Approaching Performance Art through Neuroscience
with Example of ”The Artist is Present” (2010) by Marina Abramović

Human Nature

is Present

by Fredrik Longva

Master Thesis in Art History

Department of Linguistic, Literary and Aesthetic Studies,
University of Bergen.
Spring 2015

Norsk sammendrag

Denne oppgaven demonstrerer og diskuterer hvordan perspektiver fra kognitiv nevrovitenskap kan bidra i vår kunstteoretiske tilnærming til performativ kunst.

Den serbiskfødte performancekunstneren Marina Abramović (f. 1946) anses som en av de fremste innenfor sitt felt. I nyere tid har særlig det performative arbeidet *The Artist is Present* (2010) forsterket Abramovićs posisjon som en av de største blant samtidens performancekunstnere. Arbeidet ble utført under hennes retrospektive utstilling med samme tittel, på Museum of Modern Art (MoMA) i New York City fra 14. Mars til 31. Mai 2010. 1450 galleribesøkende benyttet anledningen til å delta i arbeidet ved å sitte ansikt til ansikt med Abramović og utveksle blikk med kunstneren. De sterke reaksjonene *The Artist is Present* fremkalte i deltakererne og den øvrige responsen fra kunstverdenen markerer arbeidet som unikt innenfor sitt felt. Det performative kunstverket inspirerte Abramović til å igangsette sitt seneste prosjekt, The Marina Abramović Institute, hvor det blant annet tilrettelegges for samarbeid mellom kunstnere og forskere innenfor kognitiv nevrovitenskap.

På bakgrunn av denne nye vendingen innenfor Abramovićs kunstnerskap, samt teknologiske fremskritt som de siste tyve årene har tilgjengeliggjort detaljert informasjon om de kognitive prosessene involvert i blikk-kontakt mellom mennesker, undersøker jeg hvorvidt nevrovitenskaplig informasjon kan utgjøre verdifulle bidrag til vår forståelse av det performative arbeidet. Gjennom en tilnærming basert på de etablerte nevrovitenskapelige konseptene *The Eye Contact Effect* og *Theory of Mind*, presenterer jeg en ny lesning av det performative arbeidet *The Artist is Present.* Dette settes deretter opp mot tidligere, dokumenterte forståelser av arbeidet, her delt inn i et kulturelt og et sosiopolitisk perspektiv. I diskusjonsdelen av oppgaven argumenter jeg for hvordan det nevrovitenskapelige perspektivet, sammen med de kunstteoretiske perspektivene, fører til en rikere forståelse av *The Artist is Present.* Videre diskuterer jeg hvorvidt en bør trekke inn naturvitenskapelig informasjon i kunsthistorisk praksis, gjennom å belyse det historiske forholdet mellom kunst og vitenskap, samt de sterke motreaksjonene nevrovitenskapelige tilnærminger til estetikk har fremkalt i vår egen tid.

Acknowledgments

My gratitude goes to
Supervisor Per Olav Folgerø
for your guidance and belief in this project,
and for your navigation through the world of neuroscience.

Professor Siri Meyer
Professor Knut Ove Arntzen
Nora Sørensen Vaage
for advice and literary recommendations.

My mother and father,
Family and friends
for the support.

Fellow students,
for great conversations.

The University of Bergen
for the opportunity.

Thank you.

Content

”Words are only painted fire;
a look is fire itself.

- Mark Twain

Chapter 1 – Introduction

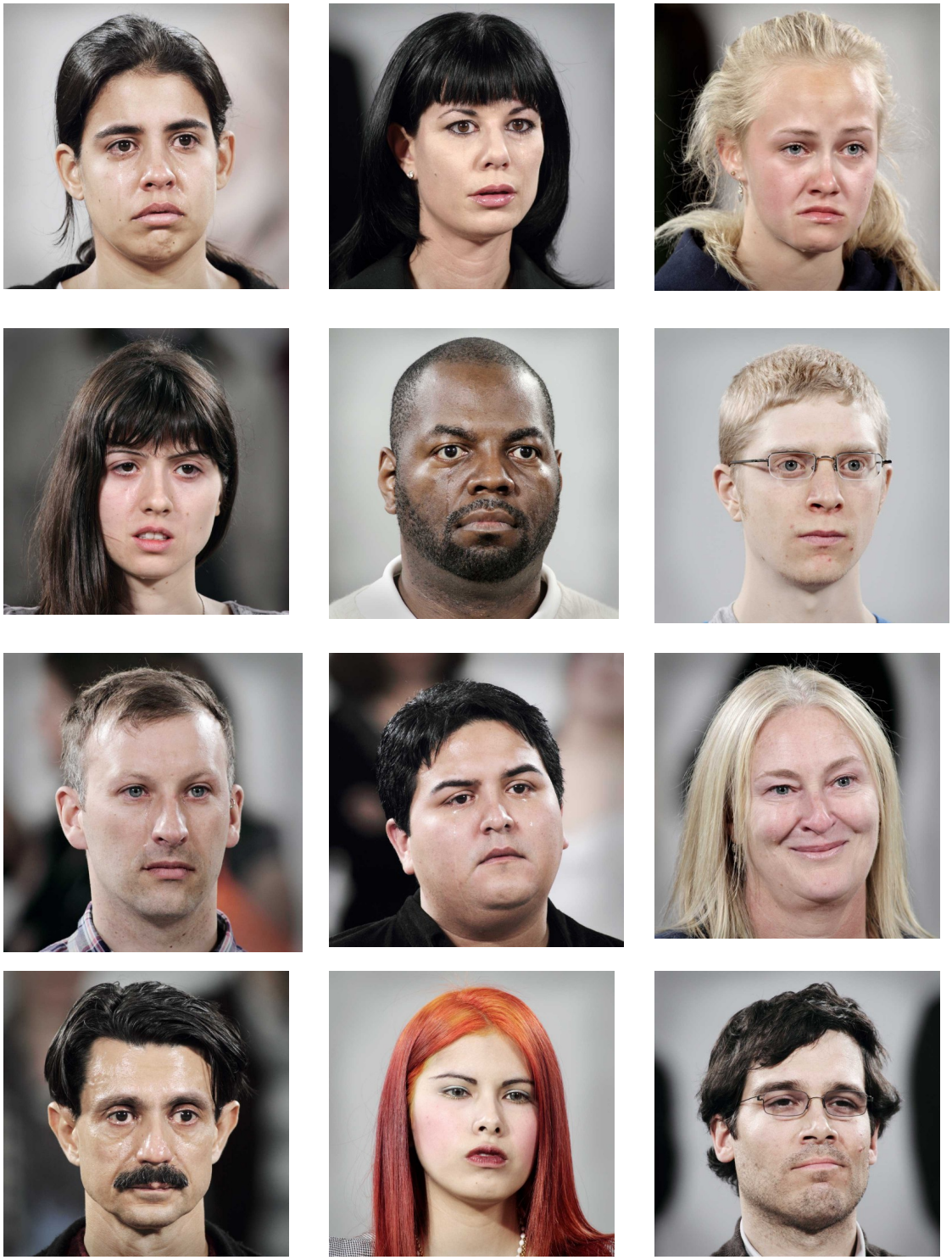


Figure 1. *A Selection of "Portraits in the Presence of Marina Abramović" (2010)*

Subject and Motivation

What has fascinated me the most with the performance artwork *The Artist is Present* (2010), is the emotional expressions one can read from the faces of its many participators (**Figure 1)**[1]. I have never before witnessed such strong reactions to a contemporary work of art. The performance art piece invited visitors to the Modern Museum of Art in New York City to engage in an act of eye contact with performance artist Marina Abramović for as long as they wanted. Why did this simple act of gazing into each others eyes evoke such strong emotional responses?

Leaving the movie theatre, I was baffled by what I had witnessed in the documentary *The Artist is Present (2012)*; my first encounter with both the performance piece and its creator Marina Abramović. However, I did not anticipate these very questions laying the foundation for what would become my masters thesis three years later. My motivation has been a genuine interest in understanding why this particular piece had such a strong impact on both the individuals who experienced it, and the contemporary art world at large.

My desire to reach a deeper understanding of this particular artwork, could be compared to what have motivated numerous art historians in their attempts to reveal the truth behind the mysterious smile of *Mona Lisa* (ca. 1503-06) by Leonardo da Vinci (1452 – 1519). It is the desire to understand why certain artworks have such an impact on us and what this can inform us about art and our experience of it.

One can wonder if any pair of eyes have been met by more, than the painted gaze of the *Mona Lisa*. Since first handed to King Francois 1 of France, believed to first been displayed at the Château de Fontainebleau[2], the smile and gaze of *Mona Lisa* has continued to captivate its spectators. One man claim to have figured out the mysteries of the painting. However, taking an untraditional path in the world of art history, Dr. Louis Martinez Otero and his colleges has investigated the painting through techniques derived from the discipline of neuroscience. According to the research team of Martinez Otero, the reason for Mona Lisa's shifting smile depends on which

[1] See more portraits at http://www.marcoanelli.com/portraits-in-the-presence-of-marina-Abramović/
[2] Bohm-Duchen, Monica. *The Private Life of a Masterpiece: Uncovering the Forgotten Secrets and Hidden Life Stories of Iconic Works of Art.* University of California Press, 2001: 51

cells in the retina of our eye detects the image of Mona Lisa. Further, it depends on which channel these inputs transmit through in the brain. It is the battle between the different channels that decides whether we experience Mona Lisa as smiling or not.[3] This builds upon the research of neuroscientist Margaret Livingstone, who found that the smile of the *Mona Lisa* was best detected through our peripheral vision, as oppose to when we directly look at the smile[4]. This again could be seen in relation to the technological examination of the painting with an X-ray device in 2010. This study revealed the effect of the *Mona Lisa* to be a result of thin layers of glaze from da Vinci's remarkable use of the *sfumato*[5] technique.[6]

The field of cognitive neuroscience is concerned with understanding the neural mechanisms involved in higher levels of human mental activity, including self-awareness, mental imagery and language[7]. During only the last decade, this field has provided us with new and astonishing information about how the brain creates the mind. A sub-discipline within this field is *neuroaesthetics*, a new neuroscientific approach to understanding the aesthetic experience, which have shaken the very foundations of our discipline. As I got a bachelor's degree in psychology prior to studying art history, it has been natural for me to consider knowledge and theory about art and its history from this academical starting point. Viewing it as nothing but an advantage, I have thought of this insight into two different academic discipline as enriching for my understanding of human beings and the art we create and experience. Therefore, I was surprised to find that little to no academic work have approached "The Artist is Present" through perspectives from neuroscience, and the knowledge it has provided us with about the cognitive processes involved in responding to *mutual gaze*.

On the background of a lasting desire for a deeper understanding of why *The Artist is Present* had such an impact on its participators, and a conviction that neuroscience can contribute to this understanding, I present the two issues handled in this thesis:

---

[3] Alleyne, Richard. The Secret behind Mona Lisa's enigmatic smile. *The Telegraph*, 10-28-2009
[4] Gold, Ian and Adina L. Roskies. "Philosophy of Neuroscience" in *The Oxford Handbook of Philosophy of Biology*. Edited by Michael Ruse. Oxford University Press, 2008: 369
[5] *sfumato*, from Italian *sfumare*; here sfumato describes painting teqchnique from Reneissance producing the fine shading that produces soft, imperceptible transitions between colors and tones.
[6] Alleyne, 2009.
[7] Bear, Mark F. et al., *Neuroscience: Exploring the Brain*. Lippincott Williams & Wilkins, 2007: 14

How does information from the field of neuroscience contribute to our understanding of the impact *The Artist is Present* had on its participators and the world as large, and should neuroscientific information of consideration to our theoretical approaches to performance art?

Structure and Literature

In the latter part of this Introduction, I present the genre of performance art and the field of neuroscience. In the fertile field of performance theory, my introduction of performance art has derived from several key notions and references made in the excellent presentation of the genre by Camilla Jalving (b. 1972) in her book *Værk for handling* (2013). The introduction includes brilliant examples of performance art. The examples featured have been chosen to both illustrate the central components to the art form, and represent the diversity within the field. This is followed by a short introduction to the field of neuroscience, in an attempt to provide the reader with necessary tools to explore the field of neuroscience.

I present the background of the artist, a description of *The Artist is Present,* and the reactions it evoked, based on the vast array of writings and documentation available to me. Further, I approach the work through two different art theoretical *understandings*. The first, I have summarized as *the cultural understanding*, presenting a view where the participator appears affected by what Professor in Theatre Studies, Erika Fischer-Lichte (b. 1943), describes as "the transformative power of performance."[8] This "fresh, continental"[9] and new aesthetical approach is considered a significant contribution to the growing body of discourse concerned with performance.[10] I present some of the key notions in the theory, in attempts to understand the strong reactions *The Artist is Present* evoked. Further, I elaborate the cultural aspects of the performance by drawing lines to the traditions and practices of shamanism, based on several art historians descriptions of Abramović's shamanistic abilities. Lastly, I high-light the religious aspects one can associate with the performance.

[8] Fischer-Lichte, Erika. *The Transformative Power of Performance*. Translated by Saskya Iris Jain. Routledge, 2008: 11
[9] Carlson, Marwin "Introduction: Perspectives on performance: Germany and America" in *Transformative Power of Performance* by Erika Fischer-Lichte . 2008: 1
[10] Ibid.

I present *the sociopolitical understanding* on the background of Art Historian Amelia Jones' (b. 1961) experience of the performance, resulting in criticism of Abramović's work. Her experience of *The Artist is Present* was "very strongly one of participating in a *spectacle,*"[11] referring amongst others to French Philosopher and Situationist Guy Debord's (1931 – 1994) *Society of the Spectacle* (1967). I consider some of the ideas presented by Debord in order to view the performance in critical perspective. Here, the focus lies on the frames the performance worked within, which contribute to an understanding of the impact *The Artist is Present* had on the art world at large.

The cultural and socio-political understandings represent documented notions of both the contextual frames and the performance. Following these two art theoretical understandings, I present a new approach to the performance by considering information provided by cognitive neuroscience. With *The Neuroscientific Understanding,* I offer an understanding of the impact *The Artist is Present* had, based on knowledge about the cognitive effects of engaging in mutual gaze with another human being.

Navigating through the fast-paced and ever-changing universe of neuroscience can be possibly overwhelming. Therefore, I have narrowed the presented literature on the subject of mutual gaze down to the scientific concepts of the *eye contact effect* and *theory of mind.* These concepts have consensus in the field, serves the foundation for further research, as well as being arguably relevant to *The Artist is Present*.

In order to answer the first question presented, I discuss the three presented understandings of the performance. Here, I demonstrate how the aspects from the cognitive neuroscientific perspective, when working together with the art theoretical approaches, enriches our theoretical understanding of the performance artwork. This conclusion appears to differ from pre-existing views, as I have found little to no academic work concerned with the neurological aspects of *The Artist is Present*. In order to understand why this is and answer the second question of this thesis, I elaborate on the relation between the disciplines of humanities and science.

[11] Jones, Amelia. "The Artist is Present: Artistic Re-enactments and the Impossibility of Presence". *The Drama Review.*Volume 55, Number 1. 2011: 18

I approach the discussion on art and science with great humility, as this debate has derived from a complexity of political, academic, and historical context this thesis only will manage to grasp the surface of.

The historical aspects of this complicated relationship are presented through C.P Snow's (1905 – 1980) historical essay *Two Cultures* (1959). This is followed by discussing the epistemological differences between humanities and science, and Art Historian Martin Kemp's (b. 1942) idea of shared "structural intuitions" between scientists and artists. I continue by turning to the heated contemporary discussion on neuroscience. Especially concerned with neuroaesthetics, I review two critical articles, *Art and Science Don't Mix* (2012) by Critic and Author Stuart Kelly and *"The Shrinking World of Ideas"* (2014) by Essayist Arthur Krystal. I consider the main arguments of these articles, before presenting my concluding remarks on the matter. Lastly, I offer my view on the future of performance art and reflect upon the importance of considering neuroscientific information in theoretical approaches to the exhilarating form of performance art.

Methodological Considerations

"Theory offers not a set of solutions, but the prospect of further thought", writes Professor in English Literature Jonathan Culler (b. 1944).[12] Acknowledging the several challenges involved in my attempt to enrich art theoretical practices with information from natural sciences, I foremost consider this thesis to be a contribution to the prospect of further thought. It should be viewed as an attempt to expand the horizon of how we can approach the ambiguous field of performance art as art theorists and historians.

When describing attempts to evaluate outcome of theatrical experiments, Erika Fischer-Lichte points out the circumstance that "the processes of negotiation [between the performer and the audience member] vary, at times significantly, in each individual performance of a given production, making it impossible to draw even approximating conclusions on them."[13] In other words, I do not consider my work as

[12] Ede, Siân. *Art & Science.* I.B Tauris, 2005: 42
[13] Fischer-Lichte, 2008: 40

managing to rightfully present or discuss the complexity of 1450 individual experiences of sitting with Abramović. Theoretical analysis approaching the ambiguity of *aesthetic experience* will always suffer from elements and interactions impossible to fully fathom. I agree with Professor Dennis Kennedy (b. 1940) who states that "audiences are not (…) homogeneous social and psychological groups (…), their experiences are (…) impossible to standardize (…) Almost anything one can say about a spectator is false on some level".[14]

I further agree with the belief one finds central to the discourse of performance art analysis, that not even those attending a performance art piece will be able to access the performance fully *truthfully.* That our embodied memories to some degree will be mediated and unreliable. In other words, I am not in search of any truth about *The Artist is Present*. As Jones states: There will be "No illusions of truth, of restating the authentic moment through words drawn from memories, here."[15] The latter part of this quotation also describes what I consider a weakness in my work.

I solely base my approach to *The Artist is Present* on the large amount of documentation available to me, as I did not attend the performance myself. Jones present a similar concern when she approaches *Seven Easy Pieces* (2005), a series of work by Abramović that Jones did not attend. She reflects upon how her writing about this performance will remain at a strictly discursive level as oppose to a level of embodied memory.[16] However, when Jones compare her experience of having attended *The Artist is Present* with her strictly discursive approach to *Seven Easy Pieces*, she states that "neither experience, however, feels more truthful or more "authentic" to me as I attempt to understand how each project functions socially, aesthetically, or politically."[17] Agreeing on this, I do not consider my lack of experiencing the work as fatal and believe that I am still able to approach and discuss the work in socially, aesthetically and political perspectives.

[14] Kennedy, Dennis. The Spectator and the spectacle. Cambridge, 2009: 3
[15] Jones, 2011: 27
[16] Ibid.
[17] Ibid.

Introduction to Performance Art

Professor in Theatre Studies Marvin Carlson (b. 1935) refers to the term *performance* being an "essentially contested concept."[18] By this, he points out how the meaning of the word heavily depends on the frames it is presented within. Carlson elaborates on the variety of what is considered performance, by showing examples of its usage in humanities and social sciences. Founder of the new academic discipline Performance Studies, Richard Schechner (b. 1934) accompanies this view on performance and the studies of it. He states that "Any and all of the activities of human life can be studies "as" performance"[19].

However, in this thesis and in the context of art history, *performance* is most commonly used about the art form that "defies precise or easy definition beyond the simple declaration that it is live art by artists",[20] as Roselee Goldberg presents it. Or, as Richard Schechner states: "The term 'performance art' was coined in the 1970s as an umbrella for works that otherwise resisted categorization."[21] Originally deriving from the French word *parfournir* meaning "to finish", the word performance is commonly used in the English language for executing something in the most basic meaning or to *play a part*. In English it is also the word for a concert or a theatre show performance.[22]

Like the term itself, and the description of performance soon to follow, the origin of performance art is a point for discussion. One could argue that it is possible to trace the act of *performing* back to the shamanistic rituals being performed in the beginning of mankind, which we return to in Chapter 3. However, performance art is more commonly thought to have sprung out from the performances of the 1916s *Cabaret Voltaire* **(See Figure 2).**[23] This was an art venue at the Hollandische Merierei tavern, where First World War refugees from all over Europe gathered. Here, the futurists and founders of the art form of *Dadaism*, made their audiences riot as a result of their

[18] Carlson, Marvin. *Performance: A Critical Introduction*. Routledge, 2003: 1
[19] Schechner, Richard. *Performance Studies: An Introduction*. Routledge, 2013: 29
[20] Goldberg, Roselee: *Performance Art from Futurists to Present*. Thames and Hudson, 1979: 9
[21] Schechner, 2013: 39
[22] Jalvig, Camilla. *Værk som handling: Performativitet, Kunst og Metode.* Museum Tusculanum Forlag, 2011: 30
[23] Goldberg, 1979: 56

abstract and nonsense-based performances.[24] The birth of this new art form could be seen as commentary on the lack of meaning experienced from the War, of which they held the bourgeois society responsible.[25]

Figure 2: *Hugo Ball performing in Cabaret Voltaire, 1916.*

Erika Fischer-Lichte claims that in modern days, the true potential of performance art was first discovered through the Neo-avant-garde work *Untitled event* (1952) by performer John Cage (1912-1992).[26] Cage is especially known for his *4'33* (1952) where he performed a musical piece consisting of silence, of which he said "my favorite piece (…) is the one we hear all the time if we are quiet."[27] In *Untitled event,* an array of performances took place in a college dining hall within a choreographed

[24] Ibid, 58
[25] Danto, Arthur C. "Danger and Disturbation: The Art of Marina Abramović" in *Marina Abramović: The Artist is Present*, 2010: 29
[26] Fischer-Lichte, Erika. "Performance Art and Ritual: Bodies in Performance" in *Critical Concepts in Literary and Cultural Studies*. Edited by Philip Auslander, Routledge, 2003: 228-230
[27] Goldberg, 1979: 126

time bracket, although not having any narrative or causal relation to each other.[28] Fischer-Lichte describes *Untitled event* to be a "remarkable event in theatre history of Western culture."[29] This is because of the relationships it created between the audiences and the performers and the interactions between the different genre of the arts.[30] Fischer-Lichte claims this was the discovery or re-claiming of *the performative*[31], in presenting an option to the consensus of the 1950s scholars in that culture is produced and manifested in artifacts, such as texts and monuments.[32] Although the Dadaists could be seen as "forerunners" to this event, they differed with their focus on *shocking* the audiences. In *Untitled event* the performative mode was applied in order to liberate the audiences in their act of perceiving and creating meaning from the work.[33]

Although discussing the topic of origin, most art historians agree that our modern perception of performance art is heavily influenced by the performative artworks occurring during the 1960s and 70s, by artists such as Marina Abramović, who we return to in Chapter 2. Initially being cross-over work between theatre and painting, these artistic endeavors could be seen as growing from a wish to dematerialize art objects, in search for more conceptual strategies.[34] These ideas can be viewed in alignment with the movements in experimental theatre and dance scene of the time. Performance Art of the time included the absurd and comic actions of *Fluxus Artists,*[35] and the fun *Happenings* fronted by Artist Alan Kaprow (1927 – 2006). Henry M. Sayre (b. 1948) describe the Performance art of the 60s and 70s in America as initially being "intensely political in orientation."[36] Further, the performance art of the time is associated with the feminist and peace movement of the 1960s. The non-material nature of the performances can also read as protests against the market

[28] Fischer-Lichte, 2003: 228-230
[29] Fischer-Lichte, 2003: 229
[30] Ibid.
[31] Ibid, 230
[32] Ibid.
[33] Ibid, 231
[34] Sayre, Henry M. *The Object of Performance: The American Avantgarde since 1970s.* University of Chicago Press, 1992: 13
[35] Fluxus refers to performative work occurring in the 1960s, by artists such as John Cage, Yoko Ono, George Brecht and more. "It will never be possible or even desirable to pin down the full meaning of fluxus" (Smith, Owen. Fluxus: The History of an attitude, 1998: 227) but George Maciuanas described it as "a way of doing things ,very informal, sort of like a joke group." (Maciuanas, G. in Owen, 1998:226)
[36] Ibid, 14

economy of the art institutions, sale and mass-production[37].

We also find several examples of performance as political acts in contemporary art. Chinese Artist Ai Weiwei (b. 1957) performed via internet, through a blog criticizing the Chinese government and their censorship which made him an enemy of the Chinese state.[38] Political and controversial elements are also apparent in *Punk Prayer* **(Figure 3)** from 2012. Here, three members of the Russian punk group Pussy Riot was arrested after this performance where they performed music and screamed in the Church of Christ the Savior in Moscow, Russia.[39]

Figure 3: X Pussy Riot performing Punk Prayer in the Church of Christ the Savior in Moscow, Russia.

Throughout history, performance art has manifested itself as limitless. Performance art can be anything from Bauhaus-ballet like the historic *Triadisches Ballet* (1922)[40] by German Oskar Schlemmer (1888 – 1943) or the mesmerizing and grand-scale

[37] Sayre, 1992: 13
[38] See the Documentary *Ai Wei Wei: Never Sorry* (2012)
[39] Pussy Riot. *Pussy Riot!: A Punk Prayer for Freedom.* The Feminist Press at CUNY, 2013: Preface
[40] Watch an excerpt of a filming of the Triadisches Ballet
https://www.youtube.com/watch?v=87jErmplUpA (05.08.15)

theatre performance *Einstein on the Beach* (1976)[41] by the American Director Robert Wilson (b. 1941) and Composer Philip Glass (b. 1937). It involves "danger pieces", like the works of the American Artist Chris Burden (1946 - 2015) such as *Shoot*[42] (1971) where he had a gallery assistant "willing to grace his arm" by shooting it.[43] Further magnificent examples are the one-year performance *Time Clock Piece* (1980-81) by Chinese Artist Tehching Hsieh (b. 1950) who punched a time clock in his studio every hour on the hour for an entire year.[44] In German Artist Joseph Beuys' (1921 – 1986) *I like America and America Likes Me* (1974), the artists was taken from the airport by ambulance to the gallery space for the performance. There, he shared it with a wild coyote **(See Figure 4).** During the performance over three days, he proved his self-proclaimed shamanic talents of communicating with animals, and "a deep level of communication"[45] was witnessed between them. These are only a few examples conveying the message that performance art is only limited by the mind of the artist.

Figure 4: *Still photography from Joseph Beuys I like America and America likes me (1974)*

[41] Watch excerpt of Act 4 from the 2014' version of "Einstein on the Beach" https://vimeo.com/98333292 (05.08.15)
[42] Watch video of Shoot: https://www.youtube.com/watch?v=gwh-XMFMp8U
[43] Hoffmann, Fred and Lisa Le Feure. *Chris Burden.* Thames and Hudson, 2007: 29
[44] Smith, Terry. *What is Contemporary Art?* University of Chicago Press, 2012: 207
[45] Levy, Mark. "Altnerned Consciousness and Modern Art" in *Alternerning Consciousness: Multidisciplinary Perspectives*. Edited by Etzel Cardena and Michael J. Winkelmann. Praeger, 2011: 341

Central Components

In order to further understand the tradition *The Artist is Present* is part of, I elaborate on some components that performance theorists commonly associate with the genre of performance art. These components are presented as *the body*, *interaction* and *presence.* These present a glimpse into the discourse of performance art studies, and are illustrated by examples of different performance art pieces.

The Body

The performance artists starting out in 1960-70s was particularly concerned with the body as the material for creating art. Contemporary writers referred to it as *body art* or *body works*, in attempts to distinguish it from the broader term of performance art.[46] During these years, the body became the foundation for the artist' exploration of inter-subjectivity. It entered the art world in "a particular charged and dramatically sexualized and gendered way,"[47] as described by Amelia Jones.

In *Seedbed* (1972),[48] American Performance Artist Vito Acconci (b. 1940) laid masturbating under a ramp constructed in Sonnabend Gallery in Soho. Acconci let the audience on the floor above him listen to him verbally expressing his sexual fantasies, influenced by the sounds they made while attending the performance.[49] In American Performance Artist Carolee Schneemann's (b. 1939) work *Interior Scroll* (1975), the artist, with her face and body covered in strokes of paint, pulled a long, thin coil of paper from her vagina and read from it.[50] About this performance, Jones acknowledges how the female subject in this work becomes more than "a picture (…) but [rather] a deeply constituted (and never fully coherent) subjectivity (…) in relation to others in a continuing negotiated exchange of desires and identifications."[51]

---

[46] Jones, Amelia. *Body Art/Performing the Subject.* University of Minnesota Press, 1998: 13. Hence Schechner's definition p. 14
[47] Ibid.
[48] Watch excerpt of the performance at http://www.dailymotion.com/video/x7ygpc_vito-acconci-seedbed-1972_creation (05-08-15)
[49] Aronson, Arnold: *American avant-garde theatre: A History.* Routledge, 2000: 167
[50] Jones, 1998: 3
[51] Ibid.

The use of the body remains a central component of contemporary performance art pieces. In Iraqi-born artist Wafaa Bilal's (b. 1966) *3rdi*[52] (2010) the artist surgically placed a camera lens to the back of his head, as a commentary to surveillance. Further, in Bilal's *and Counting…* (2010), during a 24-hour performance the artist had one dot in red ink symbolizing every of the 5000s fallen Americans from the War in Iraq, and the 100,000 Iraqi in UV-inked dots, tattooed onto his back[53] **(See Figure 5).**

Figure 5: *Photo of the performance "and Counting" (2010) by Wafaa Bila*

Interaction

The component of *interaction* between the actor and the spectator could be argued inevitable in a performance art piece. To different degrees, performance art have been concerned with the relational aspects of involving the audiences. There are numerous examples of this in the work of Abramović, including *The Artist is Present* and *Rhythm 0* (1974), presented in Chapter 2. However, she is far from being the only artist interacting with her audiences. In the Japanese-American Artist Yoko Ono's (b. 1933) different performances of *Cut piece* (first performed in Kyoto, 1964), the artist

[52] http://wafaabilal.com/thirdi/
[53] http://wafaabilal.com/and-counting/

comes on stage and place a pair of scissors in front of herself. She asks the audience to, one by one, come on stage and cut of a piece of the clothes she was wearing. The performance would end when all the clothing was cut.[54] We find another historical example in *Yard* (first performed in 1961) by earlier mentioned Allan Kaprow. Kaprow is considered a central figure to the established significance of "Happenings,"[55] referring to audience participation performance work in the 1950 and 60s. In *Yard*, the artist filled a gallery space with tires and had the audience members both jump and crawl through the environment **(See Figure 6)**

Figure 6: Yard by Alan Kaprow, 1961.

[54] Yoon, Jean, Ono, Yoko. *The Yoko Ono Project.* Broken Jaw Press. 1994 & 2002: 54
[55] Buskirk, Martha, Kaprow's Vector in *Found Sculpture and Photography from Surrealism to Contemporary Art* .Edited by Anna Dezeuze & Julia Kelly. 2013: 79

In our times, one epic example of performance based on interaction is *When Faith moves mountains* (2002) by Francis Alÿs (b. 1959). In this performance, 500 volunteers equipped with shovels engaged in moving a gigantic dune of sand ten centimeters.[56] **(See Figure 7).**

Figure 7: "When faith moves mountains"(2002) by Francis Alÿs

In the latter examples, the aspect of interaction dominates the pieces. It facilitates a setting where the spectators become the actors within the work. Although the level of participation will vary from performance to performance, one could argue that to a certain extent all performances involve interaction. Schechner argues that "to treat any object, work, or product as "performance" (…) means to investigate what the object does, how it interacts with other objects or beings, and how it relates to other objects or beings."[57] His view argues that performances only exist as "actions, interactions, and relationship". This builds upon Schechner's conviction that performance happens in between these actions, as oppose to other forms of arts where

[56] Ross, Christine. *The Past is the Present: It's the future too.* Bloomsbury, 2012: 76
Watch a video of the process at http://www.francisalys.com/public/cuandolafe.html
[57] Schechner, 2013: 30

a painting or novel "take place" in a physical object.[58] This can be understood as that the performative work always will exist through the dimensions of the exchange between the people who are present in the setting of the performance. In other words, the element of interaction will always be present.

Presence

An important factor when discussing performance theoretically is the element of *presence.* This not only highlight *the aspect of time within the* performance artwork, but can also read in extension on Schechner's description of it being *in between*.

Peggy Phelan presented a celebrated notion of the aspect of presence in performance art by stating that "Performance's only life is in the present. Performance cannot be saved, recorded, documented or otherwise participate in the circulation of representations of representations, once it does so, it becomes something other than performance"[59]. Marina Abramović shares this view, and states that "Performance art is one of the most difficult art forms. The performance is really about presence. (…) You have to be in the here and now, one hundred percent"[60]

Here, Phelan and Abramović highlight the ephemeral qualities of any performance, which makes the efforts to document it rightfully, write about it or attempt to represent it, to a certain degree impossible. They present the problem of trying to capture what can not be captured: presence. This has resulted in larger discussions concerned with the role of documentation and the concept of re-performances, where artists engage in re-performing their own or others previous performances. Jones addresses the way in which this "(…)paradoxically reduces the celebrated "live" act to singular (and commodifiable) objects of display and exchange".[61] On this account, any photography of a performance piece, including those featured in this thesis should not be considered any form of "proof" or rightful representation of the performance art piece it displays.

---

[58] Ibid.
[59] Phelan, Peggy. "The Ontology of Performance." In *Unmarked: The Politics of Performance.* London: Routledge 1993: 146
[60] Abramović, Marina. "Marina Abramović on Performance Art" in *Marina Abramović: The Artist is Present*. Edited by Klaus Biesenbach. 2010: 211
[61] Jones, 2011: 21

Further, one can argue that there is no experience of "presence" to document at all. When Jaques Derrida (1930 – 2004) conducted his deconstruction of the philosophy of presence, he attempted to raise the specter of non-presence at the very core of every "present" moment. Here, presence is presented as a mere fantasy to anchor us in the now. The reason for this, is that "the presence of the perceived present (…) is continuously compounded with a non-presence and non-perception, with primary memory and expectation."[62] Derrida's deconstruction of our idea of presence suggest that the present is already gone, and therefore can not be experienced as such.

An art form based on the *presence* of human *bodies* in *interaction*, although being a simplified description, is thus impossible to comprehend fully through theoretical approaches. This does not, however, appear to intimidate the writers and scholars behind the vast amount of written works on the subject. Performance art, still being hard to both discuss, define and capture in academic work like this thesis, arguably remains one of the most striking forms of art.

Introduction to Neuroscience

During the last fifty years, a fusion of different approaches to the study of the *neurons* in the brain, including anatomy, physiology and chemistry have resulted in the establishment of a scientific field we today know as *neuroscience.*

Neuroscience is the scientific study of the nervous system in our body, which divides into the central nervous system and the peripheral nervous system. The first involves the cerebrum, the cerebellum, the brain stem and the spinal cord. In this thesis, I will focus on the cognitive mechanisms of the cerebrum.

On the macro-anatomical level, the cerebrum consists of two hemispheres containing the same anatomical structures. Nevertheless, the two hemispheres are far from identical. For instance, the main language areas are localized in the left hemisphere.

[62] Derrida, Jaques. *Speech and Phenomena and Other Essays on Husserl's Theory of Signs.* Trans. David B. Allison, Evanston: Nortwestern University Press. 1973: 65

The brain that in **Figure 8** is photographed from behind, toward the protruding occipital lobes, where the primary visual cortex is localized.

Figure 8. The human brain as seen from behind. Beneath the occipital lobe is the cerebellum.

The brain is strongly folded. This is a characteristic of the brains of advanced *Mammalia*, and, particularly of *primates*: the monkeys, apes, and the humans. The folding of cortex is the only way to keep with the fact that complex cognition requires large areas of the cortex, however restricted to 1350 cm; the volume of our skull. The folding organizes the brain surface into *gyri* (pl. for gyrus) and *sulci* (pl. for sulcus). The the gyri are mounting on the surface, and the sulci are the grooves between them.

The largest of the sulci divide the brain into separate lobes. We have the frontal lobe, the parietal lobe, the occipital lobe, the temporal lobe, with their respective cortical and sub-cortical structures **(See Figure 9).** The central sulcus separates the somatosensory areas in the postcentral gyrus from the motor areas in the precentral gyrus

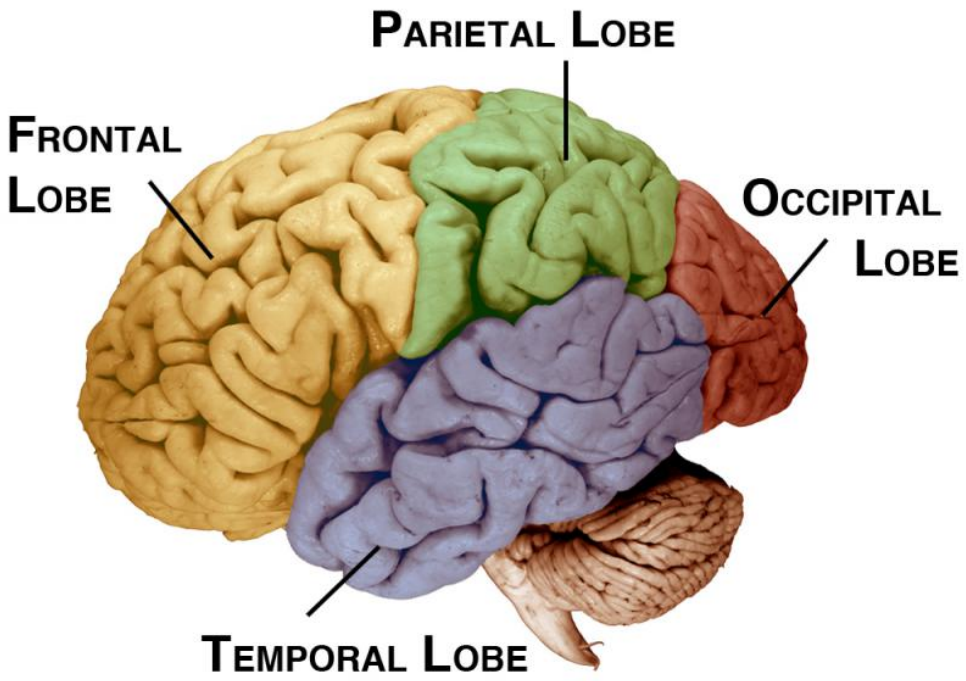


Figure 9. *The lobes of the human brain.*

The frontal lobe is concerned with advanced cognitive processes, such as decision-making. The parietal lobe includes neural networks for complex recognition of form, such as 3D; also the brain's symmetry network is, for the most part, localized within the parietal lobe. The occipital lobe includes our primary visual cortical areas.

When the early anatomists dissected the brain, they found that the outer surface was gray, covering an inner white substance. We still use the words white and gray substance to designate the two layers. The white substance is white because it consists of large bundles of nerve fibers, where most of the fibers are encapsulated in so-called *neuroglia*, cells that are wrapped around each nerve fiber, and, hence, provide them with an insulating layer of fat, physiological significant for rapid transmission of electrical impulses.

Bundles of nerve fibers cross from one hemisphere to the other through the so-called *commissures*. In **Figure 10** we see the large *corpus callosum*, which means "hard body", and the *anterior commissure*. The crossing fibers connect corresponding areas in the two hemispheres.

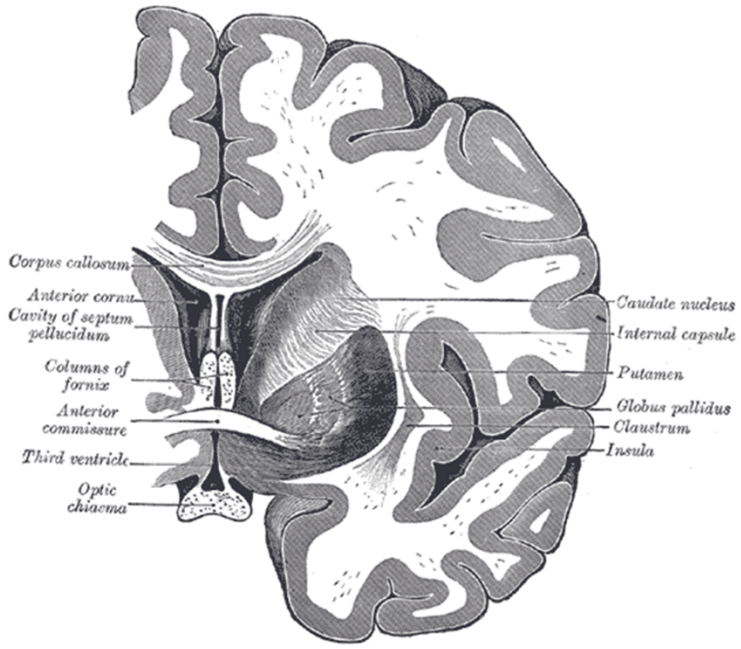


Figure 10. *Transverse section of the human brain.*

Gray substance, which is identical with what we also call the *cerebral cortex*, is grey because it consists of the so called nerve cell bodies (**Figure 11**), or *soma*, in which the cell nucleus, containing the DNA twisted into chromosomes, is located. The cell body also contains the synthesis apparatus for proteins, such as enzymes, structural proteins for the cell skeleton and many other sorts of proteins and peptides (small proteins, those with very few amino acids).

Radiating from this cell body are multiple dendrites, receiving inputs from a vast number of other nerve cells; leaving the nerve cell body is a single axon, which, in some nerve cells, is very long, leading from the brain to the spinal cord, while it, in other nerve cells may be very, very short. It is the connection between different types of nerve cells that constitute what we call the neural networks, including many different centers of the brain.

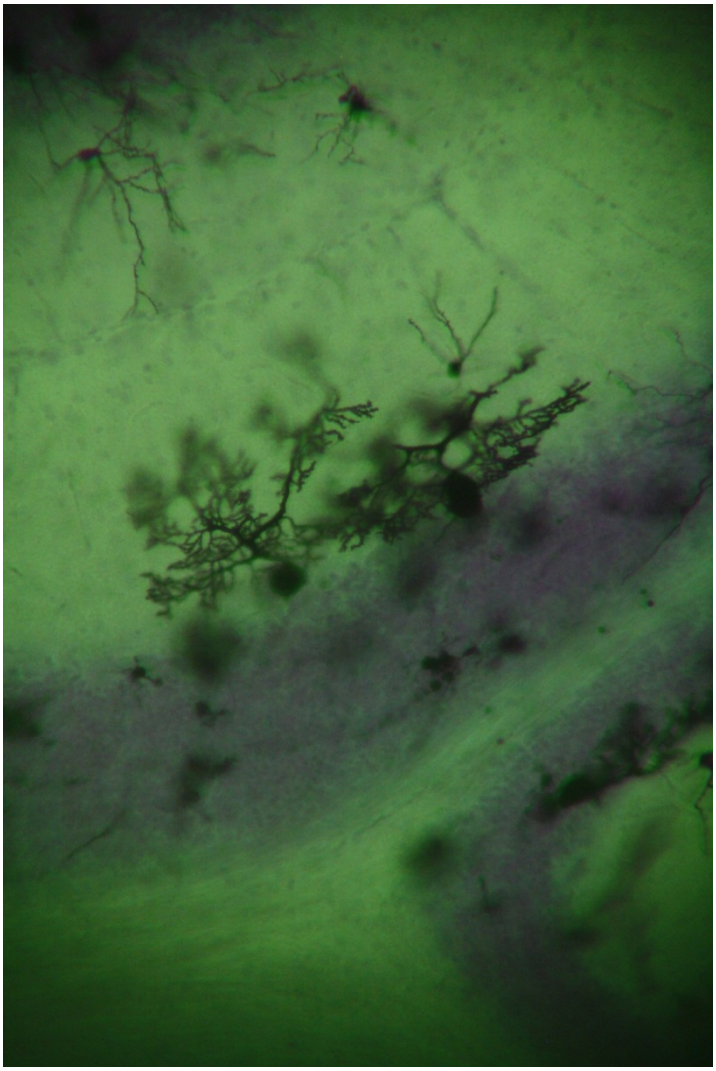


Figure 11. Nerve cells (Purkinje cells) of the cerebellum. Golgi stained by Boleslaw Srebro, Department of Physiology, University of Bergen.

Neuroscientific research is concerned with measuring and understanding how the brain works, in order to understand the neuronal mechanisms behind complex human behavior. However, the practice of attempting to understand the brain, described "the most complex piece of matter in the universe,"[63] is challenging. As a response to this complexity, neuroscience meets the phenomenon through a *reductionist approach*. This means that they reduce the complexity by breaking down a problem into smaller pieces for systematic experimental analysis.[64]

[63] Bear, Connors & Paradiso, *Neuroscience: Exploring the Brain*, 2007: 13
[64] Ibid.

This has resulted in different levels of analysis, depending on the complexity of the issue at hand. These levels are molecular, cellular, systems, behavior and cognitive neuroscience.

When approaching "The Artist is Present" with information provided by neuroscience, I am primarily applying information from the levels concerned with behavioral and cognitive neuroscience. Behavioral studies are concerned with how different neural systems, such as the "Visual system" i.e. the brain regions involved with sight, and the motor system producing our bodily movements work together.[65]

Cognitive neuroscience can be described as "grounded in the governing assumption that all cognitive functions arise from the physical, chemical and physiological properties of the brain and central nervous system."[66] This implies a belief that all differences between human beings will reduce to physical factors.[67]This this study of how "the activity of the brain creates the mind"[68] could be seen as the greatest challenge of neuroscience.

The field of neuroscience has been concerned with developing new technology that manages to measure the intricate systems of our brain. In order to better understand the methods through which the information presented in Chapter 4 is retrieved, I will here introduce the fMRI-scanner, which arguably has provided a boost of new information on how our brain works. It is the latest innovative invention of devices for brain imaging, following methods as the positron emission tomography (PET) and near-infrared spectroscopy (NIRS).

[65] Ibid.
[66] Postle, Bradley R. *Essentials of Cognitive Neuroscience*. Wiley Blackwell, 2015: 8
[67] Ibid.
[68] Ibid: 14

Functional magnetic resonance imagining (fMRI)

Revolutionary discoveries about all aspects of our brain have been a result of the imagining of functional magnetic resonance. Developed by Seiji Ogawa and Ken Kwong in the 1990s, the fMRI-scanner detects changes in the blood oxygenation level as a result of changes in neuronal activity. The more active an area is, the more oxygen will be consumed by the tissue around it. The physiological answer to the increased demand of oxygen is a dilatation of the blood vessels, which results in an increased blood flow to the active area. These changes are detected and visualized in the fMRI scanner, represented through a colour code of brain activity creating an activation map informing us of which regions of the brain are involved in a particular processing (See **Figure 12c**).

From only being able to record which areas are activated during particular tasks, we are today able to monitor which areas are co-activated, informing us about neuronal networks firing together during an execution of a particular task.

An example of the strong impact the f-MRI-scanner to modern science is the revolutionary discovery of *mirror neurons.* These nerve cells link *sensory* and motoric parts of the brain in a very particular manner, and they are found in monkeys and apes as well as in humans. They respond to the visual input by activation. **Figure 12** illustrates an ape looking at a man executing a grasping movement. In the brain of the ape, the mirror neurons are activated. The same neurons will also be activated ahead of a grasping movement done by the ape itself. The activation of the mirror neurons during pure observation of a movement will, however, not result in a real movement of the limb. What they do is to react *"as if"* in movement. A most significant implication of the discovery of mirroring mechanisms is that the simulation of action by the mirror neurons, the embodied activation, leads to our understanding of a movement executed by others.

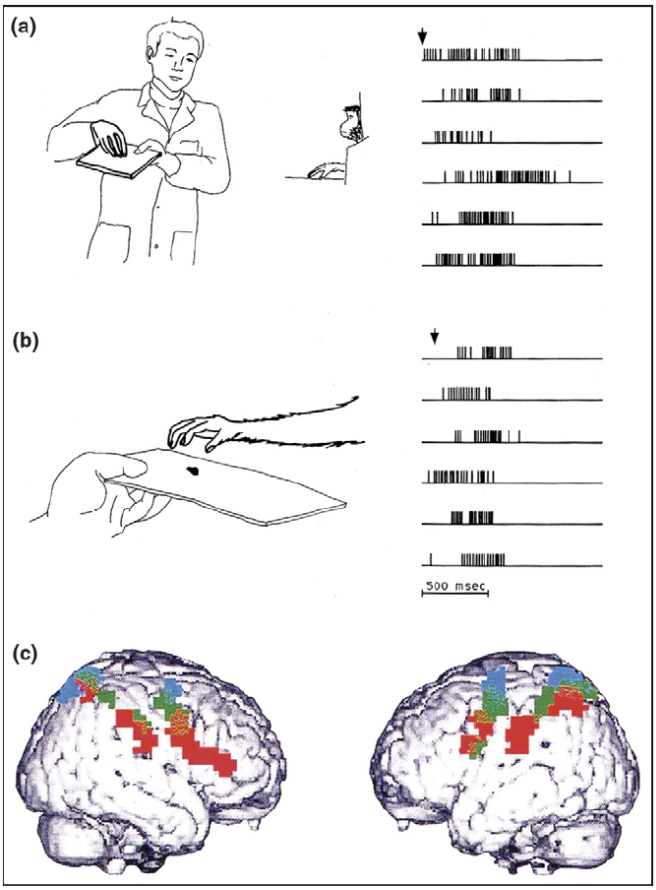


Figure 12. a) The firing pattern in the brain of the monkey when looking at the movement of the hand of the man. b) The actual firing pattern when the monkey is executing the same movement. c) The areas activated during mirror mechanisms: The inferior parietal lobule and the premotor cortex

The mirror neurons can even interpret the final intention behind a movement, even when the concluding stages of the movement are hidden from vision. Significantly, this motoric understanding also leads to an activation of our emotional nerve networks, leading to empathetic responses to what we see, whether it is an action taking place here and now, in a photo, or in a work of art. The mirror mechanisms are localized in the so-called *premotor cortex* (Brodmann area 44/45) and also in the *inferior parietal cortex*, as you can see in **Figure 12c**.

Vittorio Gallese and David Freedberg (2007) propose that a crucial element of aesthetic response consists of the activation of embodied mechanisms within the brain that are *simulating* actions, leading to corporeal sensations as well as emotions, and that these mechanisms are universal.

Figure 13. Francisco Goya. *Los Desastres de la Guerra* (Disasters of War: Biblioteque Nationale, Paris, France).

Embodied simulation in esthetic experience will also explain our empathy for pain. Freedberg and Gallese point, as one of their examples, to the etching of Goya **(Figure 13**), from *Los Desastres de la Guerra* (Disasters of War: Biblioteque Nationale, Paris, France). The viewing of images of punctured or damaged body parts activates part of the same networks that are normally activated by our sensation of pain[69]. This accounts for the feeling of physical sensation and corresponding shock upon observation of pressure or damage to the skin and limbs of others, as in this very dramatic art performance (**Figure 14**).

Figure 14. Marc McGowan nailing his foot into the gallery wall during the exhibition "The impossibility of art in the mind". Bergens Tidende 24.09.2012

[69] Freedberg, D. & Vittorio Gallese. Motion, emotion and empathy in esthetic experience. *Trends in Cognitive Science,* Volume 11, Issue 5. 2007.

But they will also be activated when we watch movements in every sort of performing acts, watching a ballet dancer 'turns our brain networks into that one of a ballet dancer.'

Neuroaesthetics

An offspring of the field of neuroscience, neuroaesthetics is concerned with how brain processes underpin aesthetic behavior.[70] By studying neuronal processes that underlie aesthetic behavior,[71] through the methodical approaches of neuroscience, this field approaches aesthetics in a distinct different matter then our tradition of approaching aesthetics through philosophy and history. Although experimental research on aesthetic phenomena is young, only having been carried out the last 25 years, the scientists within the sub-discipline of neuroaesthetics have presented several new ways to consider aesthetics.

An array of studies has been executed within the field of neuroaesthetics. We find one example in "How portraits turned their eyes upon us: Visual preferences and demographic change in cultural evolution" from 2013. Morin conducted a case study based on the hypothesis of "cognitive attraction"; suggesting that innate features of the human mind favor the direct eye-gaze, meaning when the eyes of the portrait look directly to the painter, as oppose to diverted eye-gaze. The study revolves around a selection of portrait paintings from two different eras and contemporary art books featuring these paintings. The findings of the study suggest that among the European portraits of the 16th century, the paintings where the gaze of the subject point directly to the spectator of the painting are more likely to be featured in today's art books. When studying the portraits of Renaissance Europe, the article suggests a gradual, strong growth and remaining prevalence of portraits staring directly at the viewer. Through a demographic analysis of the shift from averted gaze to direct gaze portraits, the explanation is found in the arrival of new painters, and their preference for direct-gaze portraits in their earliest works. The preference on direct gaze – perhaps shaped during their apprenticeship with more established artists – is also

[70] Skov, Martin & Oshin Vartanian. Introduction: What is neuroaesthetics?" in Neuroaesthetics. Edited by Martin Skov and Oshin Vartanian. Baywood Publishing, 2009: 2
[71] Ibid, 3.

shared with contemporary art critics.[72]

Neuroaesthetics has also led representatives within the field to offer new definitions of art. Professor in Neurobiology Vilayanur S.Ramachandran and his colleague William Hernstein have presented their theory of "eight laws of aesthetic experience", in an attempt to pin out "artistic universals" on how the artist works[73]. Ellen Dissanayake and Steven Brown presented a view of art as behaviur of "artification", which presents art as an activity, *to artify.*[74] It bases itself on the "universally observed penchant of human individuals (and groups) to "make ordinary reality extraordinary"[75]

As we will return to in Chapter 5, the emerge of neuroaesthetics has been both welcomed and banned from the art world. My approach to performance art through information from cognitive neuroscience presented in this thesis, could be placed in the landscape of neuroaesthetics. However, it differs to an extent, as it does not rely on neuroscientific measurements concerned with aesthetic behavior. The neuroscientific information presented here is mainly concerned with the neurological mechanisms involved in a certain act of human interaction, mutual gaze. In other words, I am not approaching "The Artist is Present" with the belief that I will unveil any aesthetics *thruths* about the work. However, I do approach "The Artist is Present" in this new manner, with the conviction that highlighting its central feature of mutual gaze from a neuroscientific perspective will illuminate new dimensions for our understanding of this particular performance artwork.

[72] Morin, Olivier. How Portraits turned their Eyes Upon us: Visual Preferences and Demographic Change in Cultural Evulution. Evulution & Human Behaviour, Volume 34, Issue 3. 222 – 229, 2013
[73] Ramachandran, Vilayanur S. & William Hernstein. The Science of Art: A Neurological Theory of Aesthetic Experience. *Journal of Consciousnes Studies* 6, NO. 6 – 7, 1999: 15.
[74] Brown, Steven & Ellen Dissanayake "The Arts are More Than Aesthetics: Neuroaesthetics as Narrow Aesthetics" in Neuoraesthetics. Edited by Martin Skov and Oshin Vartanian. Baywood Publishing, 2009: 44
[75] Ibid, 46

Chapter 2 – The Work: *The Artist is Present*

Figure 15: *Marina Abramović at the MoMa. Photographed by Marco Anelli*

The Artist

Marina Abramović **(See Figure 15)** considers performance art to be a ”mental and physical construction” she steps into, in front of an audience in a specific time and place[76]. She describes it as being based on the energy exchange between her and the audience, and that she does not want her audience to spend time with her just looking at her work. She wants them to be with her and “forget about time”. Abramović put emphasis the important role her audience play by stating that ”´(…) for me it is crucial that the energy comes from the audience and translates through me (…)”[77]

When Marina Abramović performed ”The Artist is Present” (2010) during her retrospective exhibition at the Museum of Modern Art (MoMA) in New York City, not only did she let her audience “be with her and forget about time”, but she also

[76] Abramović, 2010: 211
[77] Ibid.

shook the grounds of our art world. Further, the performance can be viewed as summing up her body of work.

Marina Abramović was born in former Yugoslavia the 30th of November 1946. Director of Museum of Modern Art Glenn D. Lowry (b. 1954) sees her "physical presence (…) a product of Yugoslavia (…) where "(…) much of her strength grows out of having been a child of parents who fought with Josip Brox Tito under brutally difficult circumstances"[78]. Raised in a family of war heroes, she lived according to her mother's strict rules until she was 29 years old. After risking her life in performances pieces that have become historical today, Abramović would make sure she was home before her curfew at 10 PM.[79]

Abramović began her artistic work by painting abstract clouds with shadows while studying at the Academy of Fine Arts in Belgrade[80]. However, the high risk and danger involved in her later work, already presented itself during her days of study. In the proposal of *Untitled* (1970) to Galerija Doma Omladine, Abramović wanted to dress herself in clothes her mother wanted her to wear, before she would load a gun, point it to her temple and pull the trigger. The proposal with "two possible endings" was however refused.[81]

Abramović abandoned painting in favour of installation based work revolving around sound. In "Metronome" (1971) she placed metronomes with different speed in five different rooms at The Museum of Contemporary Art in Zagreb., She considered metronomes to give sense of "time and presence" and helps us to "focus on the here and now"[82]. In "White Space" (1972) she asked the audience member to *listen* in a gallery space covered with white paper[83]. Here, the aspect of time manifested itself to become a crucial element in her later work.

[78] Lowry, Glenn D. "Foreword" in *Marina Abramović: The Artist is Present.* Edited by Klaus Biesenbach. Museum of Modern Art, 2010: 8
[79] Richards, Mary. *Marina Abramović.* Routledge, 2010: 9
[80] Westscott, James. *When Marina Abramović Dies: A Biography*. The MIT Press: 2010: 40
[81] Biesenbach, 2010: 49
[82] Ibid, 50
[83] Ibid, 59

Her first solo performance works are the *"Rhythm"*-series, which include her most iconic and shocking work "Rhythm 0" (1974) performed in Studio Morra, in Naples. Abramović placed 72 objects at a table, including lipstick, a whip, perfume, flowers, a feather, an apple and – a gun and a single bullet. She gave her audience the instruction that the 72 objects could be used on her as desired. Abramović maintained a passive position in the gallery as an object, but at the same time she claimed full responsibility for the situation.[84] As time passed, the audience members became impatient, and during the hours in the gallery they engaged in several shocking actions by amongst other undressing her, writing words on her body, and pouring cold water over her (**See Figure 16a and b**). The performance reached its crucial point when the gun was loaded, placed in Abramovićs hand and pointed at her neck. While this made the visitors, who were divided into groups of those who wanted to protect Abramović and those who wanted to have their fun, break out in argument, Abramović remained calm. When she finished her performance after the six hours planned, the audience members who were still with her departed quickly[85].About the performance, Abramović has said that "This was the only performance where I was really ready to die[86]"

Figure 16 a, b. Abramović performing "Rhytm 0" (1974)

[84] Ibid, 74
[85] Westscott, 2010: 76
[86] Kennedy, Randy. Self-Mutilation is the Sincerest Form of Flattery, *New York Times*, 2005.

After establishing herself as a solo performance artist, Abramović traveled to Amsterdam where she was assigned a guide to help her around town. His name was Frank Uwe Laysiepen (b. 1943), better known as Ulay[87]. This was the beginning of a passionate personal and professional relationship that would continue for the following thirteen years. Abramović's performative work in *The Artist is Present,* is related to her collaborative work with Ulay, and their performances of *Night Sea Crossings* (1981-87) **(See Figure 17)**

The performances of *Night Sea Crossing* was a result of artistic duos wish to see whether they managed to charge a space and an audience by doing next to nothing, "using their minds more than their bodies.[88]" They considered the act of sitting opposite each other and staring into each others eyes as the simplest form of human presence. In between them, a table was placed as both a marker of space and a clearing "in which their energy would manifest."[89] To the couple, the performances represented their faith "in the art of the 21st Century. No object between the artist and observer. Just transmission of energy"[90]. *Night Sea Crossing* was performed twenty-two times for a total of ninety days during six years, in different locations, such as a hole in the ground, public open spaces and in museums.[91]

Figure 17. A performance of "Night Sea Crossing" in Japan, 1985

[87] Westscott, 2010: 85
[88] WestScott: 2010: 165
[89] Ibid.
[90] Ibid. 189
[91] Biesenbach, 2010: 138 - 145

During their years together, Abramović and Ulay lived together in a van, traveled the world and performed several works. In *Rest Energy* (1980) **(see Figure 18)** they shared a bow and an arrow, in which the arrow pointed to Abramović's heart. Both leaning slightly backward, Abramović's life was depending on the precision and stamina of them both. In an earlier collaboration displaying the same element of possible fatal consequences, *Relation in Space* (1976), the couple performed the act of slamming their two naked bodies into each other in front of an audience. "It was horrible" describes American Artist Pat Steir (b. 1940). "Chris Burden hurt himself,[92] but this was two people hurting *each other.*"[93]

Figure 18: "Rest Energy" (1980)

The couple visited several cultures considered primal. In one visit to Bodhgaya in North West India, Abramović was healed by a Sufi-master after enduring training in meditation and fasting. Abramović remembers it as the time where she realized

[92] See p. 18 for Chris Burdens *Shoot*
[93] Westscott, 2010: 101

”anything can be done with the body.”[94] When the relationship between the two of them ended, Abramović went to Dharamsala in India, where the two of them had stayed before. This time alone, she remained in isolation at a retreat center for three months before completing her final work with Ulay, the grandeur performance of “The Great Walk” (1987)[95]. In this work, the two artists began walking from opposite sides of the Chinese wall. This three-month long performance ended with the couple finally meeting in the middle. The long journey across the wall was initially planned to result in marriage but ended up symbolizing the final departure between Ulay and Marina.

About the years following the splitting of the two, Abramović has said: (…) after I went through that experience, and all the pain of separation, there was a moment when I decided to stage my life and just have fun with it. I just said, why not; let’s have it all.”[96]Abramović became an artist concerned with her audience, as well as presenting both her life and herself, and establishing her position as a leading performance artist. This could be read from her work *Golden Mask* (2009), created one year prior to *The Artist is Present.*

Figure 19: Golden mask (2009)

[94] Westscott, 2010: 172
[95] Ibid, 197
[96] Camhi, Leslie. “Grand Gestures; Out of Sight,” *Vogue* 195, no. 11 (Nov 2005): 228 (Referenced in Biesenbach, 2010)

I experienced *Golden Mask* **(See Figure 19),** at the Kistefos Museum in Norway, fall of 2014. The work is a 30 minute video piece of Abramović's face covered in a thin layer of honey and golden leafs, lit by powerful lighting. The video image is surrounded by dark nothing, which increase the effect of the powerful gaze pointing at the spectator. The loop of the video ensures that she never blinks. The only movement in video image is the light moving over the thin layers of golden leafs, causing them to shine brighter. Greeks and Egyptian Pharaohs were buried in these golden death masks, as a symbol of their royalty, the heightened, holy and wise[97].
In other words, Abramović presents herself as strong, in the traditions of the holy. Like a golden skull of skin and hair, she offers a mesmerizing gaze captivating me as a spectator. I remain staring into her eyes, and although it is only video imagery, both the gold and her steady gaze appears strikingly powerful. I found myself thinking that *Golden Mask* could be Abramović's indicator of what was to come when she performed *The Artist is Present* one year the later. The crowning of Abramović as a heightened, almost holy figure in the contemporary art world.

The Marina Abramović Institute (MAI)

Before elaborating on the subject of this thesis, *The Artist is Present,* I shortly describe Abramović's current project of opening an institute for preservation of performance in a former theater located in Hudson, New York. According to its website, *The Marina Abramović Institute (MAI)* is a "platform for immaterial and long durational work,"[98] including performance art, dance, theatre, film, music, opera, science, nature, technology and "undiscovered forms that may be discovered in the future."[99] MAI Hudson, which is the physical Institute, will be dedicated to presenting work that lasts six hours or longer.[100] It will also present exercises that Abramović has developed during the last forty years, to "explore boundaries of body and mind"[101].

Training in the *Marina Abramović Method* will demand the visitor to give up freedom in order to experience freedom by signing a contract with the Institute, turning in their

[97] "Entering the Other Side", Kistefos Museum, 2014: 22
[98] MAI-website http://www.mai-hudson.org/about-mai/ per 05.08.15
[99] Ibid.
[100] See different long-endurance performances at http://www.mai-hudson.org/immaterial#ldw (05.08.15)
[101] Ibid.

personal belongings and devoting six hours to the experience. After putting on a white lab coat, the visitor will participate in different exercises. This involves being wheeled around in chairs, walking with sound-reducing air phones, sitting face to face with one another on wooden chairs, and spending a longer period of time in a room of crystals.[102] All exercises in which can be traced back to previous work by Abramović.

While the Institute is being built, MAI has been involved in several collaborations, including *Terra Comunal* (2015)[103] featuring performances and lectures in Brazil, and collaborations with neuroscientists. On the account of the latter, in the web movie ”Out of the lab” (2014) Institute director Serge Le Borgne says ”(…) The big risk of creating this [The MAI] is that it will become a museum (…)”, following with the question ”(…) What if artist working with the scientist? (…) They’ll create something different (…) All [art and science] have the same objective when they’re good: try to save the world[104]” From this belief, MAI is developing different project prototypes. One of these are *”Measuring The Magic of Mutual Gaze”* (2012) **(See Figure 20),** a room of the Garage Center for Contemporary Culture was turned into a scientific lab. Here, two people could sit facing each other equipped with EEG-headsets. On the screens above their heads, the audience could watch animations of two brains, correlating with the activity of the two people. The areas where activation was measured immediately lit up with white light. Whenever the same activations were measured at the exact same time in both brains, an electric beam between them could be seen on the screen.

[102] MAI-website http://www.mai-hudson.org/mai-hudson/ (05.08.15)
[103] View the different events of Terra Comunal (2015) at http://www.mai-hudson.org/terra-comunal/ (05.08.15)
[104] Video http://www.immaterial.org/content/2014/6/9/out-of-the-lab

Figure 20. Measuring the Magic of Mutual Gaze (2012)

The Work: "The Artist is Present" (2010)

Figure 21. Photography by Marco Anelli from "The Artist is Present", 2010

The performance *The Artist is Present* (2010) **(See figure 21)** took place in the Donald B. And Catherine C. Marrion Atrium at the Museum of Modern Art in New York City. It was part of a retrospective exhibition with the same title as the performance, presenting approximately fifty of her works representing a span of four decades.[105] Curated by Klaus Biesenbach (b.1967), the exhibition is the largest retrospective devoted to one single performance artist and was open to visitors from March 14 to May 31, 2010. In the center of it all, was the performance of *The Artist is Present.*

> ”I decided that I want to have a work that connects me more with the public, that concentrates…on the interaction between me and the audience. I want to have a simple table, installed in the center of the atrium, with two chairs on the sides. I will sit on one chair and a square of light from the ceiling will separate me from the public. Anyone will be free to sit on the other side of the table, on the second chair, staying as long as he/she wants, being fully and uniquely part of the Performance. I think this work [will] draw a line of continuity in my career”[106]

These words were written by Marina Abramović to her curator, Klaus Biesenbach on May 23, 2009 about how she envisioned the performance of *The Artist is Present.*[107] Due to a moment of high inspiration, the artist changed the entire concept of the performance originally planned to consists of scaffolds of seven platforms in which she would move between[108].

Curator Biesenbach suggests the changes being a result of their meeting at a benefit luncheon the day before. Here, the artist and her curator spent time with Michael Heizer’s *North, East, South, West* (1967/2002). The work consist of four different negative forms recessed in steel in the ground, articulating sculpture with void ”by absence rather than presence”[109]. This made Abramović think of the earlier mentioned *Nightsea Crossing* performance from Japan in 1985 with her former partner Ulay (See **Figure 17**, p. 38). This performance was influenced by Abramović reading Mircea Eliade’s (1907 – 1986) studies of world religions stating that in Buddhism “(…) in

[105] http://www.moma.org/visit/calendar/exhibitions/965
[106] Danto, Arthur C. Sitting with Marina, *The Stone* 05-23-2010
[107] Ibid.
[108] Ibid.
[109] Biesenbach, Klaus. “The Artist is Present, The Artist Was Present, The Artist Will Be Present” in Biesenbach, 2010: 12

pursuit of the Way the prime essential is sitting"[110]. Before parting ways after the luncheon, Biesenbach recalls Abramović mentioning passages from an interview with the Dalai Lama. It was about the concept of emptiness as a form, whereas Biesenbach mentioned James Lee Byars's *The Table of Perfect* (1989), a pure marble, cubic meter covered with gold leaf, as a counterpoint to emptiness.[111] The conceptual changes Abramović presented in her letter, written only ten months prior to the opening of "The Artist is Present" were kept. Perhaps was it also influenced by a moment in her re-performance of artist Valie Exports' (b. 1940) *Action Pants: Genital Panic* (1989) during Abramović's performance series *Seven Easy Pieces* (2002), where she "engaged in a prolonged (…) stare with somebody, and they were both left in tears"[112]

When the first visitors made their way up to the Atrium the opening day at the MoMA, they were not only met by the artist and a large space for them to fill **(See Figure 22).** Marina Abramović sat on a chair, facing an empty table and an empty chair. These wooden furniture were placed in the center of a space within the space, defined by tape laid in a square on the floor. The scenario was lit by four klieg lamps, contributing to the separation of the performance area from the audience area. The latter could either watch the performance from the many different floors of the museum, like a modern-day *Teatro Olimpico*, or join the L-shaped line around the square[113] featuring the performance **(See Figure 22).** . Amongst the visitors were camera crews, documenting every second of the performance. The area was watched and secured by guards of the museum

[110] Westscott, 2010: 165
[111] Ibid.
[112] Westscott, 2010: 292
[113] Danto, 2010.

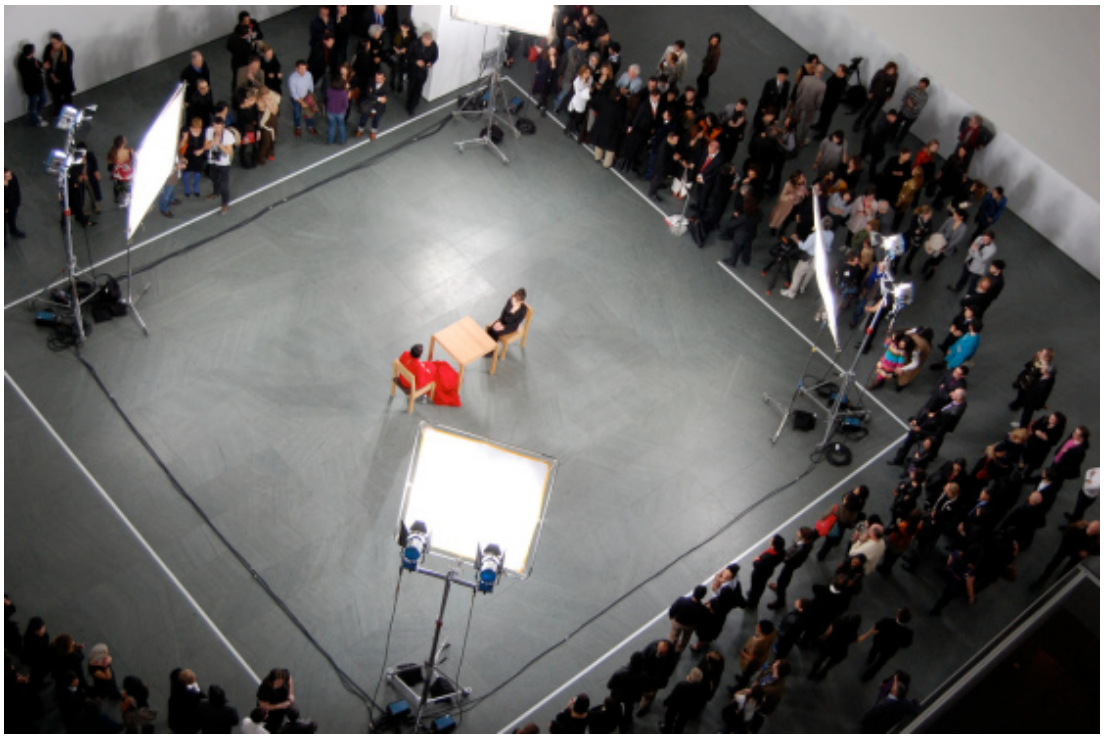


Figure 22. *The Artist is Present seen from above.*

The audience member would stay in line for an unknown amount of time in order to sit in front of the artist. Curator Biesenbach states in the documentary of the performance, that "(…)There are no rules.[114]" However, upon entering the performance space, the audience member was told the numerous rules of the performance: No disturbing… no gestures of any sort… You don't speak to the artist, no hands"[115]. Breaking these rules would cause the participator to be immediately removed by the museum guards.

Approximately ten seconds after the audience member prior to them left, the visitor could enter the square.[116] While the audience member found his or her seat, Abramović sat with her face pointing down. Then, Abramović would raise her head and place her gaze into the eyes of whoever sat in front of her. Behind Abramović, the participator could notice the marked number of days the artist had sat at the MoMA **(See Figure 15, p. 35).** The participator and the artist then engage in the act of mutual

[114] *"The Artist is Present"* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[115] Ibid.
[116] Tóibín, Colm. "Still Drama: Marina at MoMa." *The New York Review of Books*, 04-21-2010

gaze for the amount of time the participator wished. One visitor sat with her for the entire day, much to the frustration and dismay of the static line of hopeful audience members.[117] The rule was however changed the last day of the exhibition, giving each audience member fifteen minutes of sitting time with the Artist.[118]

In ”The Artist is Present”, no words were allowed uttered between the Artist and the audience member. This left the two of them to communicate with nothing but their gaze. When the audience member left the chair, Abramović would once again lower her head to face down. In this way, Abramović never looked anywhere else than into the eyes of the person in front of her.

Abramović sat on the chair during the museum opening hours for the entire exhibition period of two and a half months or 731 hours. During the period she wore her hair in a braid placed on the left side to her face. She alternated in wearing three different dramatic dresses in white, red or blue that covered all of her body but her head and hands. During the exhibition period, Abramović decided to have the table removed, leaving no obstacle between her and the audience member.

The Reactions

”I feel like Marie Antoinette walking to get her head cut off (…)”[119], Abramović told the cameras just moments prior to entering the atrium and sitting down for the first day of the performance. MoMA’s heavy marketing of the exhibition, including gigantic posters of Abramović’s face all over New York City, and a plan of streaming the portraits of the participators online suggest that the museum anticipated success. However, the creators behind it put emphasis on the high, possible risk of the performance: The Artist sitting with an empty chair.[120]

The chair was never empty. During the exhibition period, 1450 individuals sat with the artist. The documentary made from the exhibition show visitors running up stairs to get first in line. In order to increase their chances of sitting with Abramović, some

[117] Danto, “Sitting with Marina”. *The Stone* 05-23-2010
[118] *The Artist is Present”* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[119] Ibid.
[120] Ibid.

visitors even slept outside the museum the entire night after leaving the exhibition the day before.[121] People spent hours in line, getting acquainted with one another,[122] not knowing when or whether they would get the chance to sit with Abramović. One woman sat with Abramović for one entire day, much to the dismay of the others in line. Others returned to sit multiple times.[123] The rough estimate of average sitting time for each visitor is believed to be 20 minutes.[124]

All participants in "The Artist is Present" were photographed and represented as portraits by photographer Marco Anelli (b. 1968)[125] **(See figure 1, p. 7).** Their picture was posted online to the daily feed at the MoMA website, including the time they spent within the performance. The feed had close to 800,000 hits. The unofficial Flickr-site titled "Marina Abramović Made Me Cry" had a number of hits close to 600,000 by the end of the exhibition.[126] The online coverage secured the phenomenon of spreading far beyond the white walls of the MoMA's atrium, engaging users of social media, including those who were not able to participate *IRL.*[127] Social media and newspapers coverage of celebrities sitting with Abramović are also believed to have awake interest for the performance in a younger audience, who had little to no knowledge about Abramović or her work.[128]

The total number of 561,471 museum visitors set – together with exhibitions of Monet's *Water lilies* and the exhibition of work by movie director Tim Burton amongst others – a new record for attendance hits in a year for the MoMA, ranging at 3.09 million during its 2010 fiscal year.[129]

Not only were the reactions to the work impressive in numbers, but also in the expression one could read from the published photos of the visitors' faces. Some

[121] Orton, Karen. "Marina Abramović is Opening A School", *Dazed Digital*, 08-09-2013.
[122] Brekke, Aase-Hilde. Meditativt Nærvær? Masters Thesis, *University of Oslo*, 2012: 127
[123] Danto, 2010.
[124] Ibid.
[125] Anelli, Marco. *Portraits in the Presence of Marina Abramović,* Museum of Modern Art, 2012.
[126] Cotter, Holland. "700-Hour Silent Opera Reaches Finale at MOMA", *New York Times* 05-20- 2010.
[127] Internet slang for *In Real Life*. Tells of actions happening in real life, as oppose to *online*. Included in the virtual aspects of the performance, we find the possibility of playing the hilarious video game version of "The Artist is Present" by Pippin Barr at http://www.pippinbarr.com/games/theartistispresent/TheArtistIsPresent.html
[128] Sooke, Alastair. Marina Abramović: 'It Takes Strong Willpower to Do What I Do", *The Telegraph*, 07-02-2011.
[129] Orden, Erica. 2010. "MoMA Attendance Hits Record High", *The Wall Street Journal* 06-29-2010

smiling, some looking deeply concentrated or serious, many crying. The performance attracted people of all backgrounds and ages, ranging from one-time visitors who unknowingly stumbled upon the performance to performance artists seizing the opportunity for exposure.[130]

One man returned to sit with Abramović 21 times, a number he later tattooed on his arm.[131]This man, Pablo Blancas claim to experience Abramović as ”a catalyst who ”presses the button that makes you feel all these emotions and feelings.” And added that the tears flowing from his eyes when meeting Abramović were “tears of joy – at least most of the time.”[132]

The simple act of strangers staring each other in the eye, described tongue-in-cheek as ”one of the final taboos of modern New York”[133] stirred great emotions within many. One clip from the HBO-documentary shows a young boy sitting down on the floor, crying and appearing confused after sitting with Abramović. His mother, first frightened by the boy’s reaction, later embraces him and tells him how proud she is.[134]

One audience member, referred to as Mr. Chowdhury, had the following to state about his experience: ”Five hours waiting for 20 minutes, and it was worth everything. The minute you sit in the chair, you enter the world” When a stranger asked if he noticed the audience, Chowdhury replies ”Not when I was there”[135]. Carolina Miranda describes the same experience, and writes: ”When I finally sat down before Abramović, the bright lights blocked out of the crowd, the hall’s boisterous chatter seemed to recede into the background, and time became elastic”[136].

Another participant, Dan Visel, aged 32 says ”Time was passing, but I couldn’t tell.

[130] *The Artist is Present”* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[131] Greenwood, Elisabeth. “Wait, Why Did That Woman Sit in the MoMA for 750 Hours?, *The Atlantic* 07-02-2012
[132] Stanley, Caroline.”Meet the Man Who Sat With Abramović 14 Times”, *Flavorwire* 05-10-2010.
[133] Dwyer, Jim. “Confronting a Stranger, for Art”. *NY Times*, 04-02-2010.
[134] *The Artist is Present”* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[135] Dwyer, 2010.
[136] Miranda, Carolina. “Ascetism as Art: Sitting Silent with Marina Abramović,” *WNYC Radio Station* 03-12-2010

The overwhelming feeling I had was that you think you can understand a person just by looking at them, but when you look at them over a long period of time, you understand how impossible that is."[137] Then he adds "I felt connected, but I don't know how far the connection goes."[138] Another visitor, Rebecca Taylor experienced on the other hand an intimate connection and wrote that "I've heard it said that couples married for decades can sit in silence and understand one another perfectly, but I'd never imagine that sort of intimacy could be possible between two total strangers. It is."[139]

James Westscott, an acquaintance of Abramović and the writer of one of her biographies, describe his experience as becoming "Immediately stunned"[140], but " (…) not by the strength of her gaze, but the weakness of it. She offered a Mona Lisa half-smile and started to cry, but somehow this served to strengthen my gaze; I had to be the mountain"[141].

Art Historian Arthur C. Danto sat with Abramović for ten minutes and shared the following experience:

> I ventured to signal "hi" with a wave", which aroused in Marina a week smile. At this point, something striking took place. Marina leaned her head back at a slight angle, and to one side. She fixed her eyes on me without – so it seemed – any longer seeing me. It was as if she had entered another state. I was outside her gaze. Her face took on the translucence of fine porcelain. (…) For me at least, it was a shamanic trance – her ability to enter such a state is one of her gifts as a performer."[142]

Another visitor, novelist Colm Tóibín, writes "Whatever she was doing, Abramović was causing a line of energy that made laughter, mockery, irony into matters that

[137] Dwyer, 2010.
[138] Ibid.
[139] Taylor, Rebecca. Marina Abramović: The Artist is Present. *Online Essay at Khan-Academy*
[140] Westscott, James. "Artist Marina Abramović: I Have to be like a Mountain", *The Guardian* 03-19-2010.
[141] Ibid.
[142] Danto, 2010.

were beside the point"[143]. Also experiencing Abramović as vulnerable, he describes Abramović's face as "of someone who has recently died"[144] in that it "can seem to flicker or move, so too her face seemed at times infinitely suggestive and vulnerable"[145]. Before adding "But it was also sexual, sensuous, spiritual, and that made me both fascinated and uncomfortable[146]." Like many others, Tóibín became aware of time, and writes about the experience that "It made me feel that I could spend the day there opposite her, and maybe the next day too, and it also made me want to go, it made me consider at what point I would leave."[147]

A large number of visitors. Immense coverage by media and social media. Hoards of people sleeping in line outside the museum. Countless hours spent in viewing and cueing for the performance, with an uncertainty of whether Abramović would make it through the whole period or faint from exhaustion at any point.[148] From all this and the span of emotion displayed on the faces of it's participants, it is safe to state that *The Artist is Present* became one of the grandest art phenomena of contemporary times. Art Critic Charlie Finch described the performance to not only "have an impact on the cultural world at large,"[149] but also claiming it to be "as distinctive and potentially influential as the debut of Stravinsky's *Rite of Spring* or the opening of Samuel Beckett's *Waiting for Godot*"[150]

However, as we will return to in the following chapter, Abramović's work has also evoked less enthusiastic reactions. One critic, Jerry Saltz, says he is "of two minds about this show"[151] before describing it as "narcissistic, exhibitionistic work, and it has brought out the crowds' own narcissism and exhibitions, in a self-fulfilling feedback loop. (…)"[152]Saltz continues with ideas of whether museums have "merged with the age of reality TV, where everyone's life is art"[153], and points out that the

[143] Tóibín, 2010
[144] Ibid.
[145] Ibid.
[146] Ibid.
[147] Ibid.
[148] Cotter, 2010.
[149] Finch, Charlie. What Marina Wrough, *Artnet*
http://www.artnet.com/magazineus/features/finch/marina-Abramović6-3-10.asp
[150] Ibid.
[151] Saltz, Jerry. In the end it was all about you, *New York Magazine,* 05-21-2010
[152] Ibid.
[153] Ibid.

participatory sculpture, which is a common trait to performance art ”extends celebrity to everyone”[154] or that ”maybe it’s just institutions fighting for market share[155]”. However, Saltz describes the ways people have engaged with the work is as intense and profound as their interactions with paintings and sculptures.”[156] Saltz ends his article by reflecting that ”(…) as hokey and self-centered as ”the Artist is Present” sometimes is, it also tells us that when sensationalism takes center stage, it Abramović have to be flashy, tacky, shocking and silly. Well, maybe just a little bit silly” Saltz, although visiting the exhibition did not participate in “The Artist is Present” himself.

[154] Ibid.
[155] Ibid.
[156] Ibid.

Chapter 3: The Art Theoretical Understandings

The Reception of *The Artist is Present* in the art world has evoked an array of differing views on what this work represents and how it is to be understood. Here, I summarize and discuss what I consider to be the dominating main lines in documentation concerned with understanding *The Artist is Present.* I divide the views into two differing *understandings*, based on cultural and sociopolitical theoretical approaches.

The Cultural Understanding of "The Artist is Present"

The last line of Abramović's letter to Biesenbach read "I think this work (will) draw a line of continuity in my career."[157] First and foremost, the performance can be understood as consisting of references from Abramović's previous works through aspects of long-endurance, eye contact, audience participation and dimensions of time.

The possibility of "The Artist is Present" "changing our aspect of time"[158] is presented by Abramović and Biesenbach when addressing the element of *endurance* in the performance. This not only draws a line to Abramović's own work, including *The House with The Ocean View* (2002) where she lived silently in a gallery for twelve days[159], but also to other *long-endurance performances.* Amongst notable works we find Mary Ellen Carroll's (b. 1961) *Nothing* (2006) where the artist traveled to Argentina with nothing but the clothes on her back and a passport and stayed there for six weeks,[160]Other examples incluce Hsieh's earlier mentioned *Time Clock Piece* and Chris Burdens *Bed Piece* (1972) where the artist laid silent in a bed inside an art gallery for 22 days.[161]

The historical act of sitting still in "The Artist is Present" can also be traced to modern political protests; sit-ins staged during the American Civil Rights Movement

[157] Danto, 2010
[158] *The Artist is Present"* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[159] Biesenbach, 2010: 180
[160] Carroll, Mary Ellen. Flatley, Jonathan. Walker, Hamza. *MEC*. Steidl, 2010, p.179
[161] Hoffmann, 2007: 215

of the 1960s and strategies of Mahatma Ghandi (1869 – 1948) during the struggle for India's independence.[162] Viewing "The Artist is Present" in this way, the long-endurance sitting of Abramović can be seen as a protest – and in this case possibly against our modern, fast-paced times.

When Abramović and Ulay performed "Night Sea Crossing" in the city in 1986, Abramović was quoted in New York Times of what this performance, that "represented their faith in the art of the 21st century" meant in a place like New York. "People are overloaded in cities. There is too much to think about, too many telephone calls. People are not capable of relaxing. They felt guilty if they sit for three minutes and they aren't doing anything. This is showing another way."[163] 24 years later, while reflecting upon the contextual frames of "The Artist is Present", Abramović views our times in similar matter: "(…) How we are so alienated from each other. How the society make us really distant. You know, we are texting each other messages without seeing each other, and we just live around the corner from each other. So many stories of loneliness (…)[164]

In the midst of this world, Abramović places herself as a calm eye of the storm. Doing nothing but sitting still, and through this perhaps does everything. "(…) I have to be the silent in the middle of hell. I have to be mountain (…)"[165] she tells the cameras in the documentary about the performance.

In an article featured in the Exhibition Catalog for "The Artist is Present", Art Curator Chrissie Iles points out how very few could endure what Abramović manages. Iles describes the impassiveness of the artist in the performance at the MoMA as "only retained through a highly disciplined mental and physical concentration forged by her long experience in strict meditative practice (…), and by thirty-six years of performances involving stillness and silence maintained for long periods of time."[166]

---

[162] Biesenbach, 2010: 15
[163] Westscott, 2010: 189
[164] *The Artist is Present"* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[165] Ibid.
[166] Iles, Chrissie. Marina Abramović and the Public: A Theater of Exchange. In Marina Abramović: The Artist is Present, edited by Klaus Biesenbach, p. 40-43. New York: Museum of Modern Art, 2010. 41

Despite the extensive meditative training, the performance was still demanding for Abramović. ”Your shoulders drop, your legs swell, your ribs sink down into your organs. (…) Strategic breathing helped. So did out-of-body experiences. (…)[167]” she shared in post-performance interview, continuing with ” (…)If it was just for my own self-realization, I would never have had this energy (…) but if I do it for the public I can bring a higher motivation”[168]. The element of energy is necessary for Abramović when performing. When asked at the premiere of her documentary of ”The Artist is Present”, if she believed in God, she answered: No, but I believe in energy.”[169]

The Shaman is Present

Art Historian Thomas McEvilley has noted on account of her previous work that “Abramović describes experiences of enfolding energy, energy fields surrounding her and the audience, a trancelike state of attention, and energy vibrations that, emitted from her during performance, tangibly reshape the energy of the environment around her…”[170]McEvilley acknowledges her abilities to engage with energy, continuing with ”Not only her ability to connect with special high-intensity modes of energy, but even more her desire to do this for a group of people who, without her presence, would themselves lack the ability, sounds like a shamanic performance”.[171] In other words, the pain of endurance and her connections with the energies is by Abramovic claimed to make her reach an experienced higher-level of being.

Arthur C. Danto shares the idea that Abramović possesses these shamanistic talents. After the 2007 re-enactment of her performance ”Lips of Thomas”, he claims that the *shamanistic* exercises of the performance would in more primitive cultures have accredited Abramović with ”great powers,”[172] and that she ”perhaps should be

[167] The Artist was here, *The Economist* 09-15-2010
[168] Ibid.
[169] Vizcarrondo, Sara. At the Present Time: Matthew Akers on ‘Marina Abramović, *International Documentary Assosciation* ,2012
[170] McEvilley, Thomas. “Stages of Energy: Performance Art Ground Zero”, in *Abramović Artist Body*, 1998: 22
[171] Ibid.
[172] Danto, 2010: 32

accredited with this today."[173] Further, as mentioned in the previous segment of testimonials, he experienced Abramović in *The Artist is present* like being in "a shamanic trance"[174]

The idea of what the ancient tradition of *Shamanism* consists of is scattered and fragmented, according to Social Anthropologist Pier Vitebsky (b. 1949). He writes that "Shamanism is not a single, unified religion, but a cross-cultural form of religious sensibility and practice"[175], before acknowledging the "astonishing similarities"[176] between societies unfamiliar from one another, that together with the shaman practices shamanism. Although this means that the significance and characteristics of the shaman will vary, he is regarded as having access and influence on the world of "good and evil spirits."[177]He performs by typically entering a trance state during a ritual and practicing divination[178] and healing[179]. The traditions of Shamanism derives from prehistoric times, where practices that can be considered as shamanistic have been noted as the first *theatrical* performances. Archeologist Yann-Pierre Montell writes that. (…) Theatricality, as practice, finds its first tangible evidence in the deep caves of the Upper Paleolithic, at least 17,000 years ago."[180]

The emphasis put on the element of energy in Abramović's work and the idea that Abramović possesses shamanistic talent is shared by several art historians concerned with her work. Understanding "The Artist is Present" in this matter, would be to understand Abramović's presence as different from ours, due to her unique combination of experience, training in meditation and understanding of energy. It would also mean to place her in line with our oldest known tradition of seeking connection to our creation. Could the strong reactions "The Artist is Present" had on its participants be understood as a result of shamanistic qualities in Abramović's presence? That sitting before the artists, looking into her eyes connects us to special

[173] Ibid.
[174] See footnote 152,p. 50
[175] Vitebsky, Piers. *Shamanism*. University of Oklahoma Press, 2001:11
[176] Ibid.
[177] *shaman*, in Oxford Dictionary, http://www.oxforddictionaries.com/definition/english/shaman
[178] Divination refers to "the practice of seeking knowledge about the future or unknown"
[179] Ibid.
[180] Montelle, Yann-Pierre. *Paleoperformance: The Emerge of Theatricality as Social Practice*. Seagull Books London, 2009: 2

high-intensity modes of energy?

Fischer-Lichtes' *Transformative Power*

This understanding of "The Artist is Present" could be viewed in alignment with a new aesthetic perspective on performance art, presented by Erika Fischer-Lichte. First and foremost, the live performance is seen as a co-construction by the presence of both actors and spectators. In "The Transformative Power of Performance: A New Aethstetics" (2008), she describes this aesthetic experience enabled by theater and performance art as a *liminal* experience.[181]

When describing the liminal experience, Fischer-Lichte uses the example of *Imponderabilia* (1977) **(Figure 23)** by Abramović and Ulay. Here, the gallery visitor could only enter the gallery by passing through the naked bodies of the performers standing in the doorway. In this performance, the entering, crossing and leaving the threshold, the very experience of the transition itself, became the performance.

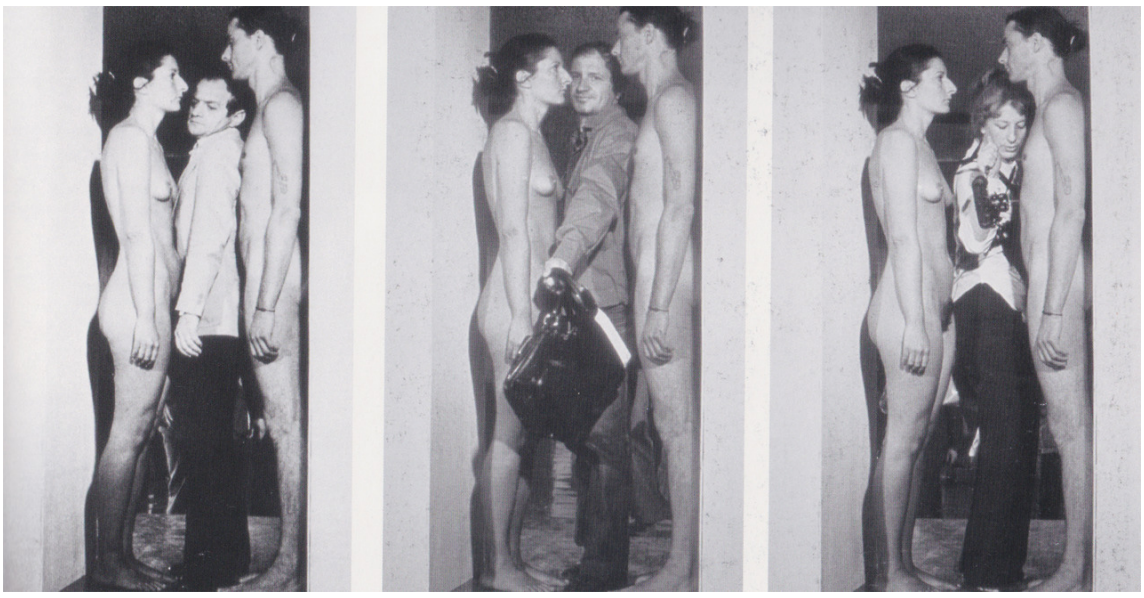


Figure 23: Photo documentation from the performance of "Imponderabilia (1977)

When we view these documentation photos of visitors experiencing *Imponderabilia (See Fig. X)* we can imagine how the individual will have a reaction to passing the

[181] *Fischer-Lichte, 2008: 175*

threshold of the performance. As their bodies intimately meet in the space of the performance, the transformative power of performance may possibly occur as a temporal liminal experience, due to the openness and uncertainty of the situation. According to Fischer-Lichte, meaning will emerge for the spectators as they shift their focus between the live actors material body and their perception of their role in the performance. Further, as the spectators take in smells, sounds and in this case, the spatial arrangement, the spectators may have a liminal bodily experience.

The word *liminal* is, in Cultural Anthropology, used to describe the ambiguity that can occur in the middle stages of rituals. It describes the moments where the participants no longer hold their pre-ritual status, but at the same time not yet reached the goal of the ritual. In these stages the classifications of different statuses dissolve, and the participants can behave in ways less acceptable under other circumstances.[182] However, Fischer-Lichte, although using this term, stresses that she is not equating these ritualistic experiences with the aesthetic experiences deriving from performance art, as the latter does not lead to neither irreversible shifts or social recognition[183]

The states of liminality in performance art are on the other side caused by the same construction that generates the performance, in which Fischer-Lichte refers to as *the autopoietic feedback loop*. Here, the term *autopoiesis* is understood as how biologist Maturana and Varelas in 1972[184] described it to be a system that reproduces and maintains itself[185]. In this sense, the autopoietic feedback loop can be understood as the constant and automatic system of exchange and influence between the performer and spectator in a performance, whether one considers its nature as social or aesthetic[186]. This fundamentally open, unpredictable process is by Fischer-Lichte believed to generate the element of *liminality* involved in performance art.

The transformations caused by liminality in a performance setting is, according to Fischer-Lichte rather temporary, meaning they take effect "(…) for the duration of the

[182] Nanda, Serenda & Richard L. Warms. *Culture Counts: A Consise Introduction to Cultural Antropology* , Cengange Learning, 2015: 207
[183] Fischer-Lichte, 2008: 179
[184] Fischer-Lichte, 2008: 211, Note 4.
[185] Fischer, Lichte, 2008: 39
[186] Fischer, Lichte, 2008: 40

performance or for limited periods of time within the performance."[187] These transformations are believed to create physiological, affective, energetic, and motoric changes to the body. Further, they can lead to the spectator changing status to becoming an actor in the performance or lead to the occurrence of communities.[188]

Fischer-Lichtes new aesthetic was presented two years advance to "The Artists is Present",and arguably presents a suiting foundation for understanding the experiences of the participants in "The Artist is Present". The participation in "The Artist is Present" involves crossing a threshold in entering the square and sitting down before Abramović. The situation appears open and unpredictable, and thus will enable the possible experience of liminality. These temporary transformations caused by the liminality of the situation and the spectator becoming an actor in the performance, may provide a possible understanding for the strong reactions of the participators. In this sense, the physiological, affective, energetic and motoric changes occur a results of these transformations. Further, if Abramović, as believed, possess *shamanistic* abilities to generate heightened energies, these energies would, according to Fischer-Lichtes theory be constantly exchanged and negotiated between her and the participants.

The element of exchange may be the reason for how Abramović describes that she "immediately see (…) and feel it"[189] when gazing into the eyes of people who "were carrying such pain inside" as becoming as for them [the participators] of their own emotions", sometimes resulting in Abramović also having strong emotional reactions. On this note, Chrissie Iles makes a interesting remark in the Exhibition catalogue sharing a comparison of *The Artist is Present* with Philip Auslander's observation of the Polish theatre director Jerry Grotowski (1933 – 1999). Auslander reflected upon the effects Grotowski's theatre had upon its audiences in that "individual self-exposure undertaken in an arena of similarly exposed individuals produces a "cleansing of life" by eliminating the fear we feel before the unknown other"[190].

[187] Ibid.
[188] Ibid.
[189] O'Hagan, Shawn. "Interview: Marina Abramović", *The Guardian,* 10-03-2010
[190] Iles, 2010: 43

In viewing "The Artist is Present" through the aesthetics presented by Fischer-Lichte , the participators reaction could be a result of not only experiencing bodily reactions as a result of the transformational power that is possible through *participation* in the performance, but also in exchanging the high-intensity modes of energy Abramović possibly connects us with.

Religious Aspects

Also, the temporarily emerge of "sense of community" Fischer-Lichte describes, can be seen in the groups of people gathering outside the museum, sleeping and spending hours together in line or through forums formed online. Writer Francine Prose compares this occurrence of community with the religious phenomenon of pilgrimage[191].

Prose writes that the pilgrims "traveled to see (and perhaps have their lives changed by) the ascetic saints – perched on poles, dwelling in caves – claimed to have found God in discomfort and (…) solitude in the desert."[192] We see similar thoughts shared in McEvilley's description of Abramović's connecting us to high-intensity modes of energy. We also find this when Iles describes Abramović's abilities to endure this impassiveness due to her "highly disciplined mental and physical concentration forged by her long experience in strict meditative practice.s"[193] These descriptions resemble the ascetic saints as described by Prose, in which the journey to finally sit with Abramović could be seen as sharing similarities with embarking on a pilgrimage. Biesenbach also draws a line between "The Artist is Present" and early Christian ascetic Saint Simeon Stylites (390 – 495) who is claimed to have lived on a platform in a pillar for 37 years.[194]

Prose continues her comparison to pilgrimage, with the reactions of religious believers towards religious artworks, *icons*, waiting hours to kneel before it, pray to it or even crying before it.[195] Arguably, Abramović's pose in the atrium can resemble icon paintings, whereas from a Christian perspective Christ was "usually presented in

[191] Prose, Francine. "When Art Makes us Cry", *The New York Review of Books*, 09.06.2012
[192] Ibid.
[193] See footnote 166, p. 54.
[194] Biesenbach, 2010: 15
[195] Prose, 2012.

a frontal pose"[196]. As an example, in Russian Orthodox church life the icons of Christ presented gave the possibility for communication between the spectator and the other world enabled by (…) the direct gaze of the revealed and incarnated Christ."[197] Continuing the comparison with "The Artist is Present", one could view the strong emotions of some of the visitors as a result of a similar act, finally reaching the goal of engaging in mutual gaze with Abramović.

Matthew Akers, director of the documentary about *The Artist is Present* was present for the entire process of both preparation and execution of the performance while recording fourteen hundred hours of footage.[198] Being one of the few experiencing the entire performance period as a spectator, he states that Abramović felt "almost *priestly* sitting there"[199], describing the atrium as "almost temple-like."[200]

The strong reactions to the presence of someone we consider to be heightened, can together with "The Artist is Present" be viewed in resemblance to the contemporary phenomenon of Braco, a Croatian healer going by the name of "The Gazer". Both online[201] and in real life, he offers sessions in which he utters no words or gestures, but merely offers the public his gaze.[202] Not only does Braco attract large crowds, but according to participators testimonials , his gaze has a healing effect.[203] On a different note, the "(…) concentrated gaze into the eyes of the subject"[204] has also been considered necessary for the practices of both mesmerism and hypnotism.[205]

Through a cultural understanding of the *Artist is Present*, we can view the participators reactions as a result of the transformative power of performance art and Abramović's unique abilities concerned with energy. The energetic modes involved in this meeting may be the reason for the many testimonials where participators claim

[196] Mursell, Gordon. *The Story of Christian Spirituality: Two Thousand Years from East to West*. Lion Publishing, 2001: 157
[197] Ibid.
[198] Vizcarrondo, 2012
[199] Ibid.
[200] Ibid.
[201] http://www.braco.me/en/
[202] Jackman, Tom. Braco brings his Healing Gaze to Arlington, *Washington Post* 12.10.2010
[203] Read testimonials at http://www.braco.me/en/testimonials/visitors/
[204] Grimes, Dr. Hillary. *The late Victorian Gothic: Mental Science, the Uncanny and Scenes of writing*. Ashgate Publishing, 2011: 67
[205] Ibid.

that they forgot the surroundings when sitting with Abramović. We can also associate it with the cultural phenomenon of pilgrimage. The unique abilities Abramović is believed to have as an artist could further be viewed as inherited from the art historical era we know as *Romanticism,* occurring at the end of the 18th century. By the Romantics, the status of the artist was heightened to that of being an "artistic genius"[206] where the art was a result of individual emotional expression. Here, creating art from one's own personal emotions was considered (…) a means of endowing art with a spiritual meaning"[207]

The Socio-political Understanding of "The Artist is Present"

In previous work of Abramović, the audience have been invited into a situation in which neither the actor or the spectator can predict the outcome, forcing the audience to reflect upon their positioning in the work. In *Rhythm 0* audience members were free to do whatever they wanted with her body and 72 objects, ending up with a participator loading a gun and pointed to her. In *Rhythm 5* audience members ended up saving Abramović's life by pulling her out of the burning crucifix she had lost consciousness from lying within[208]. In *Lips of Thomas* Abramović's bleeding body lying on blocks of ice had the audience members eventually ending the performance through removing the ice blocks, as they "couldn't tolerate the scene anymore."[209]

The documentary about *The Artist is Present* prove the autonomy of the participator in the performance to be minimal, as we learn the strict rules of the performance presented by one of the guards. Further, in one clip wee see the guards removing a woman who took her dress off in front of Abramović. We see her crying after being removed from what appears to have been a sincere attempt to "be vulnerable" in front of Abramović.[210] The guards also remove a man who is wearing a mirror attached to his head.[211] The qualities of being open and unpredictable which describes Abramović's previous performances, appears to have been replaced by the narrow

[206] Murray, Christopher John. *Encyclopedia of the Romantic Era 1760 – 1850*. Routledge, 2004: 5
[207] Ibid.
[208] Westscott, 2010: 67
[209] Westscott, 2010: 82
[210] *The Artist is Present"* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[211] Ibid.

option of whether you want to sit with her or not.

The one element of freedom was that the participant could decide the amount of time spent participating in the performance. This freedom, a fundamental factor in the work was however changed during the last day of the performance. A limit of fifteen minutes was set for the amount of time each participator could sit with Abramović.

Perhaps the context the performance worked within was the reason for Curator Biesenbach's concern, when stating that the risk of the performance at the MoMA is how far it will go into being theatrical.[212] The theatrical dimension of the performance is discussed by Iles, in her reference to the work of Abramović being compared to the work of Grotowski in the museum catalogue. She also describes that although Abramović is sitting close to the participant, her silence and stillness could have a distancing effect, in a ”*Brechtian sense*”[213]. Iles is referring to the one of the most famous theatre practitioners of the 20th Century, Berthold Brecht (1898 – 1956). Brecht is especially known for his *”verfremdung effect”,* which describes the intention to let the spectators perceive things in new ways in order to reveal the social rules governing our actions. This is believed to further cause us to reflect upon how things could have turned out differently.[214] Iles sees Abramović's still presence as a "tool with which to instill in those present a heightened awareness of their own role in forming the artwork's meaning."[215]

Iles also views the visual spectacularity and art historical weight of the space frames it's set within as ”something inherently theatrical.”[216] Framed within a large rectangle of light resembling a stage, Abramović invite the audience members to join her. Around them are visitors drawn in from several entrances, balconies and windows, turning the atrium into both a gallery and a public gathering place. Iles discusses "the dramatic spectacle of the artist's presence"[217] in terms of Michael Fried who feared that "presentness" of the modernist experience of art was replaced by "the sine qua

[212] *The Artist is Present”* Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.
[213] Iles, 2010: 41
[214] Brecht, Berthold. Brecht on Theatre, 1964 – Edited by Silberman, Giles and Kuhn
[215] Iles, 2010: 41
[216] Iles, 2010:40
[217] Ibid.

non of theatre", or theatricality[218]. Theatre was once considered the enemy of performance art, as it did not represent the authenticity of performance art, but Abramović is here described as always have been "on one level, theatrical".[219]

The Spectacle is Present

Figure 24: *Matthew Akers filming Marina Abramović for the Documentary of the performance*

Art professor Amelia Jones sat with Abramović during "The Artist is Present", and she shares her experience in the critical article "The Artist is present: Artistic re-enactments and the impossibility of presence" (2011). In line with earlier presented Derrida's deconstruction of presence, Jones argues that in "The Artist is Present "(…) desire to manifest presence, [it] points to the very fact that the live act itself destroys presence (…). The live act marks the body, understood as an expression of the self, as representational". Here she considers the very essence of *The Artist is Present* to be impossible. Further, we read that Jones did not experience the performance in the terms I presented as the cultural understanding, neither being transformative or an experienced exchange of energy:

[218] Ibid.
[219] Ibid.

> ”(…) as someone who sat across from Abramović in the atrium at MoMA, surrounded by a barrier like a boxing ring, itself surrounded by dozens of staring visitors, cameras, and lit by klieg lights, I can say personally I found the exchange to be anything but energizing, personal, or transformative. Though I felt aware that the person I have met and whom I respect as an artist and cultural force was sitting there before me, I primarily felt myself the object of myriad individual and photographic gazes (including hers)[220]”

Here, we read that Jones did have the experiences shared by some, of not noticing the surroundings when sitting with Abramović. More accurate, it becomes a critical factor in her experience. The issue of becoming the object of others' gaze relates to theories by Psychologist Jacques Lacan (1901 – 1981). His coining of the term "the gaze", became more complex as his ideas concerning it evolved, and has later been associated with an array of qualities in post-modern theories. Lacan writes that "What we have to circumscribe (…) is the pre-existence of gaze – I see only from one point, but in my existence I am looked at from all sides."[221] Here, he points out that we can not escape the gaze of others in that in the first instance it makes us ”beings who are looked at."[222] Lacan's notion of the gaze means that the gaze of others objectifies the individual, which causes an experience of lacked autonomy when discovering that he or she has become a visual object for the gaze of others. In further description of her experience, Jones write:

> ”(…) and the experience overall was very strongly one of participating in a *spectacle* – not an emotionally or energetically charged interpersonal relation, but a simulation of relational exchange with others (not just the artist, but the other spectators, the guards, the ”managers” of the event.)”[223]

Here, pointing out how it felt "a simulation of relational exchange", Jones refers not just to the spectacle in the theatrical context presented by Iles, but also open up the

[220] Jones, 2011: 18
[221] Lacan, Jacque, "The Split Between the Eye and The Gaze" in *The Four Fundamental Concepts of Psycho-analysis*. Edited by Jaques Alain-Miller. Translated by Alan Sheridan, 1973 (1986): 72
[222] Ibid, 75
[223] Jones, 2011:18

adaption of the term by Marxist postmodern philosophical critiques of the capitalistic structures shaping society.

Guy Debords' The Society of the Spectacle

When the term "Spectacle" was presented by Guy Debord in his philosophical critique "The Society of the Spectacle" (1967) it was meant to directly address Soviet and American societies, particularly focusing on *commodity fetishism* and contemporary *mass media*. The work consists of 221 short theses and reinterprets the philosophy of Karl Marx, and could be seen as influenced by both works of Lukàcs and the philosophy of Hegel. Performance theorist Marvin Carlson describes The Society of The Spectacle to be an important contribution to our understanding of performance art, in its attempts to describe the broader theoretical, political and economic context in which the genre emerged in the 1960s[224] Performance art has in general been considered to escape the marketplace through its qualities of being temporal and ephemeral[225].

Figure 25: A photography by J. R. Eyerman featured in LIFE Magazine in 1952

[224] Carlson, 2003: 131
[225] Jones, 2011: 34

The iconic photography of people in the movie theatre in 1953, by J.R Eyerman **(Figure 25)** has been featured on the cover of Debord's book. The photography manages to capture the theory of the society of the spectacle. People have been presented with a set of spectacles in order to experience the phenomenon of 3D. Through these new spectacles, they will look at the 2D images they are presented with, but it will appear to them as 3D, like what they are viewing is real and obtainable. This fascination will have them return again and again, which will cause economic gain for the movie theatre which provided them these spectacles to begin with. Passively, the human beings will pay for and watch the lively images presented to them through the spectacles offered by the ticket holders.

The definition of *the spectacle* provided by Debord can be read as describing market economy to be the leading force that shapes our society, even influencing the way its run by the government. He describes this as "the autocratic reign of the market economy which had acceded to an irresponsible sovereignty, and the totality of new techniques of government which accompanied this reign"[226].

In this society of the spectacle, Debord argues that "all that have once directly lived has become mere representations."[227] This can be understood as a result of the developing forces of production, which eventually made mass productions of single items possible. This can be viewed as essentially changing the very essence of how we live in *the perceptible world,* or the world we experience through our senses. On this note, the "perceptible world is replaced by a set of images that are superior to that world yet at the same time impose themselves as eminently perceptible.[228]" Debord refers to this as the principle of *commodity fetishism*, deriving from theories by Marx. This could be interpreted as that the grand experience of life has been reduced to images that we are made to believe is representing life, although they are superior to it, and therefore in reality are unattainable representations.

[226] Debord, Guy. *Comments on "The Society of the Spectactle" (Radical Thinking).* Translated by Malcolm Imrie. Verso, 1998:2
[227] Debord, Guy. *Society of the Spectacle.* Translated by Donald Nicholson-Smith. New York: Zone Books, 1994: 12, Thesis 1
[228] Ibid, 26

What Debord critiques is how the commodities, or these images that are presented to us through forces of a society ran by the market economy and mass media, *mediates* the social relationship between people[229]. This can be read as these images interfering with our lives to such a degree, that it affects or facilitate our social interactions with one another. The structures of the spectacle, which dominate the society we are part of, *deprive* us of the authenticity of life. In a simplified sense, this could be read in that we begin to live the life we see in images, instead of having a unique exploration of the perceptible world.

The reason for this degrading of life is, according to Debord, a result of an earlier stage in the process of the market becoming a dominator of social life. In this firststage, *being* was downgraded into *having,*[230] as the market bombarded us with new possibilities. Further, reflecting the time the theory was first presented, social life has been "completely taken over by the accumulated powers of economy, [which]entails a generalized shift from having to *appearing.*"[231] This implies that the human experience is decreased from revolving around being to appearing, which can be understood as becoming a representation appearing as a human being, rather than *being* a human.

Debord views the loss of unity in the world being the origin of the spectacle.[232] The consumer society where the images mediate our social life, eventually leads to the alienation of the individual, as "(…) separation is the alpha and omega of the spectacle."[233] When describing how this alienation works, the spectator experience that "(…) the more he contemplates, the less he lives; the more readily he recognizes his own needs in the images of need proposed by the dominant system, the less he understands his own existence and his own desires."[234]

In other words, the spectacle is responsible for depriving us from understanding our existence and desires. At the same time it withholds its dominating position through

[229] Ibid, 12
[230] Debord, 1994: 16, Thesis 17
[231] Ibid.
[232] Ibid, 22, Thesis 29
[233] Debord, 1994: 20, Thesis 25
[234] Debord, 1994: 23, Thesis 30

presenting us with images that we are confused to believe represents what we need. The reason as to why we do not recognize the act of the spectacle, is in Debord's opinion because it "appears at once as society itself, as a part of society and as a means of unification."[235]

Understanding *The Artist is Present* as a spectacle

When writing that she felt part of a spectacle, Jones referred to her experience of sitting with Abramović as a simulation of relational exchange, as oppose to being an authentic social interaction. However, further elaboration on the aspects of "The Artist is Present" that could be associated with Debord's spectacle arguably contribute to a critical understanding as to why "The Artist is Present" had such an impact on the art world at large.

As read from the previously presented testimonials from participators, several participants forgot the surroundings while sitting with Abramović.[236] Not having experience the performance first-hand, I find it difficult to overlook the possible effect of the presence of *the others* surrounding the square. Unlike the prior mentioned participators, Amelia Jones addresses her experience as becoming an object for a myriad of gazes, from the audience members, cameras and Abramović herself. Instead of being a subject experiencing *being* in a social situation, the participator instead becomes an object, which further reduces her experience as engaging in a representation of authenticity. One could view this in relation to Debord's notion that the degrading of life caused by the spectacle has lead us from being to *appearing*.

Continuing, it is also difficult to overlook the *image-based* aspects of the performance. Not only did "The Artist is Present" invite its participants to become an object of the gaze of the museum visitors, but also for the world at large. The MoMA had a live feed on it's website, featuring portraits photographed of each single visitor posted directly after their sitting. Here, the world could log on, scroll through and view images of participators and reactions they had to the situation. This could be regarded as both increasing the amount of gazes, and *decreasing* the individual, into becoming an actual object; an *image*.

[235] Debord, 1994: 12, Thesis 3
[236] See previously presented testimonials in Chapter 2, page 49.

It is difficult to understand why there had to be cameras involved in the execution of "The Artist is Present", unless considering the impact this has on the *market* it presents itself in. When reviewing the feature to the performance of an online stream presenting portraits of the spectators, alongside the articles written prior to the performance and featured in the exhibition catalogue, the marketing campaign involving gigantic posters around New York City and the HBO-documentary following the entire process there are clear indication that certain predictions were involved of what effect "The Artist is Present" would have on its participants. And indeed, the images of people crying at the MoMA got the worlds attention, was shared through mass-media and the internet, enabling us to see with our own eyes the sensational effect "The Artist is Present" had on its participants.

What the images could tell us, was that the performance fulfilled a need in a world where there are "so many stories of loneliness."[237] If comparing this to the forces of the spectacle, this would have us viewing these images of the visitors at the MoMA as images of our own needs. This would further lead us into wanting experience the performance ourselves, causing some to spend hours in line to fulfill this need, and become part of the communities rising, or the means of "unification" the spectacle appears as, in the words of Debord. This would facilitate the spectacle further, as it builds upon being a social relationship between people mediated by images. According to Debord, this will eventually lead him to have less understanding of his existence and desires. One could imagine that the alienation involved in being reduced to an image of a crying face on the internet could cause similar experiences.

As discussed earlier, there was a low degree of autonomy in "The Artists is Present" as oppose to the previous work of Abramović. The one element of freedom was the possibility to stay as long as one wanted with Abramović. When the time frame of fifteen minutes was set the last day of the performance, it opens up for even further reasons for understanding "The Artist is Present" in terms of the spectacle. In this scenario, the relational exchanges could be seen as mass-produced.

[237] A quote from Abramović about the world we live in, See p. 54

Chapter 4
- Introducing a Neuroscientific Understanding

The presented understandings in the last chapter represent what I consider to be established convictions of how to understand "The Artist is Present". However, they fail to consider the main feature of the performance, the sharing of *mutual gaze*. In further attempts to understand why "The Artist is Present" had such an impact on its participants, we have to consider scientific studies in the field of neuroscience.

The Impact of the Mutual Gaze

"All action is of the mind, and the mirror of the mind is the face, its index the eyes" claimed Cicero (106 B.C – 43 BC).[238] Today, this can be read as testimonial to the importance eyes have had in our understanding of humans for centuries.

Today, mutual gaze has been described by neuroscientists as "the most powerful mode of establishing a communicative link between humans."[239] Scientists agree that the ability to catch the gaze of others and to interpret its meaning has been of greatest importance in evolution for both the predator species and for those being their prey. Moreover, in prehistoric times, the children who could attract and keep up eye contact, and with this increase the amount of attention from their parents, would have the best chance to survive. This could be a possible explanation to why newborns instinctively lock eyes with their caregivers, which is consistently observed in humans from two days of life.[240] Research has further demonstrated that infants prefer to look at faces over other stimuli, especially faces with direct gaze.[241] Eye-tracking studies of infants have shown that from six weeks after birth, they show similar face-scanning

[238] Taylor, Hannis & Hunt, Mary Lillie Taylor, Cicero: A sketch of his life and works, 1918: 335
[239] Farroni, T., C Sibra, G., Simion, F., & Johnson, M. H. (2002). Eye contact detection in humans from birth. Proceedings of the National Academy of Sciences of the United States of America, 99, 9602–9605
[240] Conty et al., 2010, Farroni et al, 2006. & Senju and Hasegawa, 2005.
[241] Farroni et al, 2002.

behaviour as adults, preferentially fixating on eyes and mouth.[242] In other words, we are pre-disposed to seek eye contact, and to react to it physiologically.

The Eye Contact Effect

In the article ”The Eye Contact Effect: Mechanisms and development” (2009), Atsushi Senju and Mark H. Johnson presents a review of the latest findings in neuroscience on the mechanisms involved in eye contact between human beings, the *eye contact effect*. This term refers to the general effect of perceived direct gaze; Senju & Johnson defines it as ”the phenomenon that perceived eye contact modulates the concurrent and/or immediately following cognitive processing and/or behavioral response.”[243] In other words, it is a theory stating that, as human beings, we have no other choice than to automatically respond when facing the direct gaze of other humans.

Direct Gaze and Face

The Eye Contact Effect is stronger when a human is exposed to direct gaze, as oppose to averted gaze.[244] Extensive research has been concerned with measuring our responses to different alterations of the gaze, including measured brain activity from humans responding to averted gaze, direct gaze, closed eyes and different correlations between these and the direction of the face[245]. This research has resulted in a conclusion that the strongest response occurs when the subject is exposed to the combination of direct gaze and *an face*.

However, recent studies show that the mental attributions of eye contact differs depending on our experience of whether the person directing their gaze towards us sees us or not.[246] This conclusion bases itself on that the significant difference between averted and direct gaze only occurs in experiments where the subject is

[242] Hunnius, S., & Geuze, R. H. (2004). Developmental changes in visual scanning of dynamic faces and abstract stimuli in infants: A longitudinal study. *Infancy*, 6, 231–255

[243] Senju, A. & Johnson, M. The Eye Contact Effect: Mechanisms and Development. *Trends in Cognitive Sciences* 13(3), 2009: 127

[244] Ibid.

[245] Conty, et al 2010,: Conty, Tijus, Hugueville, Coelho, & George, 2006; Senju, Hasegawa, 2005; Von Grünau & Anston, 1995

[246] Myllyneva, Aki and Jari K. Hietanen. “There is more to Eye Contact than meets the Eye”, *Cognition Volume* 134, January 2015, Pages 100–109

presented with a live gaze as oppose to showing pictures of faces on a computer screen. [247] The gaze in an image on a screen is, in other words, unable to live up to the impact of the gaze of a living human being.

The ”Eye Contact Effect” was also demonstrated in article ”The Cost of Being Watched: Stroop interference increases under concomitant eye contact” (2010). Stroop Interference refers to impaired performance when, in a word, there is a mismatch; a classical example is naming a colour not printed in that colour, such as the word red if it is printed in blue. The Stroop interference (time needed to read the words) increased if a pair of eyes with direct gaze appeared on the screen together with the word(s), as compared with a pair of averted eyes or closed eyes. More interestingly, this eye contact effect remained although the subject was presented with the task of identifying the color of the incongruent word, gaze therefore not being under the direct focus of attention. In other words, demonstrating the crucial effect of eye contact, our brain is not able to ignore the gaze of others, even in situations the processing of direct gaze is viewed as ”strongly disfavored.”[248]

What later years' neuroscientific research has shown us, is that we have no choice but to process the eye contact of others, as engaging in eye contact with another human immediately affects our cognitive processing. Further, this effect is at is strongest when the face and the gaze are pointed directly at us.

The Theory of Mind Network

The eye contact effect informs us about the powerful impact gaze has on our cognitive behaviour. Further, *theory of mind* provides us with information about neuronal mechanisms involved in the processing of the human gaze, as well as when we interpret other persons intentions, desires or beliefs. Our ability to have this “theory of mind” separates us from other primates.[249]

[247] Ibid.
[248] Conty, Gimmig, Bellentier, George & Huguet: 2009
[249] Gallagher, Helen L. & Christopher D. Frith. “Functional imaging of Theory of Mind” in *Trends in Cognitive Sciences,* Volume 7, Issue 2 February 2003, Pages 77–83

The research on these mechanisms stands central in cognitive neuroscience on social interaction. Tracing this effect within the billions of connections in the neural networks of our brains is a demanding task. One of the networks found to stand central in mechanisms of eye contact, is the *theory of mind network.*[250]

Theory of Mind

Theory of mind is a concept first described by the psychologist Simon Baron-Cohen (b. 1958) as a theory "(…) being able to infer the full range of mental states (beliefs, desires, intentions, imagination, emotions, etc.) that cause action. In brief, theory of mind is able to reflect on the contents of one's own and others' minds"[251] In other words, theory of mind is a theory concerned with our abilities to consider and contemplate on both our own mind and thoughts, and our understanding of other people's views, intentions and thought.

Theory of mind is likely always to remain a theory since the mental conditions of others minds cannot of course be thoroughly measured or proven. However, due to new technological developments, first and foremost the fMRI scanner, facilitating new possibilities of measuring intricate neuronal mechanisms, research in recent years have been promising, strengthening our understanding of the theory of mind network. This has made it possible to map certain brain regions particularly engaged in social behaviour. The *theory of mind network*, also called *the social brain* or *the social brain network*, that show strong activation when we engage in social behaviour, including eye contact with human beings.

The Theory of Mind Network

The Theory of Mind Network consists among others of the following areas: the *superior temporal sulcus* (STS), *inferior parietal lobule* (IPL), *fusiform gyrus*, with the *fusiform face area* (FFA), the *amygdala*, *hippocampus* and the *limbic ring*, as well as the *orbitofrontal cortex* (OFC) (**See figure 26.)**

[250] von dem Hagen et. al, 2014; Calder et. al, 2002. Baron-Cohen, S. 1997
[251] Baron-Cohen, Simon. Theory of Mind in Normal Development and Autism. Prisme, 2001, 174-183

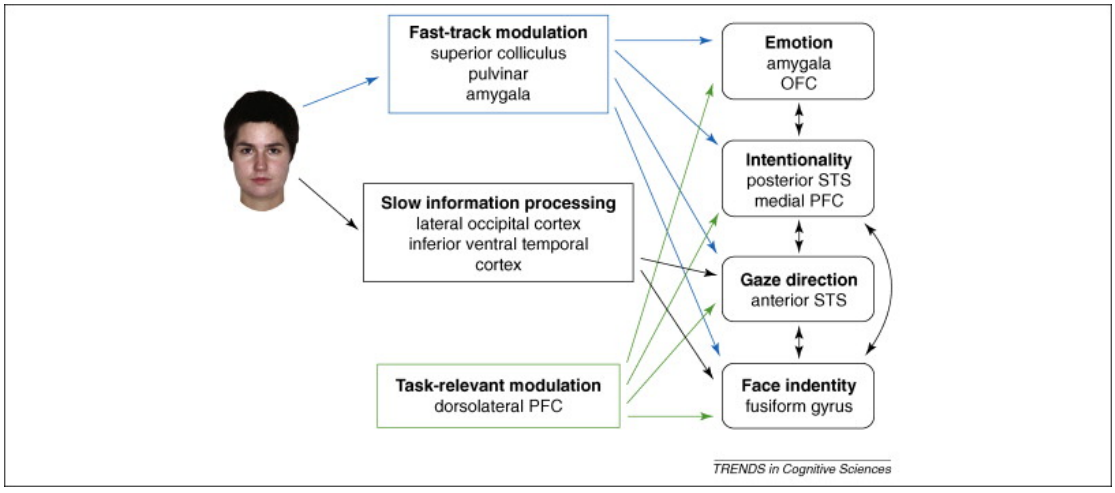
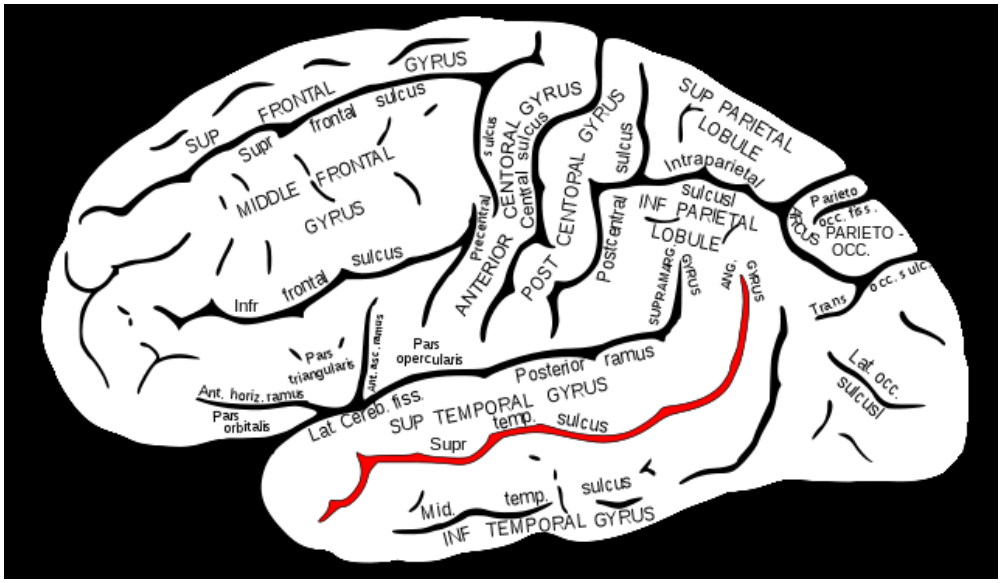


Figure 26. From Senju and Johnson (2009)

The *superior temporal sulcus* (STS) is located in the temporal lobe of the brain, running in the groove (**See Figure 27a**) between the *superior temporal gyrus* and the *middle temporal gyrus.*[252] It has been referred to as the "chameleon of the brain[253], since different functions seem to cluster within this area, including audiovisual integration, motion, speech and face processing as well as the theory of mind.

The anterior part (aSTS) is involved in our perception of gaze direction and gaze shifts while the posterior STS (pSTS) first and foremost is concerned with the intentionality of gaze.[254] Above the STS on the left side of the brain, and on the parallel side of the right brain, the IPL lies beneath *the intraparietal sulcus* and behind the *post-central sulcus* **(See Figure 27b**). In the Theory of Mind network, it is connected to the gaze recording functions of the aSTS and the pSTS.[255]

[252] on the definition of sulcus and gyrus with their plural sulci and gyri, see Chapter 1, p. 25.
[253] Hein, G. And RT. Knight "Superior Temporal Sulcus---It's my area. Or is it?" *Journal of Cognitive Neuroscience* , Dec. 2008: Abstract
[254] Calder et al., «Separate Coding of Different Gaze Directions in the Superior Temoral Sulcus and Inferior Parietal Lobule», *Current Biology* 17, 20-25, January 9, 2007.
[255] *Ibid.*



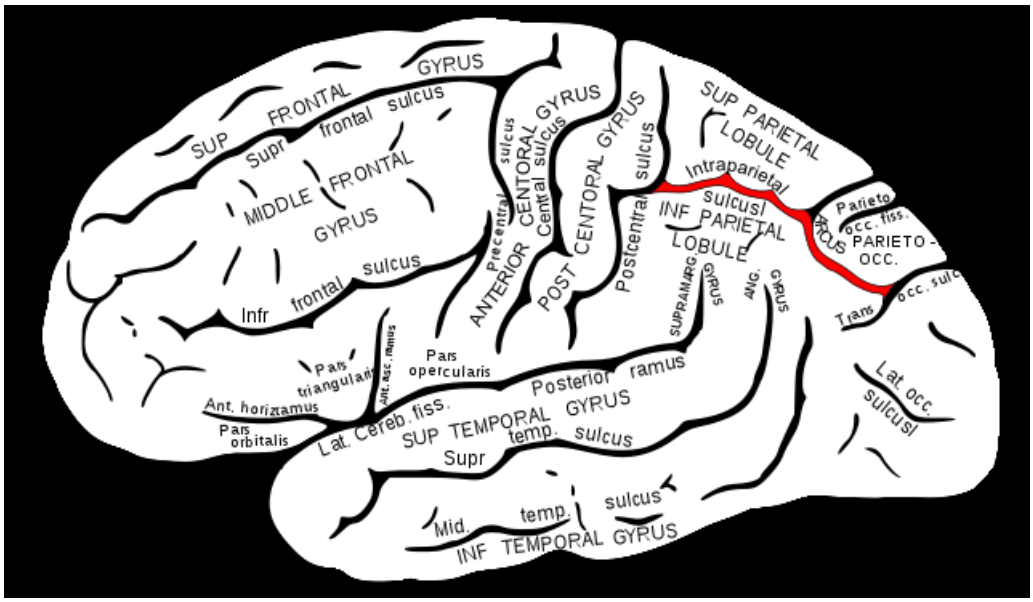


Figure 27 a, b showing the superior temporal sulcus and the Inferior Parietal Lobule

The third component usually considered part of the Theory of Mind Network, is the *fusiform gyrus* (**See Figure 28**), located on the ventral side of the brain, between the parahippocampal gyrus and lingual gyrus. Like many of the regions of the brain, its exact functionalities is not completely clarified, but there is a consensus of its involvement in, amongst other functions, face and body recognition. In the scanning of the brain of people looking at a face, the *fusiform gyrus* shows a high level of activity, particularly in the FFA (above). It is also found that people who have damaged the area where the *fusiform gyrus* is located, usually suffer from prosopagnosia or face blindness, the lack of ability to recognize faces. Testing of

these people has, however, shown that they otherwise have normal vision, intelligence and socio-cognitive abilities,[256] like reading, observing motions or colors or even recognizing objects.

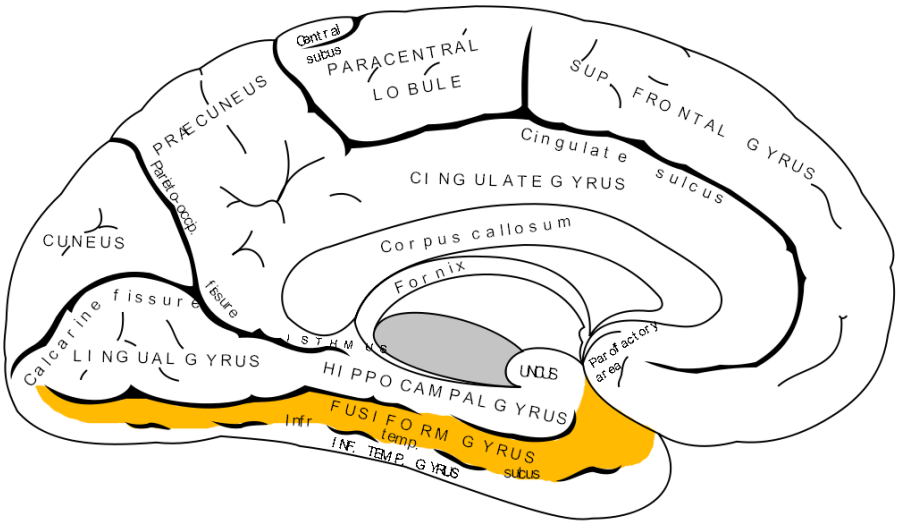


Figure 28. Fuciform gyrus

The last component considered a main feature of the theory of mind network, is the amygdala, or ”the almond of the brain”[257] (**See Figure 29**). Placed deep within the temporal lobe of the brain, it is considered the main center for emotion in the brain and commonly associated with fear.[258] The amygdala receives sensory input directly from the different sensory systems of the brain, and creates the output that causes our entire body to respond to fear, through reactions of sweat production and increased heartbeat. Recent studies imply, however, that the Amygdala is also involved in positive emotions.[259] The majority of research has however tied it to the reactions of fear or anxiety. The amygdala is composed of four sub nuclei and resent research agree that its function probably is far more complex than previously suggested.

[256] Behrmann et al, 2011; Duchaine et al, 2011.
[257] *Amygdala* is greek for “almond”
[258] LeDoux, 2003; Davis, 1992
[259] Lanteaume et al, 2007.

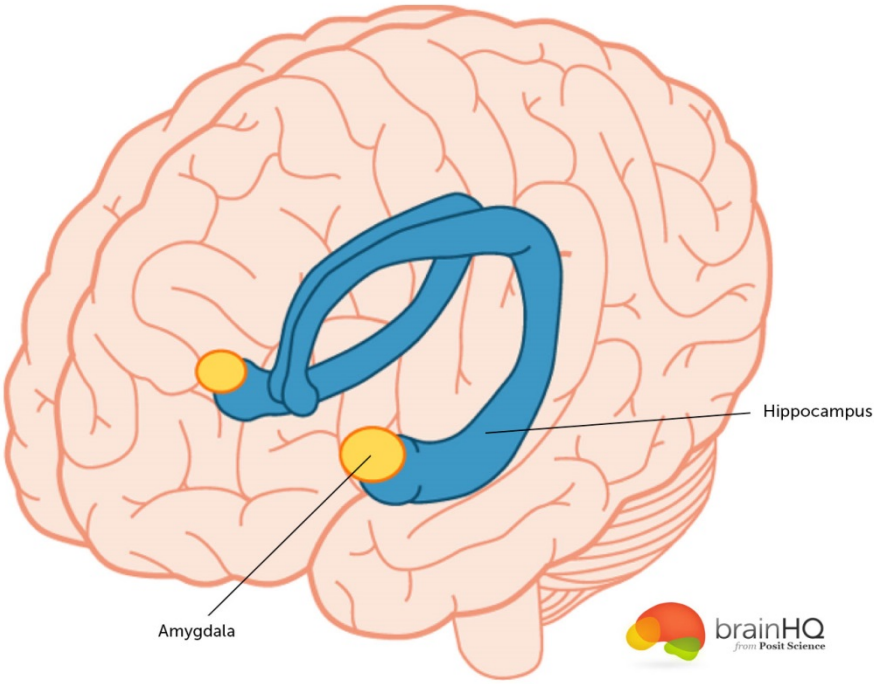


Figure 29. The amygdala

The amygdala is activated diversely as a response to the direction of gaze. [260] Further, it is measured that the direction of gaze modulates our judgments of an emotions intensity,[261] and also how different emotions modify our judgment to the direction of gaze.[262]

A testimony to the impact that gaze has on the amygdala, is the measured activation in the amygdala when cortically blinds are exposed to another person's gaze. By using a fMRI-paradigm on a cortically blind person, researchers were not only able to get results demonstrating the effect of eye contact to be so powerful that it leads to measured activity in the amygdala of the brain of cortical blind persons; the testing of one person with complete cortical blindness showed that the strongest cognitive reactions were from faces with direct gaze.[263] The fact that emotional stimuli is being processed in the brain although the person has no awareness of what the stimuli are,

[260] Adams and Kleck, 2003; Hadjikhani et al., 2008; Adams et al., 2012
[261] Adams and Kleck, 2005.
[262] Lobmaier and Perrett, 2011
[263] Burra et. al, 2013.

contributes to the theory that elements important for our survival, such as possible dangers and threats, takes a rapid subcortical pathway to the amygdala.[264]

As Senju and Johnson (2009) have postulated in their so-called *first track modulator model*, axons of the visual nerve, those that are not synapsing in the lateral geniculate nucleus of the thalamus but on cells in the *superior colliculus*, send their information directly to the amygdala, from where the signals goes into the limbic lobe through the hippocampus, and the bundles leading to the prefrontal cortex (PFC) ending up in the OFC. This is the emotional lobe; it is fast, but "dirty", which means that this pathway does not give more than coarse information of, for instance, a face and a gaze. The lobe will however, function as an alarm in cases of fear-awaking objects, gazes etc. The deeper cognitive understanding of the gaze, the interpretation of the direction of the gaze, the intentionality of the gaze, and the factual recognition of the face takes place in the aSTS, pSTS, and the FFA respectively.

New Discoveries

Demonstrating the fast pace of the scientific revolution, and representing two possibilities that would result in a further understanding of how mutual gaze works, I shortly present two theories that is more interesting, than accountable due to the premature stages of the discoveries.

"Eye Cells" in the Amygdala

New research suggests the presence of so-called "Eye cells" in the amygdala of monkeys.[265] The experiment shows that the amygdala of monkeys contain neurons that respond selectively to eye contact. The "eye cells" show similar features to neurons which are activated when the monkey is exposed to any visual stimuli, but only respond when the eyes of the monkey fall within the *fovea centralis* (i.e. the part of the retina lying in the center of the optical axis of the eye, where visual sharpness is maximal) of the viewer, either as looking into a responding gaze or looking at another monkey's eyes. These findings are seen as a possible evidence of the eye cells being an evolutionary specialization to support meaningful forms of social interaction

[264] LeDoux, 1998.
[265] Mosher et al, 2007.

mediated by the gaze[266]

If being the case, the discovery of "eye cells" in the amygdala not only contributes to strengthen the idea that the amygdala and the emotional response it activates is central to the behavior of engaging in mutual gaze, but it may also, as the researchers writes, complete our understanding of their potential role in natural and pathological social behaviors, when being investigated further in the future.[267] If we find that the human brain have a set of specialized "eye cells" that respond specifically to the eyes of other humans, not only will it accompany the discovery of mirror neurons in expanding our knowledge about human behavior; it will strengthen the notions of the eyes of others being "some of the most important, emotionally-arousing, and meaningful biological stimuli in our environment"[268]

Eye Contact Slowing Time

Only recently have hypotheses concerned with the effect of the prolonged eye contact been tested. One result is presented in "A Longer Look at Time: Time Slows Down during Prolonged Eye Contact" (2012).[269] By placing participants in a natural setting and then testing two naive participants' estimation of 1 minute while sitting next to each other, either looking at the wall, looking at their partners profile or making eye contact with their partner, the researchers found the participants to make significantly longer time estimates when making eye contact, than during the other alternations. The experiment was also done with one participant facing a computer, which did not give the same result. The experiment based itself on the results of recent research, showing how subjective time estimates increases during arousing events. They predicted that time would seem to slow down during conditions in which the participants made eye contact with one another, due to the assumption that eye contact induces a high degree of arousal in brain activity. Further research have also been carried out, to be published in the article "Looking into the eyes slow down time" (2014).[270] Testing of the effect of time conception due to prolonged eye contact is still at a premature level, and further research is needed to reach a valid assumption.

[266] Ibid.
[267] Ibid.
[268] Chang & Platt, 2015.
[269] Jarick et al, 2012
[270] Ibid.

The Cognitive Neuronal Response is Present

By investigating the findings and results from neuroscience on how our brain responds when being exposed to mutual gaze, I present a new understanding of what occurred when the participant faced the gaze of Abramović in ”The Artist is Present”. The impact of mutual gaze to our cognitive and emotional responses demonstrates that ”The Artist is Present” would probably not evoke such strong reactions had the artist chosen to either go through with her initial idea of walking around in scaffolding placed in the gallery space or chosen almost any other form of communication with her audience.

I have presented recent scientific research on how mutual gaze may change our perception of time, the recent discovery of possible ”eye cells” in the emotional center – the amygdala - of our brain, and that the effect of another person’s gaze is so strong that it will affect our emotional center even when we are not aware of the gaze due to conditions such as cortical blindness. Representing the newest discovery on the physiological responses to the human gaze, these findings add interesting perspectives to the performance “The Artist is Present”, yet the lack of testing *in situ*, i.e. within the gallery setting prevents us from too far-reaching conclusions as to the application of the scientific results in the artistic setting.

Two of the most trusted notions of what happens during eye contact is ”the Eye contact effect”, describing the impossibility of ignoring the gaze of others, and thus completing the idea of the gaze as a powerful stimulus, and the ”Theory of mind” describing our concern with others and their intentions, associated with activation in a functional cluster of brain regions termed ”the Theory of Mind Network”.

If we apply ”The Eye Contact Effect” on the performative setting at MoMA the following can be stated as factual: our brain is immediately affected by looking into the eyes of Abramović, leading to immediate affective and cognitive reactions. It is particularly interesting to regard the emotional reactions in light of the strong activation of the emotional loop centered in the activation of the amygdala. This means, although we may experience an individual specter of emotions, thoughts and

reactions to the performance, there are certain cognitive processes we have no choice but to surrender to while sitting in front of Abramović and staring into her eyes staring back at us. Further, according to cognitive neuroscience, the four regions that make out the central contributors to the theory of mind network tells us that the spectator in front of Abramović are anatomically predisposed to have certain responses to the situation.

First of all, the recognition of her face is inevitable, and our associations of Abramović comes into play while we look into her eyes. If we, as some of the participators did, associate the face of Abramović with qualities of the holy, of energy and shamanistic presence, we could speculate in that these characteristics at some level will interfere with our cognitive recognition of her face, as the Fusiform Gyrus automatically will be strongly activated by the share recognition of this famous face, and as the STS will strongly react to her staring gaze. At the same time while the experience of being the object of Abramović's gaze is happening, the pSTS and the IPL-region will automatically attempt to figure out what Abramović is thinking or feeling. In other words, the testimonies of the many participators reflecting upon what they got from reading Abramović's face and their thoughts on what may have been going on in her mind is human nature at work, as engaging in mutual gaze causes our brain to ask these questions.

Lastly, as the automatic activation of the amygdala tells us, we are predisposed to have an immediate affective/emotional cognitive response when looking into the eyes of another human being. Although cognitive neuroscience is still concerned with mapping out the intricate details of the amygdala, there is consensus of the amygdala being both the central brain region in creating our emotional responses to sensory information, and that it reacts immediately to the gaze of others. This means, that the vast majority of the 1450 individuals sitting with Abramović, by the fact that they are human beings, had an emotional response to the work, a response that can be explained through millions of years of evolution.

Here, not only may we arrive at what may be the very core of how "The Artist is Present" became such a powerful experience for the participators and museum visitors, but we may reach an understanding of why this exact artwork became one of

the most popular pieces of contemporary art history. Not only was the performance based on social interaction between human beings, which science and common sense tells us are powerful and of high importance for all social beings; but here was also the very essence of our interaction with each other; eye contact.

In other words, ”The Artist is Present” is, compared to other pieces of both performative and non-performative art, more likely to have an effect, in this case, emotional due to the physiological responses caused by eye contact. The theory (1975) about the effect of eye contact[271] stressed the effect of eye contact on our bodily self-awareness; this has recently been proven by researchers at the Laboratory of Psychopathology and Neuropsychology in Paris. In their article ”Eye contact elicits bodily self-awareness in human adults” (2014), the authors present data supporting the theory of self-awareness becoming acuter when we are subjected to the gaze of another human. However, they do not see this in relation to the processes evoked by the arousal of the ”eye contact effect”, but rather as a separate self-awareness process caused by enhancing the self-focused attention in humans.[272]

In sum, when mutual gaze is one of the strongest stimuli we can be exposed to, and it automatically activates the emotional center of the brain, it makes out a possible explanation of the strong reactions of so many of the participants and the ring effect and attention it received from the rest of the world. The participator of the performance experienced a concentrated and anesthetized version of the strong stimulus of eye contact and was predisposed to instantly and automatically have a degree of emotional reaction to it.

[271] Argyle M. “Bodily Communication” *International Universities Press, Oxford England* (1975)
[272] Baltazar et. al “Eye contact elicits bodily self-awareness in human adults”, 2014.

Chapter 5 – Discussion

Due to my lasting fascination with the participants reactions to "The Artist is Present", and a belief that information provided by cognitive neuroscience could enhance our understanding of the impact this particular art work had on those participating, I presented the following issue in the Introduction: How does information from the field of neuroscience contribute to our understanding of the impact *The Artist is Present* had on its participators and the world as large, and should neuroscientific information be of consideration to our theoretical approaches to performance art?

I approach the first question of this issue by discussing the neuroscientific information in light of the two art theoretical understandings. This will be followed by an approach to the second question presented, through a larger elaboration on the relationship between art and science.

How will information from Neuroscience contribute?

The central information provided from modern day cognitive neuroscience research on the effects of engaging in mutual gaze is that the eyes of another

> a) is such a strong stimulus that it immediately affects our cognitive behaviour, making it impossible to ignore this stimulus.
> b) automatically activates the network of our brain involved in social interactions.
> c) immediately creates strong activity in the amygdala of the brain, which by neuroscientists is considered to be one of the most important emotional centers.

I answer the first question of the thesis by discussing this scientific understanding of mutual gaze in light of the two art theoretical approaches to performative art. The cultural and the socio-political understandings in Chapter 3 were presented due to my conviction that they represent the documented views of critics and the public on "The Artist is Present".

The Cultural Understanding vs. The Neuroscientific Understanding

In alignment with the title of the performance, the cultural understanding emphasizes the *actual presence* of the artist. Here, Abramović is the "the silent in the middle of the hell" as she reflected upon her role in the long-endurance performance. The cultural understanding acknowledges that, through her shamanistic talents concerned with energy, Abramović offers us the opportunity of engaging in a possible transformation by sitting with her. In the middle of busy and alienating New York City, she sits "almost priestly"[273] in the atrium of the MoMA and invites us to join her in a *presence* that for some changes the aspect of time. These sittings with Abramović evoke strong emotions, as it here is understood as a meeting with a new, unique energy from the artist.

Figure 30. Abramović photographed by Marco Anelli

Considering the power of mutual gaze on our cognitive abilities, one could understand the impact of the performance on the participants as being less affected by shamanistic energy and more by *the eye contact effect*. This suggests that a similar effect may have occurred if there was a different artist sitting there, or perhaps someone who was not an artist. Engaging in mutual gaze would immediately affect the two humans sitting there. There is also the possibility that the aspect of time changing rather is the effect of engaging in the prolonged gaze, as oppose to a result of Abramović's shamanistic talents. Further, it can be seen in relations to the effect of doing very little and attempting to be in this presence, which in psychology often is

[273] See Director Matthew Akers description in Chapter 3, p. 61

referred to as *mindfulness*.

Concepts from psychology can also be seen in relation to Fischer-Lichtes aesthetics about the transformative power of performance, as the latter is concerned with the effect of a constant exchange between humans. Further, one can draw lines to the discovery of the *mirror neurons* presented briefly in Chapter 1. Without further elaboration on this particular topic, I find it quite possible that concepts from social psychology would enhance our understanding of social interaction in performative settings, which Fischer-Lichte describes through what she has termed *the autopoietic feedback system.*

The strength of Fischer-Lichtes aesthetics is, however, that it takes into considerations the many elements of the performance which we, as described in Chapter 1, cannot access *truthfully* academically or scientifically. Further, the cultural understanding offers the possibility to view "The Artist is Present" in alignment with history, religion and cultural phenomena. When viewing the performance in the light of our cultural history of pilgrimage, to visit suffering ascetics or to compare it with religious beliefs of the gaze having healing qualities or offering an insight to "the other world"[274], "The Artist is Present" becomes *something more*. It describes the phenomenon of wanting to take part in something extraordinary, where the impact it has on us indicates that there must be something more, *a higher being*, than what we can sense on earth.

This higher being, whatever it is to whomever, becomes a reality for the person who believes in it. This implies that not being able to access this scientifically, or even being able to prove that the higher being is merely a belief and does not actually exist, will not necessarily affect those who experience it as part of their reality. Here, the cultural understanding of the aspects of "The Artist is Present", with the communities forming around the performance, outruns the pure neurocognitive perspectives. Art theory and the traditions of humanities understand reality as partially constructed by the human who experiences it, as opposed to there being universal truths about this reality. On this foundation, we are arguably better equipped in approaching cultural

[274] See p. 60-61

phenomena that hold great importance to humans, whether one can prove the effect of it or not.

At this moment it may be fruitful to introduce a recent (2013) article by N. J. Bullot and R. Reber with the title "The Artful Mind Meets Art History: Toward a Psycho-Historical Framework for the Science of Art Appreciation".[275] The scholars here discuss whether a psychological perspective alone can be applied if asking for people's reaction to an artwork. They maintain that on research about the cognition of artifacts, there can be identified three modes of appreciation: "basic exposure to an artwork, the artistic design stance, and artistic understanding. The artistic design stance, a requisite for artistic understanding, is an attitude whereby appreciators develop their sensitivity to art-historical contexts by means of inquiries into the making, authorship, and functions of artworks". The authors stress that the context under which the artwork was made has to be considered. This is what they define as the psycho-historical framework. Entering into the artistic design stance within the psycho-historical framework is a prerequisite to understand the artwork fully. This will, however, far from exclude scientific approaches to art and aesthetics: "we conclude that scientists can tackle fundamental questions about the nature and appreciation of art within the psycho-historical framework".

If applied on "The Artist is Present" this means that the context, the cultural background of the participants, the religious associations, etc. have to be considered as significant and as laying the ground for the psycho-historical framework; a pure neurocognitive approach will be a reduction of the broad specter of responses to the artwork; still there are fundamental aspects of the perceptual and neurocognitive mechanisms in our experience of art that can be measured by pure scientific methods.

The Neuroscientific Understanding vs. the Socio-political Understanding

What this critical perspective put emphasis on, is the context within which the performance takes place. The strict rules of how to behave in the performance, the theatrical setting, and the myriad of gazes from other people arguably represent the

[275] N. J. Bullot and R. Reber, "The Artful Mind Meets Art History: Toward a Psycho-Historical Framework for the Science of Art Appreciation", *Behaviour and Brain Sciences* 36(2), 123-37: 123. April, 2013.

element of something *inauthentic*.

Figure 31: Abramović on the last day of the performance, Photo by Marco Anelli

By understanding "The Artist is Present" as a spectacle, we critically view the institutional forces surrounding the performance art piece. In a society of the spectacle, social interactions are mediated by images. As I presented in Chapter 3, one aspect of the performance was the MoMA's online posting of photographic portraits of every visitor. This can be viewed as reducing the participator to appearances instead of full beings, but also as a pathway for the museum's marketing forces to access the world at large. The photographs of the deeply moved participants were shared world-wide, both through their online feeds, but also through mass-media, which is one of the ruling forces in Debord's theory about the spectacle. The socio-political understanding allows us to consider the deliberate marketing involved both in advance of and during the execution of "The Artist is Present". This provides us with an understanding of the impact it had on the world, based on viewing the reactions of the public in light of the expectations of those involved in creating it.

When it comes to the effect "The Artist is Present" had on the art world at large, the neuroscientific information is less suitable than the performance-theoretical approach.

Debord's theory, which attempts to describe the forces of the spectacle which has become our society, presents a self-fulfilling force consisting of multi-layered perspectives concerned with industrialization and mass-media. Although strictly at a discursive level, it highlights perspectives that arguably have been of little concern to the majority of opinions on "The Artist is Present". Approaching the same complex problematics in a reductionist matter would not be efficient.

However, the information provided by neuroscientific research on the mutual gaze enables us to approach the reactions of the participator. Amelia Jones experienced herself being reduced to the object of others gazes. When judging the many reactions of the participators, it seems that others did not share this experience. When viewing the neurological activations in the Theory of Mind network when exposed to mutual gaze, there is a strong activation within social networks, including the *superior temporal sulcus*, the *fusiform face area* , and the *prefrontal cortex*, but also in the emotional and memory networks within which the *amygdala* and *hippocampus* play a central role. The effect of the mutual gaze will, to a certain degree, not be affected by the surroundings or the context, but occur as a result of the human biology. Thus, despite any way we may understand the surroundings of the performance, there will still be the element of authenticity in the reaction of the participator. Although reduced to arguably being an *appearance* in both the atrium and the portraits online, the participant is in her own experience still a full human being and is reacting as a human being. Through this, "The Artist is Present" and the reactions of the spectators could be understood as not representing what we need, but who we *are.*

First concluding remark: Human Nature is Present

The cultural understanding has its strength in the way it takes into consideration the historical and cultural heritage as well as the contemporary context for "The Artist is Present". The socio-political understanding enables us to critically consider the marketing forces of the museum and institution, and the effect mass-media has on creating a spectacle or a phenomenon having an impact on the art world at large. As I will argue, one cannot explain the impact of the performance through a pure neurocognitive approach; we are living within a complex world driven by marketing, forces of mass-media and the internet. Moreover, our cultural preference for seeking

higher truths or beings demands a more nuanced understanding of the effect this very particular performance had on the world at large.

It is, however, through the neuroscientific understanding that we get knowledge about the biological effects of the mutual gaze. Hence, the neuro-scientific information contributes with a perspective that put emphasis on the participators and Abramović, not as a the meeting between a superior and an inferior or a view of the participators as commodities in a spectacle, but as *human beings*.

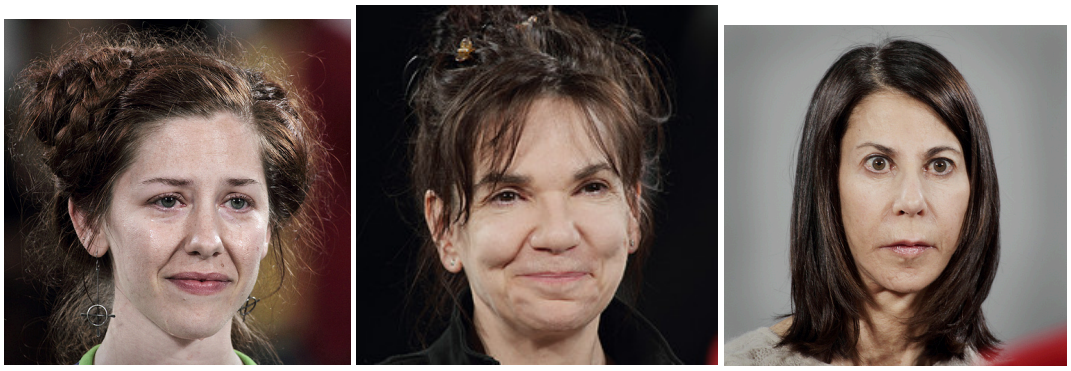


Figure 32. A Selection of Portraits of Participators by Marco Anelli

Translating this information into an interpretation of the work, enables us to view "The Artist is Present" in a universal perspective. Viewing the two human beings sitting in front of each other in the museum, while aware of the predisposed and prehistoric power of the mutual gaze onto our cognitive abilities, could make us reflect upon our heritage as human beings. Whatever surrounds us, whether it is a society of spectacle, marketing forces, the gazes of the others, we remain human beings, humans who are connected to one another to such a degree, that the simple act of looking into the eyes of one another will immediately affect them, and for many evoke great emotions. Our awareness of the neurological reactions involved in mutual gaze does not reduce the way we can view this performance. Compared with the cultural and sociopolitical interpretation, I will argue that the neuro-cognitive perspective enriches our understanding of the phenomenon "The Artist is Present".

Lastly, the neuro-cognitive perspective founds a possible understanding as to why the performance influenced Abramović to engage in future artistic collaborations with neuroscientists. Based on her own experience within the work, she found it necessary to approach the phenomenon of mutual gaze further scientifically. When approaching the second question of this thesis, one should take into consideration that the artist herself found it necessary to turn to scientific information in her further understanding of mutual gaze, and arguably few has had more firsthand experience of the effect of this phenomenon than her.

Should cognitive neuroscience be considered?

The second part of the issue presented, was the question of whether information derived from cognitive neuroscience should be considered when theoretically approaching a performance art work. I have found the answer to be more complex than stating a simple "yes".

In my research, I have not found any art theoretical work about performance art featuring information derived from cognitive neuroscience. Although studies of performance art commonly rely on interdisciplinary approaches, and thus tends to consider a very many different sources of information, there appears to have been less interest in applying data from the discipline of neuroscience to the academic work surrounding performance art.

In a time where technological innovation have led the field of cognitive neuroscience to engage in experimental research about how our eyes work and the effect of engaging in mutual eye contact, it is challenging to comprehend why this information have been neglected in the array of academic work concerned with "The Artist is Present". The fact that this work directly inspired Marina Abramović into founding an entire institute devoted to art work embracing neuroscience, but still have evoked little to no interest of comparing neuroscientific information to it could be viewed as neglecting. When facing any phenomenon, in this case one of the most influential art

work of contemporary times, do we not turn to any relevant discipline in the attempt to increase our understanding of it?

Neuroaesthetics and Performance Art

This very question has led to much empirical work in the field of *neuroaeshetics*. The experimental research have mainly been concerned with our response to paintings and music, discovering how our brain respond to things we view as beautiful or the therapeutic qualities in music. However, there has been some research applied to performative art, mainly dance.

This research has been concerned with what brain functions are involved in coordinating precise and beautiful movements of dance[276], the neural underpinnings of appreciating dance[277], the connection between learned choreography and musical recognition[278] and our perception of the emotional state of a human body from only watching its motion[279].

Performance art will always consist of a complex collection of visual stimuli and other aesthetical, sensual input occurring simultaneously. This may be one of the possible explanations as to why it has received little attention in the field of neuroaesthetics. This may further explain why cognitive neuroscience has not been of interest for academics approaching the complex, limitless and vague nature of what we refer to as performance art.

While the studies of performance art and the field of neuroscience are relatively new, the lack of interest for neuroscience when studying performance art is probably inherited from traditions of dispute between humanities and science. In order to depict a possible explanation as to why there has been no attempt of approaching the

---

[296] Cross, E. & Ticini, L. Neuroaesthetics and beyond: new horizons in applying the science of the brain to the art of dance, *Phenomenology and the Cognitive Sciences,* 2011

[277] Ibid.

[278] Olshansky et al . Supplementary Motor Area and Primary Auditory Cortex Activation in an Expert Break-dancer during the Kineshetic Motor Imagery of Dance to Music, *Neurocase: the Neural Basics of Cognition,* 2013

[279] Dittrich W et al."Perception of emotion from dynamic point-light displays represented in dance" *Perception* **25**(6) 727 – 738, 1996.

biological aspects of "The Artist is Present", I turn to the history of humanities and science. I consider the main historical and contemporary arguments for excluding neuroscientific information from art theoretical practices, before reaching my own conclusion on the matter.

A History of Resistance

In a clip from the documentary "*Particle Fever*" (2013), Physician Nima Arkani-Hamed (b. 1972), one of the project leaders of a gigantic device built over two decades, the Large Hadron Collider, and who reconstructed the conditions that occurred directly after The Big Bang, is attending a press conference the day prior to the first attempt of putting it into use. One audience member, an economist, questions what the economic gain from this project was, pointing out the fact that it is the most expensive experiment of our history. The scientist admits to have no idea. After emphasizing that great scientific discoveries don't grow from questions of economic gain, he answers that the only gain this experiment could provide us was "nothing other than just understanding everything"[280].

The answer by the physicist could have been poetry of an artist. So, why are there tendencies in the art community of viewing the scientist as not grasping complex matter, in this case being more like the economist worrying about financial gain?

The idea of separating academic disciplines appeared in the 19th Century. The term *scientist* was first presented by William Whewell (1794 – 1866) in 1833[281], and it was the discussion *"Literature and Science"* (1882) by Matthew Arnold that first discussed the relevance of classical education in an age of great scientific and technical advance.[282]

Becoming a sensation on both sides of the Atlantic when published, and still discussed today, the essay "The Two Cultures" (1959) by C. P. Snow (1905 – 1980) launched the debate on the increasing distinction between humanities and science. His main concern was the increased splitting of scientists and literary scholars into two

[280] Particle Fever, 2013: 19:00 – 21:00.
[281] Hull, David L. *Science as Process,* 1988: 37
[282] Whelan, Robert. *"Fifty years on, CP Snows "Two Cultures" are united in desperation,* 2009.

polar groups. Snow mainly view the literary representatives as responsible for this division, much to their view of own field as superior to science. Snow warns us that ”closing the gap between our cultures is a necessity in the most abstract, intellectual sense as well as in the most practical. When those two senses have grown apart, then no society is going to be able to think with wisdom”[283].

“Two Cultures” have been interpreted, reinterpreted and viewed from academic and political perspectives for half a century[284]. Although the essay could be considered a “cold war document”[285], and is based on narrow views on both art and science, it discusses attitudes towards science that still exists within circles of humanities.

Fundamental Differences

The disciplines of science and humanities have evolved from two epistemological traditions. Scientists traditionally search for *knowledge* in a belief that there is an implicit reality out there that holds universal truths[286]. These objective truths are in wait of being discovered. In other words, the epistemology of traditional scientific research differs far from the humanities epistemological views.

Practitioners of humanities have traditionally not been concerned with objective truth, as reality is viewed as fully or partially constructed by the human mind. This construction of reality is determined by phenomenology and linguistics, and is viewed through the current values and beliefs of particular times and places[287].

Representing such differing views in the world of knowledge; one can understand why conflicts arise. In a traditional sense, the scientists will attempt to discover the brain structures involved in processing aesthetic experiences and explain the aesthetic experience from information provided by hard data. The humanists may, however, stress the ambiguity of aesthetic experiences, the fact that numbers are human constructions and not truths as such, amongst other cultural, political and contextual considerations that should be involved in the specific experiment.

---

[283] Snow, C.P & Collini, S. *The Two Cultures*, 1998 (1957): 50
[284] Whelan, Robert, 2009.
[285] Dizikes, Peter. Our Two Cultures, *NY Times*, 03.19.2009.
[286] Ede, 2005: 16
[287] Ibid.

Shared Structural Intuitions

Professor Martin Kemp at University of Oxford, who has studied both natural sciences and art history, claim that "some aspect of structure is involved in all the deeper dialogues between the art and sciences", which he refers to as "structural intuitions"[288] The term derives from Kemp's conviction that similar structures are involved in the initial stages of an artwork or a scientific experiment. These structures revolve around the configurations and processes of nature, and the underlying impression that there is an order in the disorder, and that artists and scientist often have the same "(…) itch of looking at something in a spirit of wonder and then saying: I really want to know what that is about"[289]. Kemp illustrates this by pointing to the universal genius Leonardo da Vinci, whose studies of nature became works of art. As to the German artist Albrecht Dürer (1471 – 1528) Kemp notes that " (…) They are neither artists nor scientists, in that our pedestrian terminology simply fails to capture what they did in blending the deepest intellectual insight into the operations of nature with the highest imaginative acts of re-making"[290]

Whether one refers to it as "intuitional structures" or not, there are numerous examples throughout art history where scientists and artists have engaged in similar issues, leading to collaborations across the borders of epistemology. Especially the rise of industries, with its following technological developments including electrical dynamo, photography and cinematography sparked artist's interest in utilizing scientific devices. As an example, it is the belief that the scientific discovery of X-ray eventually inspired Pablo Picasso (1881 – 1973) into developing the painting style we refer to as *cubism*. Although the painters involved in this new genre did not specifically mention X-ray, they created paintings showing limbs simultaneously from top and bottom in the same matter as X-ray technologist had done with stereopticon cameras.[291]

---

[288] Kemp, Martin. Processes and Structures: The Art and Science of Nature in Nature. *Study Centre Mellon Lectures,* 2004
[289] Ibid.: 2
[290] Ibid: 6
[291] Kevles, Bettyann. *Naked to the Bone: Medical Imagining in the Twentieth Century*. Basic Books 1997: 125

Figure 33. Photography from 9 evenings: Theatre and Engineering, 1966.

Picasso, amongst other artists, found inspiration in the development of new technological devices, but due to scarce availability they were not able to operate these mechanics at first hand. However, during the second half of the 20th Century electronics became readily available, which imitated collaborations between scientists who managed to utilize it and artist who created new works from it.

The first major collaboration was presented in a series of performances called *"9 Evenings: Theatre and Engineering"* taking place in New York in 1966 **(See Figure 33).** After ten months of preparation, including 8500 engineering hours, initiative taker Robert Rauschenberg (1925 – 2008) and a group of nine other artists including John Cage created performance art works featuring advance technology managed by thirty engineers in total. During the nine evenings, audiences could experience a variety of work displaying use of television projections on a stage, an infrared television camera capturing actions in complete darkness and a Doppler sonar device translating movements into sound for the first time.[292]

Since then, collaborations and new innovative technology unthinkable of the time of

[292] Stiles, Kristine & Peter Howard Selz. *Theories and Documents of Contemporary Art: A Sourcebook of Artists Writings*. University of California Press, 1996: 414

the Industrial rise have contributed to widen our horizon of contemporary art. The possibility presented by Kemp, that there is a "structural intuition" shared by scientists and artists, implies that they connect at a deeper level, beneath the surface of humanities epistemology. Although differing in approaches, methods, designs and fundamental convictions, the theory implies that the two practices derive from the same desire to explore meaning and order, whether it results in Russian abstract artist Vasily Kandinsky's (1866 – 1944) "Painting with White Border" (1913) or the scientific creation of the Large Hadron Collider.

A New Academic Disease?

Although the scientists are welcomed into the studio of the artists, they still remain a stranger to some representatives from the field of humanities. When Snow described the two cultures of science and art in the 1960s, he described a world where the practitioners of humanities were viewed as superior to scientists. Thus, one can imagine why sparks ignite in humanities academic circles when visionary scientists make claims such as neurosciences providing "the first vestiges of what some of us hope will emerge in the future (…), a scientific understanding of aesthetics" like Oxford Professor in Chemistry Peter Atkins (b. 1940) claimed[293], or when Patricia Churchland (b. 1943) introduced the possibly intimidating concept of *Neurophilosopy* in 1986. Rather than viewing the latter as a cross-over project leading to possible, new understanding, it is described by philosopher of aesthetics Roger Scruton (b. 1944) as "the first major outbreak of a new academic disease"[294]. Scruton describes his understanding of the concept of neurosciences as:

> The brain is seen as a computer, 'hardwired' by evolution to deal with the long vanished problems of our hunter-gatherer ancestors, and operating in ways that are more transparent to the person with the scanner than to the person being scanned. Our own way of understanding ourselves must therefore be replaced by neuroscience, which rejects the whole enterprise of a specifically 'humane' understanding of the human condition.[295]

This view summarizes some of the main concerns that the fast-growing field of neuroscience have evoked. An art historian or a philosopher will always acknowledge

[293] Ede, 2005: 79
[294] Scruton, Roger. Brain drain. *The Spectator*, 03.12.2012
[295] Ibid.

the ambiguity and constructions involved in our understanding of self. However, through her human understanding of human conditions, she will remain responsible for her own view of herself and her world. The methods of neuroscience, however, relying on reducing ambiguity in search for objective data, challenges this view. Further, the idea that there exists a truth about who we are and how we act in the word, and that this truth is obtained by others than ourselves is directly opposite to the view of scholars of humanities. Thus, it is understandable that the belief in factual answers to questions that have challenged intellectuals for centuries appear to some as an "academic disease".

Psychiatrist Sally Satel and psychologist Scott O. Lillienfield elaborate on what they call a "neuro-centric" view on the mind, and the impossibility of fully understanding our subjective experiences through neuroscience. In "Brainwashed" (2013) they discuss the risks involved in reducing our understanding of ideas such as those of *selfhood* and *free will*. Satel and Lilliefield are concerned with the risk of neuroscience leading to challenges in interrogation rooms or courtrooms. These effects of neuroscience are also discussed by psychologists Green and Cohen, who present the possibility of neuroscience having a transformative effect on how we practice law[296].

In the article *"The seductive allure in Neuroscience explained"* (2008), an experiment tested the effect of neuroscientific rhetoric on our ability to critically consider a presented explanation. The results showed that the subjects were prone to prefer the explanation featuring neuroscientific information, although this information was completely irrelevant to the logic of the explanation[297].

These examples not only describe the possible revolutionary developments that neuroscience could lead us to, but also the risks involved in trusting the reducing of the large concepts of human behaviour, ideas and philosophy and relying solely on the idea that we consist of mechanic behaviour explained by our biology.

[296] Green, Joshua and Jonathan Cohen. For the Law, Neuroscience changes nothing and everything. The Royal Society, 26-11-2004
[297] Weisberg et. al. "The seductive allure of Neuroscience Explanations", *Journal of Cognitive Neuroscience*, March 2008, Vol. 20, No. 3, Pages 470-477

The Contemporary Debate on Neuroaesthetics

The neuroscientific search for a possibly attainable, objective truth about who we are, and perhaps the enormous recognition and support this field has received, have provoked scholars of humanities, who believe that no such truth exists. Thus, when the field of neuroscience begin to investigate the issues that rationally have been approached by theory and philosophy, heated debate arise.

A Critical Shift of Concern

Some of the exampled presented above are part of American essayist Arthur Krystal strong critics of neuroaesthetics and his concern on the reducing effect it may have on our intellectual *frisson.* Krystal is concerned with the discipline of humanities shrinking while neuroscience and our preference for brain-centered explanation expand. One of the critical pinpoints in his article "The Shrinking World of Ideas"[298] (2013), is that our focus has been shifted from being concerned with the meaning of ideas to being concerned with the means by which they are produced.

Krystal presents a summary on the evolution of intellectual thinking in modern times, favouring the days when ideas were considered to rule "both our emotions and our destinies." He discusses how the new approaches of post-modernism with its critical deconstruction and artists such as Andy Warhol (1928 – 1987) and John Cage being concerned with "anything being art"[299], eventually have led to the frisson of the old days being gone, meaning that "the intellectual energy [has] dissipated as historical memory"[300]. Ideas and our attempts to interpret them have been exchanged with data from neuroscience and experiments basing themselves on reduction. Krystal honors the professors who continue to teach English "the old-fashioned way", which has saved the humanities from becoming completely "revamped by the postmodern ethos". The postmodernists, however, is held responsible for opening up humanities to sciences, and particularly neuroscience. The new, analytical and deconstructive methods of postmodernism have, in Krystals opinion, "left us in a lurk", and has lead us to be more concerned with systematic and reductionist matters.

[298] Krystal, Arthur. "The Shrinking World of Ideas", *The Chronicle of Higher Education,* 11.21.2014
Note: the title was at some point changed from its original title "Neuroscience is ruining the humanities"
[299] Ibid.
[300] Ibid.

The same questions that always intrigued us—What is justice? What is the good life? What is morally valid? What is free will?—take a back seat to the biases embedded in our neural circuitry. Instead of grappling with the gods, we seem to be more interested in the topography of Mt. Olympus[301].

Although Krystal's views on the practices of humanities can be considered as rather dated, he forefronts here the main academic concern involved in our increasing preference for neuroscientific approaches: What happens if we attempt to explain legal matters, our human actions as a result of mechanical behaviour? Where are we headed when the philosophical question "What is free will?" is left behind in favour of a settlement on our will being the result of automatic, cognitive behaviour?

Measuring Beauty in Representations

The critic Stuart Kelly quotes a conversation between novelist Tom McCarthy (b. 1969) in conversation with philosopher Simon Critchley (b. 1960) in the critical article *"Art and Science Don't Mix"* (2012). The two are describing the application of neuroscience to the cultural arena as "one of the biggest follies of our era"[302]. The alleged conversation continues with the argument that "If you take a bit of [James] Joyce's brain and put it under the microscope, it's not going to explain Finnegan's Wake[303]." The conversation lands on the conclusion that "Neuroaesthetics is "absolute idiocy… a form of absolute certainty that will flatten all the complexity of culture and the beauty of it as well"[304].

Similar views are presented by Science writer Philip Ball (b. 1962) in his article "*Neuroaesthetics is killing your soul"* (2013). Ball explains the considerate economic investment in the emerging field of neuroscience as "(…) Having failed to 'find ourselves' in our genome, we're starting a search in the grey matter"[305]. Unlike Kelly, Ball opens for the possibility that neuroaesthetic may inform our artistic understanding and experience, but "will never wholly define or explain it"

[301] Krystal, Arthur. "The Shrinking World of Ideas", *The Chronicle of Higher Education*, 11.21.2014
[302] Kelly, Stuart. "Art and Science don't mix", *Scotsman* 2012
[303] Ibid.
[304] Ibid.
[305] Ball, Philip. "Neuroaesthetics are killing your soul", *Nature* 03.22.2013

One key issue discussed in both these articles, is the neuroaesthetics measuring of *beauty* when approaching art. Ball refers to the notion presented by neuroscientist and artist Bevil Conway (b. 1974) and musicologist Alexander that beauty is not a *scientific concept*, and thus it is difficult to even understand what neuroaesthetics is attempting to exam. Kelly stresses the measuring of "beauty" as representing a limiting view on art. As an example, he refers to an experiment conducted by the leading neuroaesthetic researcher professor Semir Zeki.

In a response to the critique by Kelly, Zeki describes the criticism against neuroaesthetics as interesting since it "(…) betrays a complete lack of understanding of the aims of neuroesthetics (…)"[306]. Zeki, who is accused of having naïve knowledge about art, points out how the article presenting the experiment in question stated that: "*From revulsion to awe and from laughter to enigma, art is more than a matter of 'beauty'*"[307] This contradicts Kelly's impression that scientists naively view the aesthetic experience as "the shiver down the spine, gooseflesh, a "feel good sensation"[308]. Zeki also stresses the misconception that neuroesthetics attempts to "explain" the aesthetic experience or a work of art. Instead, he describes it as "(…) an intellectual, experimental exercise in trying to learn something about the brain (…)"[309].

Two other main concerns presented by Kelly is who decides which paintings are "great art work" and which are "ugly paintings" and that neuroaesthetics bases itself on presenting subjects with *representations* of art work, as oppose to the actual, original works. Zeki addresses the first issue with the fact that no other than the subjects themselves rated the paintings. Zeki does not, however, address the problem of using representations of art works in neuroesthetic research.

When Kelly discuss the problematic reliance on representations, he quotes critic Walter Benjamin, who were especially concerned[310] with this topic, stating ""Even the most perfect reproduction of a work of art is lacking in one element: its presence

[306] Zeki, Semir. "The Fear of Neuroaesthetics", *The Creativity Post*, 04.23.2012
[307] Ibid.
[308] Kelly, 2012.
[309] Zeki, 2012.
[310] Walter Benjamin was one of the first concerned with the problem of representation in his 1936 essay "The Work Of Art In The Age Of Mechanical Reproduction"

in time and space, its unique existence at the place where it happens to be"[311].

Contemporary contributions to the debate on neuroscience, and especially neuroaesthetics, reveal that there are still fundamental issues left that must be concerned. How does one translate ambiguous and subjective aesthetics like beauty, or the sublime into scientific concepts? And how can it continue to rely on the use of representations, when the experience of encountering the original is arguably a different aesthetic experience?

As we see, there are several critical issues against studying aesthetics through the reductionist methods of neuroscience. But does this mean that humanities are better off without it?

Second Concluding Remark: Neuroscience as Art Theoretical *Input*

Figure 34: The Central Nervous System by Madeleine Strindberg

[311] Kelly, 2012.

Artist Madeleine Strindberg (b. 1955) uses fMRI scans to create paintings of the traceries of our central nervous system. In the painting **(See figure 34),** the traverse sections of the *medulla oblongota* float like butterflies over the yellow background. As writer of the book "Art and Science", Siân Ede points out: It "helps to know that the medulla oblongata controls bodily movement and the maintenance of equilibrium, so the butterflies' tentative balance is more meaningful intellectually"[312].

In this example, the knowledge provided by neuroscience adds an important layer to our art theoretical approach to the work. Our knowledge about the medulla oblongata enables us to reach a deeper understanding of both the artistic intentions behind it and the components it consists of, which otherwise we would have missed. In our theoretical approach to art work such as the example of Strindberg, should we resist neuroscience due to the arguments presented by Kelly and Krystal?

I am suggesting that the art historian should consider neuroscientific information on our physical and biological reactions to different phenomenon. I argue that perspectives derived from nature sciences should be of interest to a theoretical approach to a performance art piece, as the genre of performance art commonly bases itself on the interaction and "material" of human nature.

I argue that the results of cognitive neuroscientific research have provided a greater foundation for understanding the impact "The Artist is Present" had on its participants. Further, I conclude that the new information provided by the discipline of cognitive neuroscience should be considered valuable to the field of performance studies. However, at this early stage of research in cognitive neuroscience on performativity in art, much due to the ephemeral nature of performance art, I believe the relevance is greater when the works are concerned with one particular action, such as the focus on eye contact in "The Artist is Present", and also when the goal of the comparison is restricted to create a larger foundation for understanding the effect of a specific performance, *not* measuring the aesthetic value of it. Further, when engaging in dialogue with neuroscience, I argue that practitioners of

[312] Ede, 2005: 138

humanities will be able to enriching the scientists' understanding of art.

Martin Kemp exemplifies this in stating that "The musician can (…) introduce great complexity and subtlety which give the scientist a greater sense of humility about what science can achieve"[313] If we are willing to contribute to scientists understanding of how complex the aesthetic experience is, and its many layers that have been confronted by art historians for centuries, and if art historians are willing to learn about the complex fields of neuroaesthetics this will be a great and fruitful enrichment of both academic fields. Martin Kemp points out what he views a "perverted view of both science and art"[314] that exists in our era, where science is beneficial for all of us, while art is seen as something we don't really need. Is it not art historians and artists that first and foremost are equipped to challenge this view? New fields like neuroaesthetics may be able to *prove* certain aspects of our experience of making and experiencing art, which perhaps will change the perspective of art not being something we don't need. At the same time, with its limitations to measuring isolated components as oppose to complex situations, neuroscience will arguably never be able to fully measure the phenomenon of art and aesthetics. Still, instead of viewing the limitations of neuroaesthetics as a reason for it to be excluded from discourses of aesthetics, it can be seen as a testimony to why art is important in itself.

Although there are deep political, historical and academic issues involved in a discussion of neurological understandings of arts and its relation to humanities, I will strongly argue that it should not hinder us from considering any information enriching our understanding of a particular piece of art, or the art world as a whole.

In conclusion, based on my own approach to performance art with information from neuroscience, this new information should be considered when we attempt to understand an aesthetic phenomenon, as a supplement to the literature and theories involved in our art theoretical approach. Besides, to avoid new information, holding it to be irrelevant, since it does not fit one's own position, will never be fruitful; it is rather moving on the border to what may be considered ridiculous.

[313] Else, Liz. Art meets Science: Reuining the severed cultures. *NewScientiest*, 05.11.2010
[314] Ibid.

Further Thought: The Future of Performance Art and Theory

As mentioned in the Introduction, my attempts in adding neuroscientific information on the effects of eye contact to an artwork based on this interaction should first and foremost be considered as offering prospect for further thought.

In times where neuroscience provides us with new - at times revolutionary discoveries about human nature - it is necessary to embrace these realities as practitioners of humanities. It is also my belief that performance will conquer a larger part of the art world, as it presents us with human interaction in a world of technology, scientific developments that in many ways represent the opposite to the performing *body*. As these works commonly are defined by featuring interaction between human beings, I find it enthralling and inspiring to consider knowledge about human nature alongside the array of ideas and convictions represented in art theory.

Scientists, artists and engineers work together to present the digital dance performance "Hidden fields" (2012-2013), where dance merge with interactive graphics and soundscapes in order to interpret the dancers "as fields whose movement creates ripples and waves in an invisible sea of energy"[315]; are we then not in need of new information about the "Dance room-spectroscopy"-technology in order to approach this work theoretically? And when Australian performance artist Stelarc (b. 1946) presents his "alternative body architecture"[316] by growing a replica of his own ear on his arm in "Ear on Arm"-project (2006-2007), wanting to equip it with a microphone[317], is it sufficient to approach this work with cultural and sociopolitical perspectives alone?

When Marina Abramović builds an institute devoted to collaborations between art and science, an idea formed by experience of sharing gaze with the 1450 individuals participating in "The Artist is Present", should we not embrace the scientific aspects to works of one of our times most influential performance artists?

[315] http://danceroom-spec.com/project/dance-2/
[316] Zylinska, Joanna. *Bioethics in the Age of New Media*. Massachusets Institute of technology, 2009: 159
[317] Ibid, 203

The body can be considered the main pursuit in Abramovićs' performances. Perhaps it is her resistance to acknowledging the limits of the body that has lead her into exploring the world of neuroscience. Unlike the physical, bodily limits, the mind appears limitless. New technology and science offers possibilities of exploring our mind, the brain, its activity and reactions. Whereas the body as a performative tool has been the main material for performative work, it is not impossible that we will see new works rising from neurological foundations. Not only will this mark out new, exciting territory for artists to explore, but it demands a will to also pursuit these subjects through scientific information in order to reach a deeper understanding of this work as practitioners of art theory and history.

Literature

Abramović, Marina. "Marina Abramović on Performance Art". In *Marina Abramović: The Artist is Present*, edited by Klaus Biesenbach, p. 211. New York: Museum of Modern Art, 2010.

Adams, R.B Jr. R.G Franklin Jr. K. Kveraga, N. Ambady, R.E Kleck, P.J Whalen. N. Hadijikhani. A.J Nelson. "Amygdala Responses to Averted vs. Direct Gaze fear vary as function of presentation speed. *Soc Cogn. Affect Neurosci,* 2012

Adams, R. B., & Robert E. Kleck,. Perceived gaze direction and the processing of facial displays of emotion. *Psychological Science*, 14, 2003

Adams, R.B and Robert E. Kleck. Effects of Direct and Averted Gaze on the Perception of Facially Communicated Emotion. *Emotion*, 2005.

Alleyne, Richard. The Secret behind Mona Lisa's Enigmatic smile, *The Telegraph* 10-28-2009

Anelli, Marco. *Portraits in the Presence of Marina Abramović*. New York: Museum of Modern Art, 2012.

Argyle, M. *Bodily Communication*. International Universities Press, Oxford, England, 1975

Aronson, Arnold. *American avant-garde theatre: A History*. Routledge, 2000

Ball, Philip. "Neuroaesthetics are killing your soul", *Nature* 03.22.2013

Baltazar, M., Hazem, M. Vilarem, E. Beaucousin, V. Picq, J. Conty, L. "Eye Contact Elicits Bodily Self-Awareness in Human Adults". *Cognition*, Volume 133, Issue 1. P. 120-127, 2014.

Baron-Cohen S. *Mindblindness: an essay on autism and theory of mind*. Cambridge, MA: MIT Press, 1997.

Baron-Cohen, Simon. Theory of Mind in Normal Development and Autism. Prism, 174-183, 2001.

Bear, Mark F., Barry W. Connors and Michael A. Paradiso. *Neuroscience: Exploring the Brain*. Lippincott Williams & Wilkins. Third Edition, 2007.

Behrmann, M., G. Avidan, C.Thomas, M. Nishimura. "Impairments in Face Reception" in Oxford Handbook of Face Perception. Edited by G. Rhodes. A. Calder. M. Johnson. J.V. Haxby. Oxford University Press, 2011

Biesenbach, Klaus. Marina Abramović: The Artist is Present. New York: Museum of Modern Art, 2010.

Biesenbach, Klaus. "The Artist is Present, The Artists Was Present, The Artist Will Be Present". In Marina Abramović: The Artist is Present, edited by Klaus Biesenbach, p. 12-20. New York: Museum of Modern Art, 2010.

Bohm-Duchen, Monica. *The Private Life of a Masterpiece: Uncovering the Forgotten Secrets and Hidden Life Stories of Iconic Works of Art*. University of Carlifornia Press, 2001.

Brecht, Berthold. *Brecht on Theatre*. Translated by John Willett and edited by Marc Silberman, Steve Giles and Tom Kuhn. Bloomsbury, 1964

Brekke, Aase-Hilde. "Meditativt Nærvær?". Unpublished Masters Thesis. University of Oslo. 2012.

Brown, Steven & Ellen Dissanayake "The Arts are More Than Aesthetics: Neuroaesthetics as Narrow Aesthetics" in Neuoraesthetics. Edited by Martin Skov and Oshin Vartanian. Baywood Publishing, 2009: 44

Bullot, N. J. and R. Reber. N. J. Bullot and R. Reber, "The Artful Mind Meets Art History: Toward a Psycho-Historical Framework for the Science of Art Appreciation", *Behaviour and Brain Sciences* 36(2), 123-37: 123. April 2013

Burra, N. Hervais-Adelman, A. Kerzel, D. Tamietto, M. de Gelder, B. Pegna, A.J. "Amygdala Activating for Eye Contact Despite Complete Cortical Blindness" in *Journal of Neuroscience,* June, 2013.

Buskirk, Martha, "Kaprow's Vector" in *Found Sculpture and Photography from Surrealism to Contemporary Art*. Edited by Anna Dezeuze & Julia Kelly. Ashgate Pub., 2013

Calder, A.J. JD. Beaver. JS Winston. R.J. Dolan. R. Jenkins. E. Eger & R.N.A Henson "Separating Coding of Different Gaze Directions in the Superior Temporal Sulcus and Inferior Parietal Lobule", *Current Biology* 17, 20-25 2007

Calder AJ, Lawrence AD, Keane J, Scott SK, Owen AM, Christoffels I, Young AW. "Reading the mind from eye gaze". *Neuropsychologia*. P. 1129–1138 40: 2002

Carlson, Marwin "Introduction: Perspectives on performance: Germany and America" in *Transformative Power of Performance* by Erika Fischer-Lichte . 2008:

Carlson, Marwin. *Performance: A Critical Introduction*. Routledge, 2003.

Carroll, Mary Ellen. Flatley, Jonathan. Walker, Hamza. *MEC*. Steidl, 2010

Chang, Steve and Michael L. Platt. Amygdala: Eyes Wide Open. *Current Biology,* Volume 24, Issue 20, 2014.

Conty, L. & D. Gimmig, C. Belletier, N. George, P. Huguet· The Cost of Being Watched: Stroop Interference Increases under Concomitant Eye Contact·

Cognition, pp. 133–139 115 (1) (2010),

Conty, L., Tijus C, Hugueville L, Coelho E, George N. Searching for asymmetries in the detection of gaze contact versus averted gaze under different head views: a behavioural study. *Spatial Vision*.p.529–545. 19; 2006

Cotter, Holland. 700-Hour Silent Opera Reaches Finale at MOMA, *New York Times* 05-20- 2010.

Cross, E. & Ticini, L. Neuroaesthetics and beyond: New Horizons in Applying the Science of the Brain to the Art of Dance, *Phenomenology and the Cognitive Sciences*, 2011

Danto, Arthur C. "Danger and Disturbation: The Art of Marina Abramović". In Marina Abramović: The Artist is Present, edited by Klaus Biesenbach, p. 29-35. New York: Museum of Modern Art, 2010.

Danto, Arthur C. Sitting with Marina. *The Stone,* 05-23-2010

Davis, M. The Role of the Amygdala in Fear and Anxiety. Annual Review of Neuroscience. Vol 15. 353-375, 1992.

Debord, Guy. *Comments on The Society of the Spectacle (Radical Thinking).* Translated by Malcolm Imrie. Verso, 1998.

Debord, Guy. The Society of the Spectacle. Translated by Donald Nicholson-Smith. New York: Zone Books, 1994 (1967).

Derrida, Jacques. *Speech and Phenomena and Other Essays on Husserl's Theory of Signs.* Translated by David B. Allison, Evanston: Northwestern University Press, 1993

Dittrich W H, Troscianko T, Lea S E G, Morgan D. "Perception of emotion from dynamic point-light displays represented in dance" *Perception* **25**(6)

727 – 738, 1996

Dizikes, Peter. Our Two Cultures, *The New York Times,* 03.19.2009

Duchaine, B. Developmental Prosopagnosia: Cognitive, Neural and Developmental Investigations. in Oxford Handbook of Face Perception. Edited by G. Rhodes. A. Calder. M. Johnson. J.V. Haxby. Oxford University Press, 2011

Dwyer, Jim. "Confronting a Stranger, for Art". The *New York Times*, 04-02-2010.

Ede, Siân. Art & science. London, New York: I.B Tauris, 2005

Else, Liz. Art meets Science: Reuining the Severed Cultures. *NewScientiest,* 05.11.2010

Farroni, T. M. Menon, M.H. Johnson. Factors influencing Newborns' preference for faces with Eye Contact. *Journal of Experimental Child Psychology*, 95 (4). P. 298-308, 2006.

Farroni, T., C Sibra, G., Simion, F., & Johnson, M. H. Eye contact detection in humans from birth. *Proceedings of the National Academy of Sciences of the United States of America*, 99, 9602– 9605, 2002

Finch, Charlie. What Marina Wrought. *Artnet*

Fischer-Lichte, Erika. "Performance Art and Ritual: Bodies in Performance" in *Critical Concepts in Literary and Cultural Studies*. Edited by Philip Auslander. Routledge, 2003

Fischer-Lichte, Erika. *The Transformative Power of Performance*. Routledge, 2008.

Freedberg, D. & Vittorio Gallese. Motion, emotion and empathy in esthetic experience. Trends in Cognitive Science, Volume 11, Issue 5. 2007.

Gallagher, Helen L. & Christopher D. Frith. “Functional imaging of Theory of Mind” in *Trends in Cognitive Sciences*, Volume 7, Issue 2 , Pages 77–83 February 2003

Gold, Ian and Adina L. Roskies. “Philosophy of Neuroscience” in *The Oxford Handbook of Philosophy of Biology*. Edited by Michael Ruse. Oxford University Press, 2008.

Goldberg, Roselee. *Performance Art: From Futurism to Present.* Thames and Hudson, 1979.

Green, Joshua and Jonathan Cohen. For the Law, Neuroscience changes nothing and everything. *The Royal Society*, 26-11-2004

Greenwood, Elisabeth. Wait, Why Did That Woman Sit in the MoMA for 750 Hours?, *The Atlantic* 07-02-2012

Grimes, Dr. Hillary. *The late Victorian Gothic: Mental Science, the Uncanny and Scenes of writing*. Ashgate Publishing, 2011: 67

Hadjikhani, N. R. Hoge. J. Snyder & B. de Gelder. Pointing with the eyes: the role of gaze in communicating danger. Brain Cogn, 2008

Hein, G and RT. Knight. “Superior Temporal Sulcus --- It’s my Area. Or is it?” *Journal of Cognitive Neuroscience*, Dec 2008.

Hoffmann, Fred and Lisa Le Feure. *Chris Burden*. Thames and Hudson, 2007.

Hull, David L. *Science as Process*. University of Chicago Press, 1988: 37

Hunnius, S., & Geuze, R. H. Developmental changes in visual scanning of dynamic faces and abstract stimuli in infants: A longitudinal study. Infancy, 6, 231– 255, 2004

Iles, Chrissie. Marina Abramović and the Public: A Theater of Exchange. In Marina Abramović: The Artist is Present, edited by Klaus Biesenbach, p. 40-43. New York: Museum of Modern Art, 2010.

Jackman, Tom. Braco brings his Healing Gaze to Arlington, *Washington Post* 12.10.2010

Jalvig, Camilla. *Værk som handling: Performativitet, kunst og metode*. Museum Tusculanum Forlag, 2011.

Jarick, Michelle, Kaitlin Laidlaw, Vanja Alispahic and Alan Kingstone. "A Longer Look at Time: Time Slows Down During Prolonged Eye Contact". *Journal of Vision* Vol.12, 134. August 2012,

Jones, Amelia. *Body Art/Performing the Subject.* Univ of Minnesota Press, 1998

Jones, Amelia. «"The Artist is Present": Artistic Re-enactments and the Impossibility of Presence». The Drama Review, Volume 55, Number 1 (2011): 16 – 45

Kelly, Stuart. "Art and Science don't mix". The Scotsman. 01-03-2012. http://www.scotsman.com/lifestyle/arts/visual-arts/stuart-kelly-art-and-science-don-t-mix-1-2034135

Kemp, Martin. Processes and Structures: The Art and Science of Nature in Nature. *Study Centre Mellon Lectures*, 2004

Kennedy, Dennis. The Spectator and the Spectacle: Audiences in Modernity and Postmodernity. *Cambridge University Press*, 2009

Kennedy, Randy. Self-Mutilation is the Sincerest Form of Flattery. *New York Times*, 11.06.2005.

Kevles, Bettyann. *Naked to the Bone: Medical Imagining in the Twentieth Century*. Basic Books, 1997: 125

Krystal, Arthur. “The Shrinking World of Ideas”, *The Chronicle of Higher Education*, 11.21.2014

Lacan, Jacque, “The Split Between the Eye and The Gaze” in *The Four Fundamental Concepts of Psycho-analysis*. Edited by Jaques Alain-Miller. Translated by Alan Sheridan, W.W Norton & Company 1973 (1986)

Lanteaume, L. S. Kalfa, J. Regis, P. Marquis. P. Chauvel. F. Bartomolei. “Emotion Induction after Direct Intracerebral Stimulations of Human Amygdala” *Cereb Cortex,* 2007.

LeDoux, J. The Emotional Brain, Fear and The Amygdala. *Cellular and Molecular Neurobiology*, Vol 23, 2003

Levy, Mark. “Altnerned Consciousness and Modern Art” (327 – 354) in *Alternerning Consciousness: Multidisciplinary Perspectives*. Edited by Etzel Cardena og Michael J. Winckelmann. Praeger, 2011.

Lobmaier, J.S and D.I Perrett. The world smiles at me: Self-referential positivity bias when interpreting direction of attention. COgn Emot 25, 2011.

Lowry, Glenn D. “Foreword” in *Marina Abramović: The Artist is Present,* Edited by Klaus Biesenbach. Museum of Modern Art, 2010.

Marina Abramović: Entering the Other Side. Kistefos-museet, 2014.

McEvilley, Thomas. “Stages of Energy: Performance Art Ground Zero” in *Marina Abramović: Artist Body* by Pojana Pejic and Marina Abramović. Charta, 1998

Miranda, Carolina. “Ascetism as Art: Sitting Silent with Marina Abramović”, *WNYC Radio Station* 03-12-2010

Morin, Olivier. How Portraits turned their Eyes Upon us: Visual Preferences and Demographic Change in Cultural Evulution. *Evulution & Human Behaviour*, Volume 34, Issue 3. 222 – 229, 2013

Montelle, Yann-Pierre. *Paleoperformance: The Emerge of Theatricality as Social Practice*. Seagull Books London, 2009: 2

Mosher, C.P. Zimmermann, P.E. Gothard, K.M. "Neurons in the Monkey Amygdala Detect Eye Contact during Naturalistic Social Interactions". *Current Biology*, Volume 24, Issue 20, 2014.

Murray, Christopher John. *Encyclopedia of the Romantic Era 1760 – 1850*. Routledge, 2004: 5

Mursell, Gordon. *The Story of Christian Spirituality: Two Thousand Years from East to West*. Lion Publishing, 2001: 157

Myllineva, Aki and Jari K. Hietanen. "The is more to Eye Contact than meets the Eye", *Cognition* Volume 134, Pages 100–109, January 2015

Nanda, Serenda & Richard L. Warms. *Culture Counts: A Concise Introduction to Cultural Anthropology* , Cengange Learning, 2015: 207

O'Hagan, Shawn. "Interview: Marina Abramović". *The Guardian*, 10-03-2010

Olshansky, M.P. Bar, R.J., Fogarty, M. & DeSouza, J. F. X. Supplementary Motor Area and Primary Auditory Cortex Activation in an Expert Break-dancer during the Kinesthetic Motor Imagery of Dance to Music, *Neurocase: the Neural Basics of Cognition*, 2013

Orden, Erica. 2010. MoMA Attendance Hits Record High, *The Wall Street Journal* 06-29-2010

Orton, Karen. “Marina Abramović is Opening A School”. *Dazed Digital*, 08-09-2013.

Particle Fever (2013) Documentary movie directed by Robert Stone. 99 min

Phelan, Peggy. *Unmarked: The Politics of Performance*. London: Routledge, 1993

Prose, Francine. “When Art Makes us Cry.” *The New York Review of Books,* 09.06.2012

Postle, Bradley R. *Essentials of Cognitive Neuroscience*. Wiley Blackwell, 2015

Pussy Riot. *Pussy Riot!: A Punk Prayer for Freedom*. The feminist Press at CUNY, 2013

Ramachandran, Vilayanur S. & William Hernstein. The Science of Art: A Neurological Theory of Aesthetic Experience. *Journal of Consciousness Studies* 6, NO. 6 – 7, 1999.

Richards, Mary. *Marina Abramović*. Routledge, 2010.

Ross, Christine. *The Past is the Present: It’s the Future too*. Bloomsbury, 2012.

Saltz, Jerry. “In the end it was all about you.” *New York Magazine*, 05-21-2010

Sayre, Henry M. *The Object of Performance: The American Avant-garde since 1970.* University of Chicago Press, 1992.

Schechner, Richard. *Performance Studies: An Introduction*. Routledge, 2013.

Scruton, Roger. Brain drain. *The Spectator*, 03.12.2012

Senju, A. & M. Johnson. The Eye Contact Effect: Mechanisms and Development. *Trends in Cognitive Sciences* 13(3), p. 127 – 144, 2009

Senju, A., & Hasegawa, T. "Direct gaze captures visuospatial attention". *Visual Cognition* 12, 127 – 144, 2005

Skov, Martin & Oshin Vartanian. Introduction: What is neuroaesthetics?" in *Neuroaesthetics*. Edited by Martin Skov and Oshin Vartanian. Baywood Publishing, 2009

Smith, Owen F. *Fluxus: The History of an Attitude.* San Diego State University: 1998

Smith, Terry. *What is Contemporary Art?* University of Chicago Press, 2012

Snow, C.P & Collini, S. *The Two Cultures.* Cambridge University Press, 1998 (1957)

Sooke, Alastair. "Marina Abramović: 'It takes strong willpower to do what I do" *The Telegraph,* 07-02-2011.

Stanley, Caroline. "Meet the Man Who Sat With Abramović 14 Times". *Flavorwire* 05-10-2010.

Stiles, Kristine & Peter Howard Selz. *Theories and Documents of Contemporary Art: A Sourcebook of Artists Writings.* University of California Press, 1996

Taylor, Hannis & Hunt, Mary Lillie Taylor, *Cicero: A sketch of his life and works*, 1918

"The Artist is Present" Documentary movie directed by Matthew Akers and Jeff Dupre. 106 min.

The Artist Was Here, *The Economist* 09-15-2010 http://www.economist.com/node/17036088

Taylor, Rebecca. Marina Abramović: The Artist is Present. Essay featured on *Khan Academy.org*

Tóibín, Colm. Still Drama: Marina at MoMa. *The New York Review of Books* 04-21-2010

Vitebsky, Piers. *Shamanism.* University of Oklahoma Press, 2001

Vizcarrondo, Sara. "At the Present Time: Matthew Akers on 'Marina Abramović." *International Documentary Association*, 2012

von dem Hagen, E.A. R.S, Stoyanova, J.B. Rowe, S. Baron-Cohen, A.J. Calder. "Direct Gaze Elicits Atypical Activation of the Theory-of-Mind Network in Autism Spectrum Conditions". *Cereb Cortex*, Jun 2014.

von Grunau, M., & Anston, C. The detection of gaze direction: A stare-in-the-crowd effect. *Perception*, 24 (11), 1297–1313, 1995.

Wafaa Bilal. «3rdi.» Viewed 05-08-15. http://wafaabilal.com/thirdi/

Wafaa Bilal. «and Counting...» Viewed 05-08-15. http://wafaabilal.com/and-counting/

Westscott, James. *Artist Marina Abramović: I Have to be like a Mountain.* The Guardian. 03-19-2010.

Westscott, James. *When Marina Abramović Dies: A Biography*. The MIT Press: 2010

Weisberg, Deena Skolnick. Frank C. Keil, Joshua Goodstein, Elisabeth Rawson & Jeremy R. Gray "The seductive allure of Neuroscience Explanations", *Journal of Cognitive Neuroscience*, March 2008, Vol. 20, No. 3, Pages 470 - 477

Whelan, Robert. ”Fifty years on, CP Snows ”Two Cultures” are united in desperation.” *The Telegraph*, 05.05.2009.

Yoon, Jean and Yoko Ono. *The Yoko Ono Project*. Broken Jaw Press, 2002.

Zeki, Semir. “The Fear of Neuroaesthetics”, *The Creativity Post*, 04.23.2012

Zylinska, Joanna. *Bioethics in the Age of New Media*. Massachusetts Institute of Technology, 2009.

List of Illustrations

Found at http://blogs.artinfo.com/modernartnotes/2011/06/when-faith-moves-mountains-at-moma/ (05.02.15)

Figure 8, p. 25
Photography of The human brain as seen from behind. Beneath the occipital lobe is the cerebellum. Found at http://commons.wikimedia.org/wiki/File:Human_brain_NIH.jpg (05.10.15)

Figure 9, p. 26.
The lobes of the human brain. Found at http://www.dimensiontoday.com/latest-technology-news-updates/brain-mapping-project-how-secrets-of-human-brain-will-be-unlocked-04215.html (05.10.15)

Figure 10, p. 27
Transverse section of the human brain. Found at http://galleryhip.com/brain-hemispheres-corpus-callosum.html (05.10.15)

Figure 11, p. 28
Nerve cells (Purkinje cells) of the cerebellum. Golgi stained by Boleslaw Srebro, Department of Physiology, University of Bergen.

Figure 12, p. 31
A drawing demonstrating fire patterns in the monkeys brain. From Freedberg, D. & Vittorio Gallese. Motion, emotion and empathy in esthetic experience. Trends in Cognitive Science, Volume 11, Issue 5. 2007.

Figure 13, p. 32
Francisco Goya. *Los Desastres de la Guerra* (Disasters of War: Biblioteque Nationale, Paris, France).

Figure 14, p. 32
Marc McGowan nailing his foot into the gallery wall during the exhibition "The impossibility of art in the mind". Bergens Tidende 24.09.2012

Figure 15, p. 35

Marco Anelli, "Portraits in the presence of Marina Abramović", 2010. A photography of Marina Abramović during the period of "The Artist is Present" at Museum of Modern Art. Printed with the permission of © Marco Anelli

Figure 16 A&B , p. 37

Still photography from the performance of "Rhythm 0" (1974)
Found at http://uk.phaidon.com/agenda/art/picture-galleries/2010/march/22/documenting-the-performance-art-of-marina-abramovi-in-pictures/?idx=11&idx=11 and https://zeespring.wordpress.com/2013/10/20/marina-abramovic-rhythm-0/ (05.08.15)

Figure 17, p. 38

Still photography from a performance of "Nightsea Crossing" in Japan, 1985.
Found at https://twelvearchives.wordpress.com/2013/07/08/xo-skeleton-marina-abramovi-and-ulay-nightsea/ (05.12.15)

Figure 18. p. 39

Photography of "Rest Energy" (1980)
Found at http://uk.phaidon.com/agenda/art/picture-galleries/2010/march/22/documenting-the-performance-art-of-marina-abramovi-in-pictures/?idx=9&idx=9 (05.01.15)

Figure 19, p. 40

"Golden Mask" (2009) by Marina Abramović.
Found at http://artobserved.com/2010/06/go-see-new-york-marina-abramovic-at-sean-kelly-gallery-through-june-19th-2010/ (04.12.15)

Figure 20, p. 43

Still photography from "Measuring the Magic of Mutual Gaze"(2012)
Found at https://files.nyu.edu/sd1083/public/research_all.html (04.12.15)

Figure 21, p. 43

Marco Anelli, "Portraits in the presence of Marina Abramović", 2010. A photography

taken during the performance of "The Artist is Present" at Museum of Modern Art. Printed with the permission of © Marco Anelli
http://www.marcoanelli.com/portraits-in-the-presence-of-marina-abramovic/

Figure 22, p.
A Photography of "The Artist is Present" from the top-floor of the Museum.
Found at
http://commons.wikimedia.org/wiki/File:Marina_Abramovi%C4%87,_The_Artist_Is_Present,_2010_%284421751197%29.jpg (04.01.15)

Figure 23, p. 57
Photography-series from the performance of "Imponderabilia" (1977)
Found at http://pixgood.com/marina-abramovic-ulay-imponderabilia.html (05.12.15)

Figure 24, p. 64
A Photography of Matthew Akers filming Marina Abramović during "The Artist is Present" at the MoMA in 2010.
Found at http://pixshark.com/marina-abramovic-the-artist-is-present-celebrities.htm (05.12.15)

Figure 25, p. 66
A photography of people at the cinema by J. R. Eyerman featured in LIFE Magazine in 1952. Found at http://carladeconti.com/blog/?p=6110 (05.12.15)

Figure 26, p. 75
A Figure from Senju & Johnson, 2009. Senju, A. & M. Johnson. The Eye Contact Effect: Mechanisms and Development. *Trends in Cognitive Sciences* 13(3), p. 127 – 144, 2009

Figure 27A & B, p. 76
Figures showing the superior temporal sulcus and the Inferior Parietal Lobule Found at http://commons.wikimedia.org/wiki/File:Gray726_superior_temporal_sulcus.svg (05.10.15)

Figure 28, p. 77
A figure showing the placement of Fusiform Gyrus. Found at http://imgbuddy.com/fusiform-gyrus.asp (05.10.15)

Figure 29, p. 78
A Figure showing the placement of the Amygdala. Found at http://captain-nitrogen.tumblr.com/post/36598838686/social-networks (05.10.15)

Figure 30, p. 85
Marco Anelli, "Portraits in the presence of Marina Abramović", 2010. .Photography of Marina Abramović. Printed with the permission of © Marco Anelli http://www.marcoanelli.com/portraits-in-the-presence-of-marina-abramovic/

Figure 31, p. 88
Marco Anelli, "Portraits in the presence of Marina Abramović", 2010. .Photography of Marina Abramović on the final day of the performance. Printed with the permission of © Marco Anelli

Figure 32, p. 90
Marco Anelli, "Portraits in the presence of Marina Abramović", 2010. A selection of portraits from the portrait series photographed during "The Artist is Present" at Museum of Modern Art. Printed with the permission of © Marco Anelli http://www.marcoanelli.com/portraits-in-the-presence-of-marina-abramovic/

Figure 33, p. 96
A Photography from the Performance of "9 Evenings: Theatre and Engineering" Found at http://www.arnolfini.org.uk/blog/9-evenings-theatre-and-engineering (05.11.15)

Figure 34, p.102
"The Central Nervous System", Painting by Madeleine Strindberg. Found at http://madeleinestrindberg.typepad.com/madeleine_strindberg/ce.html (04.15.15)