Embodied Creation and Perception in Olafur Eliasson’s and Carsten Höller’s Projects

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“A work of art which did not begin in emotion is not art.”

Cézanne

Abstract: This paper examines the relationship between somaesthetics and several art projects by Olafur Eliasson and Carsten Höller. Involving an embodied, perceptual, and interactive dialogue between artist, viewer, and the environmental surroundings, these artworks aim not only to enhance our aesthetic experience and to increase our awareness of the body in space and in action, but also, through their artistic means of enhancing embodied and environmental awareness, to benefit life more generally.

Keywords: somaesthetics, cross-disciplinary installation, active participation, art of living.

The purpose of this paper is to focus on the relationship between somaesthetics and several art projects by two prominent artists: Olafur Eliasson and Carsten Höller. Their projects visualize basic elements of somaesthetics, particularly with regard to embodied creation and perception, the interactive dialogue with the viewer and the surroundings, the unification of art and experience as well as the hope of being able to benefit life. Olafur Eliasson replaces the static perfection of perspective with a bodily experience. According to him spaces are - and ought to be - experienced via our movement through those spaces over time. Only then does a true sense of spatiality arise. Viewers become involved in the artistic process which gives rise to an awareness of their own presence and their relationship with the environment. Carsten Höller creates cross-disciplinary installations, often allowing exhibition visitors to experiment on themselves, and inviting viewers to be active participants.
He has established a new bridge between art, real life and praxis and challenged our somatic habits and contribute to the art of living.

Visual art and natural science are two independent fields of knowledge, which leave different traces and directions in our cultural environment. But a closer study of the long cultural history of Western Europe reveals the visual arts as the art form with the closest correlation to the natural sciences and technology. Many visual artists have sharpened and broadened their perception by assimilating and adapting scientific researchers’ discoveries of new concepts and conditions for our view of nature. Observation, experience and experimentation are the starting point for the endeavors of both artists and scientists to attain new insight. Even though they are entirely different in character, a central focus of the artistic and scientific working process is a direct approach to the surrounding world, matter and space.

In our era, it is the science of chaos in particular that reveals common areas of cognition between art and science. First and foremost the preoccupation with time, change, the specific event, lines of demarcation, the concept of the interdisciplinary, a new view of nature and the concept of form. ¹ Or, as the Nobel Prize winner in chemistry, Ilya Prigogine expresses it:

Scientific knowledge, which we have removed from an inspiring or supernatural dream of revelation, can today reveal itself as ‘poetic listening’ to nature and its processes, a means that is available for production and invention in an open, productive and creative world. The time has come for new pacts with nature - pacts which we have entered into with nature since heathen times, but have since forgotten - pacts between human history, society, knowledge and their adventurous investigation of nature.²

The many new digital tools and other new technologies, which constantly create dramatic changes in our society, have conquered the art world increasingly over the past 50 years. One of the art forms to have been developed in numerous and unexpected ways in the last 30 years is installation art. It often combines video and computer graphics with other artistic strategies to create a space for experience that has a richly expressive power and many layers of meaning. This art form can develop a sense of free spaciousness, in that it relates to a multifaceted network of relationships to both a variety of artistic and scientific discourses as well as to

² Ilya Prigogine and Isabelle Stengers, Order out of Chaos. Manís new dialogue with nature, New York. But the quotation can only be found in the enlarged version of Order out of Chaos, translated into Danish by J. Witt-Hansen and L. Lauritsen. The title is Den nye pagt mellem mennesket og universet, Ask, 1985, p. 386.
institutions and different media.

Many artists have also created new art forms based on a reshaping of new
technologies with a focus on embodied creation and perception. Their works
can be seen as visual parallels to, or directly inspired by, Richard Shusterman’s
somaesthetics, which is - as he has remarked -

A natural extension of my work in pragmatist aesthetics. Bringing aesthetics closer
to the realm of life and practice, I realized, entails bringing the body more centrally
into aesthetic focus, since all life and practice - all perception, cognition and action - is
crucially performed through the body.\(^3\)

Two essential messages of somaesthetics are embodied transactional experience
and experimentation. He defines this as follows:

Experience forms the generating core of my pragmatist philosophy, in theory and in
practice. Most of my philosophical views derive from experiences outside the library,
seminar room and the philosophical texts I have read. (--) Experience for me, implies
experimentation, creative exploration and involvement.\(^4\)

Shusterman has a vital focus on lived experience and its influence on self-
knowledge. The experience is never “passive reception, mechanical habit or
distanced observation.”\(^5\) Thus an artwork is never complete until the viewer has
experienced and interpreted its particular qualities. This is why there is always
an interaction between the artwork, the viewer, and the viewing experience. As
Shusterman writes:

“So conceived experience can be a helpful notion for appreciating the
varieties of energy, value, meaning, knowledge, and behavior that extend beneath
and beyond the realm of intellectual thought.”\(^6\) In both philosophy and art, he aims
for the realization of “the aesthetic experience of collaborative creation, and even
the cognitive gains from exploring new practices that provoke new sensations,
spur new energies and attitudes, and thus probe one’s current limits and perhaps
transcend them to transform the self.”\(^7\) Another “key and distinctive pragmatist

\(^4\) Richard Shusterman, ” A Philosopher in Darkness and Light. Practical Somaesthetics and Photographic Art” and in French
translation, “Un Philosophe en ombre et en lumière,” in Lucidité: Vues de l’intérieur/Lucidity: Inward Views, ed. Anne-
Marie Ninacs (Montreal: Le Mois de la Photo à Montréal, 2011, p. 280.
\(^5\) Richard Shusterman, op. cit., p. 280.
\(^6\) Shusterman, ”Intellectualism and the Field of Aesthetics: The Return of the Repressed”, Revue International de Philosophie,
220, 202, p. 331. See also Wojciech Malecki, Embodying Pragmatism. Richard Shusterman’s Philosophie and Literary Theory,
Berlin, p. 25.
\(^7\) See the catalogue for the exhibition Aesthetic Transactions. Pragmatist Philosophy through Art and Life, curated by Richard
orientation is the meliorist goal of making things better (...) deconstructing or circumventing various obstacles and opening thought and life to new and promising options.”

I will be highlighting a series of projects created by two outstanding artists whose works, in different ways, contain visualizations of the basic themes in Shusterman's somaesthetics. Their projects are based on various forms of technology - including new technologies - which seek, from a series of perspectives, to improve the quality of life of the individual or society's aesthetic values whilst also addressing environmental objectives. Through their works they draw us out of the fixed framework of everyday life and provide space for new experiences and insights and thus have a liberating function. But finally these works also establish in many surprising and unexpected ways, new connections between art and architecture and are thus able to create new orientations and new perspectives in the society.

A new version of these themes is visualized with an original and surprising use of color technologies and artificially produced fog in the installations created by the forceful Danish-Icelandic artist Olafur Eliasson in, for example, Your Uncertain Shadow (Berlin, 2011) Feelings are Facts (Beijing, 2010) and The Weather Project (Tate Modern, London, 2003) (fig. 1). In the latter project he employed a:

semi-circular disc made up of hundreds of monochromatic lamps which radiated yellow light. The ceiling in the big hall in Tate Modern was covered with a huge mirror, in which visitors could see themselves as tiny black shadows against a mass of orange light.\(^9\)

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8 Richard Shusterman, "What Pragmatism Means to Me, Ten Principles", Revue française d'études américaines, no. 124, 2e trimester 2010, p. 64.

The visitor’s active participation is of vital importance in this project and evoked a powerful sensory experience. Many visitors responded to the exhibition by lying on their backs and waving their arms and legs. In this project Susan May discovered a phenomenological approach of ‘stepping out’ in order to ‘see ourselves seeing’ echoing the theories of the French philosopher Maurice Merleau-Ponty. He asserted that in order fully to understand the nature of perception, we must take a step back from it so that we no longer view objects in the world through the lens of perception but make perception itself an object of consciousness.¹⁰

Olafur Eliasson received his degree from the Royal Danish Academy of Fine Arts in 1995 and is a former student of mine. Over the past 15 years he has become an increasingly central figure in the contemporary art world. He established Studio Olafur Eliasson in Berlin in 1995. It is now connected with his professorship in the Academy and is a laboratory for spatial research. The relationship between man, urban space, and nature is one of his main interests both in his art as well as his teaching. He has participated in a very great number of exhibitions in the East and the West including the Guggenheim Museum, New York, MoMA, and museums in San Francisco, Sydney, Los Angeles, Madrid, Paris, Berlin, Barcelona, Beijing, Copenhagen and London.

Olafur Eliasson was commissioned by The Public Art Fund and New York City to create four man-made waterfalls called the New York City Waterfalls (fig. 2). They were placed in the historic New York Harbor (the gateway to America for nearly four centuries) and highlighted New York’s natural environment alongside the City’s industrial and commercial landscape. The installation ran from June 26 through October 13, 2008. “The New York City Waterfalls were constructed using building elements that are ubiquitous throughout New York: scaffolding is the backbone of the structures, and pumps bring water from the East River to the top; the water then falls from heights of 90 to120 feet back into the river.” But “fish and aquatic life are protected by filtering the water through intake pools suspended in the river.” To build the Waterfalls, The Public Art Fund partnered with Tishman Construction Corporation that engaged a team of design, engineering and construction professionals.\textsuperscript{11} The project also highlights the recent renaissance of the City’s waterfront.

I have tried to work with today’s complex notion of public spaces,” says Eliasson. “The Waterfalls appear in the midst of the dense social, environmental, and political tissue that makes up the heart of New York City. They will give people the possibility to reconsider their relationships to these spectacular surroundings, and I hope they will evoke individual experiences and enhance a sense of collectivity.

He hoped that when New Yorkers encountered the Waterfalls, forgotten memories will surface and that new aspects of the harbor, which they had not noticed before, would be revealed. Or as Eliasson expresses it: “You take the water around Manhattan for granted.” To help restore our sense of engagement with that landscape, he wants “to make water explicit.” It is a phrase he employs often. “Falling water, it makes a sound, it engages a whole different range of senses. You see gravity. To make it

\textsuperscript{11} See New York City Waterfall http://www.nyfalls.com/nycwaterfalls.html.
explicit is to take it, hold it up, and let it fall.” The Public Fund, New York, who financed the waterfalls, highlight the fact that they draw nature into the city and stimulate us to find new answers to problems that are raised in the encounter with art, history, ethics and ecology.

Eliasson explained that the first waterfall, which was located under Brooklyn Bridge (fig. 2) is “about the history of the city and how it is used” - both at night as well as during the daytime. Jerry Salz emphasizes that this waterfall “is especially captivating and seems to appear out of nowhere like a portal from another dimension.”


12 All the quotes come from interviews that Eliasson has given in connection with the “Inauguration of the Waterfalls.”
The second waterfall was at “Brooklyn Heights, which is the classic place where one” - as Eliasson remarks - “looks out at the city’s skyline (fig. 3). It is the gaze of the flaneur, if you like, the city seen from a secure distance, from a kind of suburb.” Jerry Salz remarks that the waterfall “almost rises up from the surface of the water.”


14 See note 7, p. 12.
The third waterfall was located at Pier 35 near Chinatown in lower Manhattan. It was - emphasizes Eliasson - “the closest I could get to industry and social housing.” (fig. 4).

The fourth waterfall was located on the North shore of Governors Island (fig. 5).15

![Image of Olafur Eliasson's Waterfall](image)


The Waterfalls set focus on the areas that they are situated in and underline the fact that the public space is not neutral, but pervaded by social, political and judicial structures. Eliasson has not sought to recreate nature, which is why he has not hidden the scaffolding and materials. He regards the waterfalls as both natural and cultural phenomena.

Jerry Salz described his overall impression of Eliasson's *Waterfalls* as follows:

Eliasson's falls aren't about spectacle. They're like still centers that put you in touch with the physical world around you. They magically stretch the space of lower Manhattan, making the city seem as grand and amazing as it really is. Concentrating on the falls, you begin to glean the different geographic, economic and industrial environments along the riverfront, how light plays between buildings and water, the way this setting is in constant motion but also oddly still.16

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One of Eliasson’s most recent large-scale permanent projects in urban space is called *Your rainbow panorama* and was completed in 2011. It hovers on top of the ARoS Aarhus Art Museum in Jutland, Denmark. It consists of a 150 foot long and three-foot wide circular corridor made of glass in every conceivable color. It has a diameter of 52 meters and is mounted on slender pillars 3.5 meters above the museum’s roof. Solid steel structures were installed on the museum roof in preparation for the 250-ton artwork. The sequence of colors in *Your rainbow panorama* can be seen throughout the city - by day and by night - and appears as an emblem for ARoS and as a landmark for Aarhus (fig. 6).


The museum itself, which was built by the Danish architectural firm schmidt hammer lassen, is a square-shaped building. An impressive interplay between the floating circular rainbow and the compact square building is thus created. Through this interplay, Eliasson wanted to honor Leonardo da Vinci and his drawing of the *Vetruvian Man* standing in a circle and a square. It is precisely the location of Eliason’s rainbow on the roof of the museum that enables it to create a striking visualization of the relationship between architecture, art and the surrounding sky. This is why it is interpreted as a symbol of eternity or the heavenly dimension, whilst the museum, with its great diversity of artworks and changing exhibitions
is seen as a symbol of the earthly dimension, where the law of transformation prevails (fig. 7).

The museum’s director, Jens Erik Sørensen describes *Your rainbow panorama* as “a giant sundial and a visual calendar charting the cycle of the year. From the various positions in the sky the sun sends its rays through the colored glass, shedding colored light on different houses and flats in central Aarhus by turn.”\(^{17}\)

The play of color and light has general overall relevance for the project’s artistic quality and expressive impact. Carsten Thau describes it as follows:

> The sequence of colors in *Your rainbow panorama* has been built in accordance with the subtractive primary colors cyan, magenta and yellow. It features a uniformly colored foil inserted between a double layer of glass, and each pane of glass can be reproduced in large series on the basis of a specific formula.\(^{18}\)

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According to him “spaces are - and should be - experienced via our movement through those spaces. Only then does a true sense of spatiality arise.”

The relationship between color and movement is very much in focus in his project. He describes it as follows:

In *Your rainbow panorama* I was particularly interested in the interplay between color and movement. I have put a ring of colored glass around the visitors; a materialized spectrum of all the colors that make up daylight; a kind of rainbow or color wheel. But there is also a different color circle: the one you produce in your own eyes, which shifts in relation to the colors you walk through as you move within the work.

Eliasson called his project *Your rainbow panorama*. With the word “your” he wants to stimulate the viewers’ own experience and active participation. For him, it is important that the viewers’ and the artist’s experiences of the surrounding world constantly encounter and enrich each other. He has described this point of view in terms, which echo a general theme in Shusterman’s somaesthetics. “When I

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19 Carsten Thau, *op. cit.*, p. 69.
create an exhibition, I try not only to see the works from my own point of view, but very much also from that of the participant.”

It is a matter of discovering what sensing is. “By looking at nature” says Olafur Eliasson, “I do not find nature, but on the other hand I discover my own relationship to an outdoor space.” Thus it is important to persuade viewers to see themselves sensing. Eliasson emphasizes that it “requires you to be able to see yourself from various angles – to have a kind of double view.”

For him, the body has become a dynamic, interactive, sensual consciousness. The spectators experience with their entire body the continually changing sequences of colors. When they walk around Your rainbow panorama, they soon realize that the colors affect their experience and began thinking about how it is done. Because “the colors are not just something you see the city through. You also feel them with your body.”

Eliasson is a good example of an artist who – as Shusterman expresses it – “thinks through the body.” His perception of our bodies and the body in art is best characterized by what Shusterman calls “a living body” because “all perception, cognition and action is crucially performed through the body.”

It is precisely these characteristics that the art critic Lisbeth Bonde highlights in her characterization of Eliasson’s art:

Eliasson’s practice is characterized by his constant exploration of the mankind’s interaction with the surrounding world. In the boundaries between science and aesthetics, rational contemplation and sense-based experiences, culture and nature, Eliasson’s art makes us aware of the ways in which we orientate ourselves physically and mentally in our surroundings.

In recent years, the visual arts have attained an increasing importance in Richard Shusterman’s somaesthetic optic and this has been one of the new challenges he has accepted. More and more of our prominent artists have been inspired by, and incorporated aspects of, his aesthetics into their artistic processes. Some of them have learned of them from reading Pragmatist Aesthetics: Living Beauty, Rethinking Art (1992), which has stimulated them to immerse themselves further in his

21 Olafur Eliasson At se sig selv sanses. Samtaler med Olafur Eliasson (To see yourself sensing. Conversations with Olafur Eliasson), Copenhagen, 2004, p. 54.
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theoretical and practical practice in the art world. This has resulted in more artists asking him to contribute to their exhibition catalogue or contacting him in other contexts.

The prominent German installation artist Carsten Höller was one of the first artists to approach Shusterman after reading Pragmatist Aesthetics, which echoed his own artistic perception of the importance of corporeality in all aspects of human life. While studying the work, he discovered that there were also parallels to his own understanding of the unification of art, science and life and the embodied participation of the public in artworks.

Höller creates cross-disciplinary installations, often allowing exhibition visitors to experiment on themselves, and inviting viewers to be active participants. In 1996, he asked Shusterman to write the catalogue text for the provocative and interactive installation House for Pigs and People (1997) that he was creating with Rosemarie Trockel for Documenta X (1997). The French philosopher Jean Baudrillard described this impressive installation as follows:

Reaching up on tiptoe to see over a fence, spectators look down on a pigsty, while a large mirror opposite allows them to see themselves observing pigs. Then they walk round the shelter and park themselves behind the mirror, which turns out to be a two-way mirror through which they can once again see the pigs, but at the same time also see the spectators opposite looking at the pigs – spectators unaware, or at least pretending to be unaware, that they are being observed. This is the contemporary version of Velásquez's Las Meninas, and Michel Foucault's analysis of the classical age of representation.27

In his catalogue essay on this work Shusterman analyzed this project from the somaesthetic perspective as well as characterizing some of the basic ideas in aesthetics that relate to art in particular. This applies first and foremost to the destruction of “the crusty old dogma that firmly divides art from real life and praxis,” but it is also a criticism of the closed world of the gallery, the so-called “white cube.” It is, says Shusterman, important to emphasize that “art’s highest aim is not to make a few admirable objects in a world filled with misery, but to create a better world through the work such objects can generate.” These views are also visualized in an individualized manner in Höller’s and Trockel’s works. This takes place in such a way that “a concretely embodied reality” is created, which - as Shusterman formulates it – shows that “art can play a powerful role in changing other realities by changing our perception, attitudes and consequent actions.” House for Pigs and People cast a critical light on the sacred concept of autonomy.

and the often closed world of galleries and museums, in which – as Shusterman expresses it – “the artist is boxed out from the power to enlighten and move the multitudes toward the creation of a better world.”28 On the one hand, Höller and Trockel are “evoking art’s potential for real world improvement,” but on the other hand, they also reveal “art’s actual limits and impotence.”29 Visitors view the pigs behind the glass in much the same way as we often settle for simply viewing rather than involving ourselves with groups of people who exist on the periphery of society. As Shusterman notes, “they are seen through the one-way glass of sociocultural privilege.”30

Höller has used many of his later sculptures or installations as platforms for interactions with participants and visual dialogues with the surroundings. They challenge our somatic habits and contribute to the art of living by enhancing our bodily awareness and thus approach one of the important artistic aims of Shusterman’s somaesthetics. One example is Test Site, which was installed in the Turbine Hall of the Tate Modern in 2006.31 This huge project “comprised five spiraling tubular slides that ran from the upper floors of the gallery to ground level. Sliding down, especially from the higher levels, was an experience that was both physically and psychically intense.” Using peoples’ experience as what Höller calls “raw material” he created a work of art that was “centered around, and dependent upon, visitor’s participation.”32 (fig. 9).

30 Ibid.
The art historian Dorothea von Hantelman has expressed the fusion of subject and object in this interactive work through sliding as follows: "The visitor's experience is (...) not just an important part of the work; it is the work and it is the meaning of the work." In Test Site the glass plate separating the artwork and the viewer has disappeared. The viewer actually acts as a co-creator. Mark Windsor summarizes the impact of the interactive Test Site on both viewers, the environment and our perception of urban planning:

Test Site poses a threat to urban spatial practices because it prompts an awareness of the pacific control exerted by structured spaces by offering an alternative; one that activates the individual's imaginative capacity against the institutions that suppress it.

The Test Site changes every fixed position and opens up to a more dynamic space but it also changes one's normal conventional lifestyle. Höller has expressed this viewpoint in the following way:

The Turbine Hall installation is called Test Site because it enables visitors to test the functions of differently shaped slides, mainly to see how they are affected by them, to test what it really means to slide. Again, this applies both for those who actively engage in the process of sliding, and those who watch. People coming down the slides have a particular expression on their faces, they're affected and to some degree 'changed.' This aspect of my installation is very spectacular, as you said, because the performers become spectators (of their own inner spectacle) while going down the slides, and are being watched at the same time by those outside the slides. I'd like to suggest that using slides on an everyday basis could change us, just as other commodities are changing us. (Fig.10).

34 Mark Windsor, op. cit., p. 9.
Viewer participation is a key to all of Carsten Höller’s sculptures and larger projects. But it is never an end in itself. Rather, it is a way to test his ideas concerning human perception and physiological reactions. He shatters what Shusterman calls the “false barrier between art and action, that trivializes art and robs its power for positive praxis.”

Carsten Höller has a doctorate in biology and has often used his knowledge and training as a scientist in his many sculptures and installations. He focuses particularly on the nature of human relations and nature itself. In the last five years, he has realized several works with the fly-agaric mushroom, including the *Mushroom Suitcase Series* and the *Upside Down Mushroom Room* (2000), which was shown in 2005 at MOCA in Los Angeles. These sculptures vary in size from 1 meter to 2.6 meters. In the large park at Ordrupgaard Art Museum near Copenhagen, Höller has erected the three meter tall *Giant Triple Mushroom*. It is an enlarged replica of mushrooms occurring in the wild in Eurasia. Half the composition of the mushroom is a free interpretation of the fly-agaric mushroom (*Amanita Muscaria*), which is poisonous and psychoactive, the other half consists of two other mushrooms he has selected (fig. 11).

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Höller used many different materials to create the Giant Triple Mushroom: polyester, paint, synthetic resin, acrylic paint, wire, kit, polyurethane foam, stainless steel. This sculpture is - much like many of his other works - very clearly site specific. It was unveiled on 6 June 2014 and was created specially for the museum’s park, which has the feel of a Romantic garden, with small, winding paths along which are set a variety of sculptures including those of the Danish artist Jeppe Hein. The many groups of large trees provide the park with a special profile. Giant Triple Mushroom rises up, almost majestically, and finds its own platform next to the large trees. It appears almost to have chosen the site itself and grown there.

Standing next to it, one feels like Thumbelina in the story by the writer Hans Christian Andersen, who is small in comparison to the large burdock leaves. The sculpture creates a new sense of scale in the park and transforms guests into small beings while creating its own magical sphere (fig. 12). Höller has rightly said of his sculptures, “they offer the possibility of unique inner experiences that can be used for the exploration of the self.”

37 Interview with Carsten Höller by Vincent Honoré, op. cit.
The projects of Olafur Eliasson, and Carsten Höller, which are all based on different types of technology, visualize – as we have seen – some basic elements of Shusterman’s somaesthetics. Particularly when it comes to embodied creation and perception, the interactive dialogue with the viewer and the surroundings, the unification of art and experience as well as the hope of being able to inspire and benefit life. But it is precisely this aesthetic that has also revealed new aspects of the works of the artists discussed here. It has thus demonstrated that there are several
outstanding artists, who in this precise and intense way, have a new and stimulating understanding of the body’s role in the arts, viewing it as a resource for working on the problems of creating and interpreting art and improving the quality of our life and society as such. It is precisely these essential elements in Shusterman’s conception of art, which will be able to provide a great deal of inspiration for the artists of our time. Shusterman’s somaesthetics appeals not only to an artistic elite, but also to the whole spectrum of our cultural and social life, which it provides with new ideas and inspiration.

Endnotes

Photo credits: Olafur Eliasson Studio (1-8) Tate Modern. London (9-10), Art Museum Ordrupgaard, Denmark (11-12).

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