with the patient, since she then would feel too exposed and vulnerable. This negotiation of roles changes the flux of open and closed channels in the layers of the semiotic skin and thus cause difficulties for the patient to extend his or her flux in semiotic skin to relate and intertwine with Andrea's. Relating to one's doctor and expecting the private person to react, is somewhat critical in the partnership between doctor and patient.

Being at a hospital puts healthcare personnel and patients in very different positions, since the healthcare personnel is in their well-known and secure environment, while the patients do not have that privilege. This makes it easier for the healthcare personnel to maintain the mask of the professional role, than it is for the patients, since it is difficult for them to find the well-known and secure aspects and moments of recognition – from their own lives – as to maintain the same roles as before hospitalization. The patients in the hospital become Alice and the caterpillar.

10.3. ARE WE SHARING?

The six-steps-model of SDM contains a plan of actions and is built on the responsibility of the doctor (The SHARE Approach, 2014).

1. The patient must be invited to participate in the process.
2. The doctor must present options of treatment.
3. The doctor must inform on risks and benefits.
4. The doctor must support the patient – from their preferences – in options.
5. The doctor must facilitate the decision-making and thus deliberate.
6. The doctor must implement SDM.

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healthcare personnel to maintain the mask of the professional role, than it is for the patients, since it is difficult for them to find the well-known and secure aspects and moments of recognition – from their own lives – as to maintain the same roles as before hospitalization. The patients in the hospital become Alice and the caterpillar.

With the four-criteria SDM model, there is – on the other hand - an emphasis on the mutual expectations between doctor and patient (Charles, Gafni and Whelan, 1999; Alden et al., 2014).

1. At least two persons must participate (doctor/patient).
2. They both share information.
3. They both work towards unanimity of a preferred treatment.
4. They both must agree on a treatment.

These four criteria look very much like the partnership model - without the psychological explanations and reflections of how these criteria are supposed to be implemented and owned by each participant of the relation and communication.

Both of these lists are descriptions of how to reach and perform SDM, but with very different focus on the approach and result. They both believe to reach SDM as an end result but the two approaches are not slightly similar. The six-steps-model seems to take action from the power of the doctor to guide and control the process of the patient in deciding treatment and how to make meaning. It is the doctor's responsibility to create the communication platform between him/her and the patient; on which the patient is invited to participate. In this first paragraph, I agree. From here though, the process of reaching SDM becomes somewhat blurry, since all the responsibility and opportunity to act in and control the process is placed with and in the doctor's domain. It seems odd, that these next five paragraphs in any way could be the foundation from where the patient arbitrary is positioned to reach a decision from own and individual reflections and will. It IS the doctor who can present options of treatment, but patients – being collective patients - also have the opportunity to research medias, ask other professionals, friends and relatives etc. as to gain knowledge of their illness and thus do not necessarily fully rely on the doctor's directions. The power of responsibility in the second paragraph is thus not only the doctor's. the third paragraph has the same discrepancies as the second paragraph, and the fourth paragraph holds the same content of dilemma. The doctor supports the patient's options from the individual preferences of the patient. Supporting in this process means it is not shared either, since the support is based on only one direction. The patient's preferences should correctly and wisely enough be the foundation from where options are emerging, but the responsibility in this particular process is asymmetrical in power-relations. The doctor supports but has no responsibility in the process of choosing one option from another, and the patient holds the full responsibility of this particular decision. Hereby there seems to lack any shared-ness. In the fifth paragraph the doctor facilitates the decision-making as to deliberate – but the process of making a decision lies only with

and within the patient. The process of decision-making is thus not shared but divided. Implementing the SDM in the sixth paragraph also only lies within the doctor's domain, which indicates that the doctor has the power to catalyze and control the process of SDM.

As reflected on this particular understanding of cooperation in the SDM, there is no shared-ness. Instead there are very specific moments and sections in the process-related actions of making meaning and decisions that are divided between doctor and patient. Hereby the argument of using these six paragraphs as to reach SDM because the doctors have limited knowledge of the SDM (Stacey, Samant and Bennett, 2008; Graham and Logan, 2004) and thus have no considerations of expectations, preferences and values of the patients, seems unsubstantiated.

Looking into the four-criteria SDM looks very much like the description of the partnership model (Charles, Gafni and Whelan, 1999; Alden et al., 2014; Bibace et al., 1999), which gives the impression of a shared-ness in the process. Unfortunately the descriptions of the four criteria are lacking details and psychological reflections on how to reach them. At least two persons must participate is easily understandable and applicable as well. They both share information can also easily be accepted, but what information, how to share, are there any limitations etc. are not explicitly addressed. With this in mind it becomes ever so difficult to reach the third criteria of agreeing together in a preferred treatment, since the foundation of shared-ness and security in relying on each other's sincere honesty is lacking mutual foundation of understanding and agreeing on a shared meaning-making. Agreeing on a treatment thus lies within a frail mutuality.

As it seems – it is important to create a communicative platform on which both parts agree on and understand each other's intentions and backgrounds. As to be able to do that, the partnership is mutually negotiated and eventually becomes a sincerity between the participants when mutual channels in the semiotic skins opens as to create fluxes with impacts and counter-impacts that relates and thus makes mutual meanings. The SDM is very interesting as a theory and as a foundation from where the complexity of an asymmetrical communication can be recognized and acted upon. Unfortunately, this does not seem to be exposed in the present design of the theory. Therefore, there is a need to develop a combined, cross-disciplinary cooperation as to develop new theory, which thus can be implemented in everyday practice between the healthcare personnel and the patients (Woodhouse et al., 2017; Nedergaard, 2018).

This attempt to develop a multi-disciplinary theory to be implemented in everyday practice is incorporated in the communication courses with the nurses and doctors at AUH in the cooperation between medicine, cultural psychology, music and natural scientific theories.

10.4. AT THE HOSPITAL

The communication courses for the doctors and nurses have different designs, since their professional cultural environments are different. The doctors refer in their course to professional inter-relations and thus rely on each other's professional roles with minor references to their individual, personal reflections and understanding of each other. In their roleplay in groups of two, being asked to play both the doctor and the patient, they referred to the role as patient as the most difficult, since they kept on reflecting and analysing as a doctor instead of their personal feelings in the situation. This clearly is in contrast with their written answers of feelings connected to death. Being with colleagues thus seems to favour the professional role, even though they explicitly were asked to accentuate the personal.

The nurses on the other hand have a somewhat opposite favouritism of their roles. By this is not employed, that they are not professional in their work-life. Instead it showed that they relied on their personal feelings and reflections in professional communicative contexts to a greater extent than a pragmatic scientific approach. Their professional role is so to speak connected to and incorporated with/in the personal role. "*Being a professional nurse is THE identity of these women*" (Anette Søgaard Jensen).

10.4.1. DOCTORS

The course for the doctors were designed with two days one week apart, as to detect whether there would be any changes in their descriptions of their patient contacts good or bad. Overall there was a clear difference in the references of conversations with patients. Here two significant ones will be referred.

In the written data material, participant 101 referred the first day to a conversation that went well with an emphasis on concrete questions to the patient: *"I further ask into the concrete concerns"*[13], and from this single-handedly tries to figure out how to motivate the patient in a process of choosing treatment: *"..and tries to figure out if I should motivate her to try or support her in refraining the treatment"*[14]. 101 *sense* that the patient has decided to decline the treatment, and thus shows her a diagram with the anticipated rate of survival: *"When I sense that she has actually decided to say no thank you I show her the estimated gain measured of survival and relapse risk. It is*

[13] "Jeg spørger mere ind til de konkrete bekymringer"

[14] "…og prøver at finde ud af om jeg skal motivere hende til at forsøge eller støtte hende i at undlade behandlingen."

low."[15]. Hereafter the doctor notes that the patient was very happy to see this and thus expects the patient to be able to feel comfortable in her process of making a decision: *"She gets very happy to see this and I expect she can subsequently rest in her decision and make a final commitment."*[16]. In these descriptions the understanding of and knowledge of SDM is lacking and the emphasis is focused on the doctor's ability to analyse the situation without sharing thoughts with the patient. Even though the doctor has a clear understanding of a grateful patient (and spouse, collective patient) and a communicative process that went well: *"Patient and spouse thanked me on their way out for the honest communication and I felt that I succeeded in meeting and guiding her in her process."*[17] This last statement very explicitly shows a tendency to guide the patient and thus not share the communicative process of creating a partnership from where both participants can contribute mutually.

One week later the same doctor reflects on a positive conversation with a patient that has occurred during the last week. The doctor describes a communicative process with a patient and spouse where the patient was suicidal and shocked. The doctor has done a severe and professional job in the data of the scans, but also related directly to the patient in acknowledgment of her situation: *"Listened to their frustrations and explained that it was the aggressive nature of the illness and it was understandable that she was shocked. We had a good conversation on what she could do. She did no longer seem so shocked and was no longer suicidal. The conversation was long, but they went out the door more clarified."*[18]. In this statement the sharing is very concrete when the doctor describes the listening to the patient, the information of the illness's nature and the reflections of having a good and mutual conversation. The doctor acknowledges the patient's feelings and explicitly reflects on the patient's emotional condition, instead of solidly referring to external data.

The observed statements have one particular clear description of the changes in actions and perceptions from the first week to the next. A doctor with 12 years of experience as a professional doctor describes – during plenum discussions the first day of the course - meetings with angry or aggressive patients as the worst. These

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[15] "Da jeg fornemmer at hun egentlig har besluttet sig for et nej tak viser jeg hende den forventede overlevelse og tilbagefalds risiko. Den er lav."

[16] "Hun bliver meget glad for at se dette og jeg forventer at hun efterfølgende kan hvile i sin beslutning og tage endelig stilling."

[17] "Patient og ægtefælle takkede mig på vej ud for den ærlige formidling og jeg følte, at det var lykkedes for mig at møde hende og guide hende i hendes valg."

[18] "Hørte på deres frustrationer og forklarede at det var sygdommens aggressive natur, og at det var forståeligt at hun var chokeret. Vi fik en god samtale om hvad hun kunne gøre. Hun virkede ikke så chokeret længere og var ikke suicidal. Samtalen var lang, men de gik mere afklarede ud af døren efterfølgende."

conversations irritate her and she often in these situations promptly stands up during the meeting with the angry patient and proclaim the conversation is over. She does NOT want to waste her professional time and personal good mood on such kind of a patient. During this first day I introduce the acknowledgement of explicitly telling the patient how this kind of behaviour affects the doctor in these particular situations. The doctors explain they have never been introduced to a professional way of acting with acknowledging their OWN feelings in the situation. This way of communicating as professional doctors combined with their personal references in life as collective doctors is new and frightening, since their immediate feeling is being too exposed and thus vulnerable in their partnership with the patients. The most interesting response of implementing this way of communicating as both professional and personal roles combined, was delivered by this particular doctor one week later, when she refers to a conversation with an angry patient. She explains how she remembered to be honest to the patient in explicitly expressing he feelings in the situation, so she tells him, she does not like him to speak so angrily to her. The patient replies that he certainly does not speak angrily (in an angry voice). The doctor answers that SHE feels that he speaks angrily. The patient pauses for a second and says that it definitely was not his intention to speak angrily. He is frustrated, scared and angry with his situation. The doctor is not to blame, and they both establish the communicative platform from where their momentary mutual partnership growth. The doctor tells she has never had this kind of experience with a patient before, and she feels relieved and strong in her ability to create a good and inviting platform of communication for her and her patients further on in her professional life. She had NO feeling of vulnerability in the situation – on the contrary; she felt secure as a collective doctor.

10.4.2. NURSES

The nurses have the same difficulties in combining the two roles as professional and private, as the doctors – with opposite focus. During the educational course for the nurses they had different educative features from doctors in the beginning of the day (before the last three hours of communication course). During these lectures were two different doctors teaching in medical aspects of illnesses and procedures. The lectures and the doctors were very different in their expressions, with one dictating and questioning the nurses in concrete knowledge, and they felt insecure in the questioning, since they were afraid not to be able to answer the doctor what he expected. The other doctor kept asking them in plenum how they would reflect on specific cases and try to make them decide in a mutual conversation with him as a doctor. Reflections on cases – he said – are equally relevant and wanted no matter if you are a nurse or a doctor.

Afterword – during our communicative course – I asked them how they reflected upon and felt about the two different doctors. The first doctor they described as a bit harsh but extremely professional, and the latter as very, very nice and likeable but not nearly as skilled as the first one. The two lecturing doctors are equally skilled and the latter

even more experienced according the head doctor of research and education, Ursula Falkmer. The interesting aspects of the nurses were their frustration of not feeling the doctors take them seriously as professionals with the same professional eligibility as the doctors. When working with the understanding of the collectiveness in the professional expressions I focused on these two events earlier that day. I explained what I noticed during the doctors' lectures and how I reflected on their responses toward the doctors.

First of all, they all agreed they were professionals and should be acknowledged as so. Secondly they described their personal identity as being a nurse. The first doctor lectured like it was an interrogation and explained how important it was for the nurses to know these things if he – as a doctor – should be able to rely on them. They were not at a single point being invited into a partnership with him and hereby develop a mutual respect and sincerity in their professional roles. The latter doctor invited the nurses from the very beginning to enter the communicative platform of mutual partnership, which they did not acknowledge and thus positioned the doctor as not nearly as professional as the first. When the nurses were confronted with this interpretation of the previous events of the day, they reflected on their own internalisations of professional identification via fluxes with severely different outcomes, that easily could be reversed by their own control of open and closed channels in the semiotic skin.

10.4.3. DOCTORS AND NURSES

Mutual themes for both doctors and nurses were found by systematically organize and interpret the written, filmed and observed data during the courses. The overall mutual theme was the genuine desire to relieve the ailing body of the patients and hereby create a mutual relation between healthcare personnel and patient. The way to this though, is not necessarily identical in the two groups of professionals. One example of this difference in approaching the patients is seen in their physical contact with the patients. The nurses refer to a naturalness in touching and nursing the bodies, in which actions they non-verbally connects with their patients. This physical contact is not in any way referred to as crossing any invisible border and thus intimidate the professional relation with the patient and is even in certain situations preferred to happen in silence in respect for the patient. The nurses thus show their ability to internalise the physical responds to other's bodies as the musicians refer to. This position the nurses as being very good at using both roles as professional and personal in their relations to the patients and hereby appear sincere and honest to the patients. The downside of this ability unfortunately also position the nurses as very vulnerable toward critique of their work, since they identify personally as their professional roles. A nurse explains tearfully how a patient's relatives yelled at her, questioning her professional actions. She KNEW she had acted correctly and that the relatives had no understanding of hospital procedures, since they could complain about this specific problem for them. Instead of shaking the experience off her as just a misunderstanding

and misinterpretation of the situation by the relatives, she was severely hurt and had to take a break at the office crying and being comforted by her colleagues. She was personally hurt – not professionally criticised – and thus became vulnerable and without ability to answer back in the current situation. She was without ability to act on her own and thus reflected on her personal and professional roles as both being compromised. The other nurses recognised this feeling too.

One doctor in particular, very explicitly explained how he felt about touching the patients during meetings with them. If the scans and results of tests gives all the answers needed to diagnose and/or reflect on the patient's ailing body, he makes it clear that he would never touch the patient. He feels he would get too close to the patient and thus he prefers to have a nurse with him in these consultations, since he acknowledge the nurses at being better at comforting the patients by holding hands, stroking them calmly etc., than he would ever be. The doctors mutually describe difficulties in communicating with aggressive and silent patients, since they are not sure about how to react. They are very much aware of how it must feel to be the patient, but have no idea of how to relate to the patient in these situations.

This lack of knowing how to relate is not in any way related to the doctors' being un-empathetic or unaware of the patients' situations. Instead it shows to be because of a super empathic reflection of how it must be in the patients' positions and not having the psychological knowledge of how to use themselves as the powerful tools they can be in these situations. They feel they are too exposed and vulnerable and unable to protect themselves: *"I'm sitting panicky thinking how I shall do something good for you (the patient) and I cannot think of anything to do"* [19]. The doctors responded in plenum discussion, the second day of the course, that they had found out they need to acknowledge and embrace their forces and deficits as to become the psychological and individual communicators in which they securely and sincerely relate to the patients and thus are able to create the communicative platform where a mutual partnership emerges.

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[19] "Jeg sidder panisk og tænker på hvad jeg kan gøre godt for dig, og jeg kan ikke rigtigt komme på noget." (Video 16, 00.40-00.50).

CHAPTER 11. CONCLUSION

The research questions

- How is it possible to understand communication and meaning-making through the skin?
- How does this embodied understanding of the skin as a physical and psychological boundary hold the ability to control and/or integrate communication and meaning making?
- How can we develop a new approach of educating communicative aspects in the Danish healthcare system?

are answered via different approaches. The first question is theoretically explained in the articles and chapters of SST, collective patients and collective doctors. The second question of understanding an embodied boundary, controllable by the owner of the semiotic skin as well as by others' in intertwined connections, are described in the articles explaining SST, SDM, AD, collective patients, collective doctors and descriptions of a boundary's nature in cross-disciplinary areas.

The last question has a slightly other character and is thus answered via an empirical, theoretical and practical approach in the cross-disciplinary area of psychology, medicine, music etc. Hereby there is a double approach of a theoretically developed foundation as well as an empirical sample of data material that mutually needs to be interpreted as to reach an acceptable conclusion.

With a focus on an embodied communication which holds the notions of cross-disciplinary sciences and approaches, it shows to be relevant to internalize these different theories if it in further research shall be possible to develop a theoretical foundation from where all the factors are revealed and thus potentially possible to detect and analyse in any context ever. A new cultural psychological theory of communication has hereby been introduced in its very first and somewhat embryonic expression.

The SDM is not nearly enough as a theoretical foundation of understanding and implementing shared decision in an asymmetrical communication. Instead it is shown that the ideas of simplifying an extremely complex phenomenon can be dangerous if it is meant to create security in its expression in practical performances. Instead it is necessary to develop a more complex theory, which holds theoretical notes from cross-disciplinary areas as to contain various, multi-faceted expressions. In order to be able to teach and implement this complex approach, it is crucial to understand that it is not possible to create courses as "one-fits-all". The individual aspects of a person's internalization and integration of different roles in the conduction of communication calls for the ability to create a secure environment, where people – in

this case doctors and nurses – are able to be confronted with their own individual forces and deficits as to be able to use these as a catalyst of their own individual style of communication. Hereby it becomes easier to rely on one's own reflections on the partner in the communication (realistically it will never be possible to do this at every time in every aspect). The conductors of the communication in a partnership thus becomes the "tools of communication" themselves instead of following a check-list or schedule that never fits the situation fully.

This is the very first approach of developing a new theory and a new way of practical implementation of this theory in the Danish healthcare system. It is though not nearly enough and these first conductions could be developed in a much larger and sophisticated scale if the patients' aspects were integrated in the data as well, if medical and nurse students were introduced to this way of understanding an asymmetrical communication and if we dare to cooperate with professional areas of theories we - as experts in very specific areas – do not know much about. Therefore, it is necessary to continue the cross-disciplinary work in the Crossfield between theory and practice.

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APPENDICES

Appendix A. **195**
Appendix B. **200**

Appendix A.

Kursus i kommunikation for yngre læger

Semiotisk Dialog: Aalborg Modellen

Dato: 3. maj og 10. maj 2017.

Tid: Kl.12.00 – kl.16.00

Sted: Rendsburggade 14, lokale 5.237.

Dette kursus er tilrettelagt i samarbejde mellem Aalborg Universitetshospital, Aalborg Universitet og The Niels Bohr Professorship, Centre for Cultural Psychology i ønsket om at udvikle en ny kommunikationsundervisning for læger i det danske sundhedssystem. Målet er at kunne undervise i og tilegne sig viden omkring fysiske og mentale faktorer mennesker imellem; således det fremadrettet vil være muligt at detektere egen og andres rolle i en given asymmetrisk kommunikation.

For at kunne udvikle denne nye teori får I hermed muligheden for at tilkendegive egne behov i forhold til læge-patient kommunikationen, samt tilegne Jer nye/anderledes måder at bruge og forstå allerede kendte kommunikative redskaber.

Kurset vil være opbygget over to moduler af 4 timers varighed. Det første modul vil fokusere på rollespil og plenumdiskussioner, således der kan indhentes data fra Jeres kommentarer og samtaler. På baggrund af disse skrevne-, lyd- og filmdata vil der produceres et teoretisk oplæg til 2. modul. Dette 2. modul vil dermed være fokuseret mod Jeres behov og være grundlagt i både teori og praktisk udførelse.

Der forventes ikke teoretisk forarbejde eller anden form for forberedelse. Kurset vil begge dage starte med frokost og vi beder i denne forbindelse om en tilbagemelding, hvis der er forbehold i forhold til allergier, vegetarisk mad etc. Der vil være kaffe, te, kage i løbet af dagen. Vi ser frem til inspirerende og udbytterige dage i Jeres selskab.

De venligste hilsner

Jensine I. Nedergaard og Anette Søgaard Jensen

Kursusansvarlige:

Aalborg Universitetshospital:

Ursula Gerda Inge Falkmer

Klinisk Professor, Ledende overlæge.

Jørgen Hansen

Overlæge

Anette Søgaard Jensen

Klinisk psykolog

Aalborg Universitet:

Jensine Ingerslev Nedergaard

Kulturpsykolog

Program:

Kl.12.00 – 12.30

Frokost

Kl.12.30 – 12.45

Kort introduktion

Kl.12.45 – 13.15

Skriftlig besvarelse af spørgsmål

Kl.13.15 – 13.25

Kort pause

Kl.13.40 – 14.40

Rollespil (af og med både kursusansvarlige og deltagere)

Inklusiv plenumdiskussion

Kl.14.40 – 14.50

Kort pause

14.50 – 15.50

Rollespil inklusiv plenumdiskussion

Kl.15.50 – 16.00

Afrunding – Tusind tak for i dag.

Appendix B.

Kursus i kommunikation for yngre læger

Semiotisk Dialog: Aalborg Modellen

Dato: 10. maj 2017.

Tid: Kl.12.00 – kl.16.00

Sted: Rendsburggade 14, lokale 5.237.

Kursusansvarlige:

Aalborg Universitetshospital:

Ursula Gerda Inge Falkmer

Klinisk Professor, Ledende overlæge.

Jørgen Hansen

Overlæge

Anette Søgaard Jensen

Klinisk psykolog

Aalborg Universitet:

Jensine Ingerslev Nedergaard

Kulturpsykolog

Program:

Kl.12.00 – 12.30

Frokost.

Kl.12.30 – 13.30

Teoretisk gennemgang og refleksion.

Introduktion af eksempler.

Plenumdiskussion.

Kl.13.30 – 13.45

Pause.

Kl.13.45 – 13.50

Skriftlig besvarelse.

Kl.13.50 – 14.50

Rollespil (af og med både kursusansvarlige og deltagere)

Plenumdiskussion

Kl.14.50 – 15.20

Skriftlig besvarelse

Kl.15.20 – 16.00

Afrunding – Tusind tak for i dag.