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A Phenomenological “Aesthetics of Isolation” as Environmental Aesthetics for an Era of Ubiquitous Art

Abstract

Here the concept of the human being as a “relatively isolated system” developed in Ingarden’s later phenomenology is adapted into an “aesthetics of isolation” that complements conventional environmental aesthetics. Such an aesthetics of isolation is especially relevant, given the growing “aesthetic overload” brought about by ubiquitous computing and new forms of art and aesthetic experience such as those involving virtual reality, interactive online performance art, and artificial creativity.

Keywords

aesthetic overload, isolation, environmental aesthetics, Ingarden, Berleant

Introduction

Our world is filled with billions of desktop and laptop computers, smartphones, tablets, and other networked devices that serve not only as tools for workplace productivity, entertainment, and social interaction but also as portals to the world of art and aesthetic experience. Such technologies offer new ways of accessing previously existing forms of art like classical music, literature, film, and paintings; they also facilitate the development of entirely new forms of art, such as interactive art utilizing augmented or virtual reality, performance art involving the livestreaming of events captured with

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wearable cameras, and collaborative performances involving participants from around the world. Thanks to such technologies, a growing sphere of new and historical human artistic creativity awaits at our fingertips wherever we go. Moreover, ongoing developments in artificial intelligence and robotics mean that the ubiquitous computers that fill our lives do not simply convey artistic products created by human artists; increasingly, such technologies are capable of creating art themselves.

Within this context, Docherty has highlighted the growing phenomenon of “aesthetic overload”: in today’s world, works of art and opportunities for aesthetic experience surround us everywhere—and yet the effect of this artistic deluge is to impair rather than enhance our ability to enjoy meaningful aesthetic experiences (Docherty 2006, 68). The philosophical implications of this aesthetic overload become more complex when we consider the fact that one of the more prevalent and innovative approaches to contemporary aesthetics—that found in the diverse field of environmental aesthetics—essentially urges us to become more open to our environment and not more closed to it. Seemingly contrasting perspectives are thus offered on the question of whether contemporary human beings should seek to become “more open” or “more selective” in their embrace of aesthetic experience.

In confronting such a reality, it is especially appropriate and useful to ask what insights phenomenology might be able to offer: as a philosophical approach, phenomenology is particularly sensitive to the contents of human sensory, emotional, and intellectual experience, to the nuances of the way in which the world manifests itself to us, and to questions of presence and absence. From a phenomenological perspective, how do we understand the aesthetic overload of the modern world and its relationship to contemporary environmental aesthetics—and what sort of response might we formulate? This text attempts to answer such questions by further exploring a line of thought developed by Polish phenomenologist Roman Ingarden shortly before his death in 1970: namely, his concept of the human being as a “relatively isolated system” whose involvement with the world is characterized by a complex and selective interplay of openness and closure, of engagement and detachment. Ingarden’s concept has enjoyed considerable influence within the fields of systems theory and cybernetics;¹ however, within the field of contemporary philosophical aesthetics, his notion of the human being as a relatively isolated system is not often discussed. In part, this may be due to the fact that his final (and arguably most substantive) exploration

¹ Ingarden’s later thought on relatively isolated systems is considered innovative and influential enough that he has been counted among the more significant figures in the history of Polish cybernetics. See Sienkiewicz, Wojtala 1991, 197–199.

of the concept was presented as part of an investigation into the ontological foundations of human responsibility and not in the context of aesthetics. It is not known to what extent, if any, Ingarden might have developed a new phenomenological aesthetics grounded explicitly in his mature concept of the relatively isolated system, had he lived longer.

Here we investigate what such an aesthetics might look like and how it relates to our world's growing aesthetic overload. First, we present an overview of Ingarden's concept of the human being as a relatively isolated system. Second, we show how that concept can be applied to create an aesthetics of artistic creativity, aesthetic experience, and involvement in the world that is explicitly grounded in a phenomenology of isolation. Third, we compare and contrast this phenomenological "aesthetics of isolation" with the contemporary approach to aesthetic experience and engagement with the world offered by environmental aesthetics. We suggest that by highlighting the value of our (partial) isolation from the world, an aesthetics of isolation complements traditional environmental aesthetics and its emphasis on human openness to and oneness with the environment. Indeed, an Ingardenian aesthetics of isolation might be understood as a unique type of environmental aesthetics that can make an especially valuable contribution to the cultivation of meaningful aesthetic experience in an era of ubiquitous artwork.

1. Ingarden's Concept of the Human Being as a Relatively Isolated System

The line of thought that would eventually culminate in Ingarden's mature concept of the human being as a "relatively isolated system" can be found in works as early as *O poznawaniu dzieła literackiego*, published in 1937, in which Ingarden develops a notion of the biological organism as a hierarchical structural-functional system and then uses that concept to investigate suggestions (made by Dilthey and others) that literary works bear similarities to biological organisms (see Ingarden 1957, 47–49). Ingarden further elaborated such thought over the next thirty years. His final vision of the human being as a "relatively isolated system" would be presented in his text *Über die Verantwortung: Ihre ontischen Fundamente*, written shortly before his death in 1970 as an exploration of the ontological basis of human freedom and responsibility.²

² In 1968, Ingarden presented a paper on "Ästhetik und Kunstphilosophie" at the XIV International Philosophical Congress in Vienna; he later expanded that text into the book *Über die Verantwortung: Ihre ontischen Fundamente*, published in 1970, which

1.1. The Human Unity of Body, Soul, and «I»

In Ingarden's mature model, a human being consists of three parts: (1) a physical body, which is identified with a person's "biological organism" and whose function is to maintain the continued life of the individual and propagation of the species; (2) a soul that is the site of unconscious (or preconscious) sensory experiences, emotional states, and personality; and (3) an «I» that possesses a stream of conscious awareness and is capable of many forms of intentionality, including acts of thought and volition. The «I» serves as the "organizing center" of the soul that "personifies" it and "speaks" in its name (Ingarden 1987, 128, 143–46).

All living organisms possess a body, and many of the more complex types of animals appear to possess a soul; however human beings are the only entities known to possess an intentional «I». Ingarden explicitly excludes any Cartesian dualism from his model: for him, neither the soul nor «I» is a heterogenous entity bolted onto a material body; rather the «I»'s stream of consciousness finds its "ontic foundation" in both the body and the soul (Ingarden 1987, 123, 143). At the same time, neither the soul nor the «I» can be reduced to the physical structures or dynamics of the body. While the exact manner in which the soul and the «I» emerge from the physical biological organism is left unclear, Ingarden's thought appears broadly compatible with the emergentism described in Bertalanffy's General System Theory and more recent frameworks like DeLanda's assemblage theory.³

1.2. Partial Isolation from the Environment and from One's Self

There are two key ways in which such a tripartite human being is "partially isolated." First, the body includes mechanisms that partially isolate the human being from the causal influence of its external environment. Second, there are internal mechanisms that partially isolate the three parts of the human being from one another (Ingarden 1987, 131–134). One might think of these isolating mechanisms (or "isolators") as membranes separating one element or subsystem from another. The fundamental property of such iso-

was translated into Polish as "O odpowiedzialności i jej podstawach ontycznych" ("On responsibility and its ontic foundations"), within a collection of his texts on human nature, *Książeczka o człowieku*. See Ingarden 1987, 169.

³ See von Bertalanffy 1969 and DeLanda 2011, with its investigation of the critical role of gradients and selective "membranes" of various types in the emergence of life, animal intelligence, and human memory, language, and culture.

lators is that they are selective: they allow certain types of causal influence to pass through them while blocking others. This selectivity has a two-fold value: on the one hand, it allows the entity enclosed by such a membrane to successfully receive and assimilate those things existing beyond its boundary (like nutrients, energy, or information) that are necessary for its proper functioning; on the other hand, the entity's inner workings are protected from undesirable external influences and can thus operate in a manner free from distraction or interference (Ingarden 1987, 131–132, 138). It is such isolators that make possible whatever freedom we experience within our conscious intentional «I».

1.3. The Human Body as an Isolator

In any given moment, for example, the cells of the human body are being causally impacted by countless forces and objects arriving from the outside world—from cosmic rays, radio waves, magnetic fields, ultraviolet light, and sound waves to all of the airborne molecules that press against our skin and enter our lungs. The body itself constitutes a physical record of such effects and of the myriad biological processes occurring within its cells at a particular moment. And yet, our being is constructed in such a way that our mind is oblivious to the overwhelming majority of such subatomic- or molecular-level events occurring within the body. In a sense, the body “possesses” such information about itself and the outside world, but it is inaccessible to the soul and the «I»; the body's sensory systems screen out most of those causal influences, partially isolating the mind from its own body and from the outside world (Ingarden 1987, 136–139).

1.4. The Isolation of the «I» from Body and Soul

Similarly, the soul can be said to (unconsciously) “experience” all the sense impressions that it receives from the body, along with its own moods and emotional states. The soul experiences the ambient sounds that we hear in the environment around us; it feels the temperature and unique scent of the air and “knows” the current position of our limbs and our degree of hunger; it is the soul that continually experiences the joy or frustration that characterizes our emotional state. In principle, this information is accessible to the conscious awareness of the «I», and if the «I» makes an intentional effort to ask, “What is my body feeling in this moment? What sort of mood am I in?”, suddenly this information begins to become present to its conscious awareness (Ingarden 1987, 144–146). But normally the «I» is oblivious to most of the soul's fleeting sense impressions and emotions; such information is

screened out so that the «I» can focus its attention on its desired matters and make decisions without being overwhelmed and distracted by a sea of irrelevant data (Ingarden 1987, 138–140).

1.5. Examples of Particular Isolating Mechanisms within the Human Being

Ingarden identifies numerous isolating mechanisms at work within the human being. For example, our memory partially isolates the present «I» from the world of its past; only some of our sensory experiences and conscious mental activities become consolidated into long-term memories, and when recalled, those memories are never as vivid or detailed as our current conscious experience (Ingarden 1987, 141–142). We also spend part of each day in a sleeping state in which the body is still being affected by causal influences from the outside world but the intentional «I» is blocked from receiving sense impressions that convey information about those influences (Ingarden 1987, 140–141). The fact that it takes a brief but measurable amount of time for sense data to traverse our nervous system and reach our brain also means that we never truly experience the world as it “now” exists; we are always experiencing the world as it existed a moment ago. Our corporeality thus temporally isolates us from our external environment. For Ingarden, this extends the “freedom” of the «I» by granting the «I» an additional moment in which it can act uninfluenced by events that have already happened in the world (Ingarden 1987, 146–147).

2. (Re)constructing an Ingardenian “Aesthetics of Isolation”

Although Ingarden did not explicitly develop such a phenomenology of isolation into an “aesthetics of isolation,” it is possible to find indications of what such an aesthetics might look like. For example, building on Bergson’s observations, Ingarden notes that as an instrument for gathering information from the environment, each of our sensory organs ignores the overwhelming majority of effects created within it by forces arriving from the outside world; it isolates the soul and «I» from the information that such influences could potentially yield. Instead, each sensory organ allows only a tiny, specialized selection of processes occurring in the external world to enter and interact with it in a functional way that results in the sensory organ conveying sense data inward toward the conscious core of the human being (Ingarden 1987, 137).

In the case of our eyes and ears, it is only electromagnetic radiation and sound waves falling within a certain narrow range of frequency and intensity that are allowed through our body's screens to generate sense impressions for the soul and the «I» (Ingarden 1987, 137–138). One might suppose that when our eyes are "closed" we are sensorily shut off from the world, and when our eyes are "open" we are experiencing the world. But the point emphasized by an aesthetics of isolation is that even when our eyes are "open," they are still closed to the majority of the processes occurring right in front of us in the world and to the information that they could offer.

2.1. The Artistic Product as the Vestiges of Reality That Are Not Blocked Out

In this view, the everyday natural world of our experience—the *Lebenswelt* in which we exercise artistic creativity and enjoy aesthetic experiences—is not the world that positively reveals itself but rather the scant sliver that remains after most of reality has been blocked out and concealed from us. An aesthetics of isolation challenges the notion that understands paintings, sculptures, and architectural works as primarily "positive" constructs built up by adding and assembling components; it calls us to consider the way in which such artistic products are actually the perceptible "residue" that remain after most of reality has been filtered away.

The view of artistic products as the remnants that survive after a process of screening or deletion is not a new one. In Madrigal XII, Michelangelo writes that within the rough block of stone there exists "*Una viva figura, / Che là più cresce u' più la pietra scema*"—or, as Roscoe renders it, "The more the marble wastes / The more the statue grows" (Buonarroti 1900, 36; Fletcher Roscoe 1868, 169). Similarly, in Sonnet XV, Michelangelo suggests that a sculptor cannot form any concept for a sculpture that does not already find its realization hidden within the unhewn block, ready to be revealed by removing portions of the stone.⁴ Within the context of an aesthetics of isolation, one might think of the rough stone block as the fullness of the world's objective reality; the completed statue is what is left for us to experience—the natural world of our everyday lives—after our body and soul have screened out most of the world's reality, thereby "sheltering" the «I» from it. Just as there is an infinite variety of statues that might be derived from a single unhewn block of stone, there are countless "worlds" of experience

⁴ "Non ha l' ottimo artista alcun concetto, / Ch' un marmo solo in sè non circonscri-
va / Col suo soverchio [...]" (Buonarroti 1904, 17).

that might be derived from the single objective reality, depending on which of its causal influences a living being's isolators screen out and which they allow to provide content for the being's conscious awareness.

2.2. The Dynamism of Partial Isolation and the Variety of Aesthetic Experience

Ingarden suggests that human isolating mechanisms are dynamic: they can change over the course of our lifetime as we grow and develop; they can, to some extent, be altered by medical disorders, drugs, spiritual practices or psychological techniques, or acts of will; and they can be overpowered or destroyed by particularly forceful stimuli. In this way, flows of causality and information that were once closed may become open, or *vice versa* (Ingarden 1987, 144–145). Our artistic creativity and aesthetic experiences can be affected by such changes to our isolating mechanisms; conversely, in principle, artistic productivity and the purposeful cultivation of aesthetic experiences might be used to “stretch” or “narrow” the windows of our isolators and shift their focus, thereby altering the types of sensory and emotional information that we receive within the conscious awareness of our «I». The fact that human beings' isolators vary in strength and selectivity might partly account for the fact that different people can enjoy very different aesthetic experiences of the same artistic product. Similarly, some of the great artists seem to “see” and “hear” and “experience” reality differently than typical human beings: in some cases, that unique way of being in the world might result from atypical sensory, emotional, and intellectual mechanisms that artists possess which reveal aspects of the world from which most people are isolated.

2.3. The Human Being as a Perpetual Architect of Partial Isolation

From among all the arts, there appears to be a particular link between a human being as relatively isolated system and the artistic practice of architecture. Pearson and Richards note that thinkers like Heidegger, Merleau-Ponty, Bachelard, Zimmerman, and others have (in different ways) identified our human ability to “dwell” within a space—rather than simply be “located” within it—as something that distinguishes us from other types of living creatures.⁵ An aesthetics of isolation highlights the active, continuous, and essential role that different elements of our being play in constructing

⁵ See Pearson, Richards 1994, 2, and its appraisal of Zimmerman 1985.

such dwelling-places. If we think of architecture as the process by which we "impose a schema on space"⁶ or as the dynamics which "shape spaces, boundaries, and pathways that structure individual behaviors and social acts" (Fisher 2016), then from their first moments, our body, soul, and «I» are inherently "architectural" and "architecting": by their very nature they possess and employ an array of physical, sensory, emotional, and intentional isolators that create boundaries whose structures first segregate "inside" from "outside," "present" from "past," and then allow the carefully regulated passage of information and objects between those spheres.

3. The Aesthetics of Isolation as a Complement and Counterpart to Contemporary Environmental Aesthetics

In surveying contemporary environmental aesthetics, Carlson distinguishes two approaches: (1) "cognitive, conceptual, or narrative positions" which hold that aesthetic appreciation of the environment depends on human beings' possession of some particular "knowledge and information" about nature, such as that which the natural sciences offer; and (2) "non-cognitive, non-conceptual, or ambient approaches" which hold that human beings' aesthetic appreciation of the environment can arise from other dynamics such as "engagement, emotion arousal, or imagination." What both approaches share is a sense that modern aesthetics had come to focus too narrowly on human beings' interaction with artificially constructed works of art like paintings, sculptures, and musical compositions; in doing so, aesthetic thought neglected our ability to derive rich aesthetic experiences from interactions with our broader environment, including with the natural world (Carlson 2016).

3.1. The "Openness" Emphasized by Cognitive Environmental Aesthetics

At the heart of both approaches is a sense that authentic aesthetic experience depends on an *openness* to one's environment. The more open one becomes, the more opportunities arise for meaningful aesthetic experience. In the case of cognitive approaches, such "openness" includes a basic physical openness of one's sensory organs to those elements of the natural world that are revealing themselves, as well as an intellectual openness to the knowledge that science can provide regarding the complexity and rich-

⁶ See Tuan 1977, 36, and its discussion in Pearson, Richards 1994, 9.

ness of nature; emotional openness is not particularly relevant. Foster notes that such approaches are often oriented toward the “factual” (Foster 1998, 129). Such facts about one’s environment are found in accurate sensory perceptions and scientific knowledge; without these, one might enjoy a powerful emotional response to the sight of some landscape, but it will not rise to the level of a full aesthetic experience. From the perspective of an Ingardenian phenomenology of isolation, one might say that such cognitive approaches emphasize the value of widening (and perhaps redirecting) the “windows” through which the isolators of one’s body allow selected sense data to reach the soul, the soul allows sense impressions to reach the «I», and the «I» allows sense impressions (and scientific knowledge) to enter its conscious awareness.

3.2. The “Openness” Emphasized by Non-cognitive Environmental Aesthetics

In the case of non-cognitive environmental aesthetics, the positively valued form of “openness” to one’s environment is less dependent on one’s eagerness to receive certain semantic content and more dependent on a willingness to experience, ponder, and appreciate those emotions spurred by one’s immersion in the environment. Foster suggests that the non-cognitive approach calls us to “open ourselves to the immensity of what has been, most of the time and for most of us, elsewhere” (Foster 1998, 133), while Carlson and Berleant suggest that it involves an “open, engaging, and creative mode of appreciation” (Carlson, Berleant 2004, 17). Similarly, Berleant emphasizes the need for openness that involves overcoming “restricted attention” and “the tunnel vision of ordinary life”—in other words, overcoming the action of a human being’s internal isolators (Berleant 1999, 15). From the perspective of a phenomenology of isolation, such approaches emphasize the importance of expanding (and perhaps shifting) the openings through which the body’s isolators allow certain sense data to reach the soul, the soul allows sense impressions and emotions to reach the «I», and the «I» allows sense impressions and emotions to enter its conscious awareness.

3.3. Berleant and Ingarden: Two Complementary Understandings of the Aesthetic Role of Isolation

We are now in a position to compare and contrast contemporary environmental aesthetics (represented here by Berleant) with an Ingardenian aesthetics of isolation and to identify ways in which they meaningfully challenge

and complement one another. Berleant refers explicitly to "isolation" in connection with aesthetic experience: such isolation is a negative that can be overcome by cultivating a greater (emotional) openness to and oneness with the environment. Thus in a discussion of the aesthetic appreciation of gardens, Berleant notes "a separation, both physical and psychological," that "lies between the observer and what is observed." For Berleant, such separation reflects a detrimental "Cartesian dualism of mind and body, of subject and object, a separation whose influence is still powerful." Such a dualistic view—which accepts various kinds of separation and distancing as something necessary or even beneficial—impacts not only our ability to aesthetically appreciate nature but also our relationships with one another: "The social consequences of this ideal are likely to be displacement, isolation, alienation, competition, and conflict" (Berleant 2005, 34).

For Berleant, the concept of "isolation" is also integral to a flawed and outdated Kantian aesthetics that "identifies the art object as separate and distinct from whatever surrounds it, isolated from the rest of life" (Berleant 2005, 4). With the Kantian aesthetic attitude of disinterestedness, "Division, distance, separation, and isolation are equally the order of the art and the order of the experience [...]" (Berleant 2005, 5). Berleant suggests that rather than fostering such "division and alienation," art and aesthetic experience may be used to bring about "reconciliation and harmony" (Berleant 2005, 32). Indeed, Berleant positions isolation as the opposite of both art and love; he writes that "[...] both art and love evoke a sense of shared living, a certain continuity and oneness, an intimacy in which divisions disappear. Love, indeed, is a binding force that melts boundaries" (Berleant 2005, 157).

An Ingardenian aesthetics of isolation, on the other hand, does not simply reject the notion that partial isolation is something "negative"; it argues that partial isolation is something that every human being must possess in order to have the very possibility of enjoying artistic creativity, aesthetic experience, and all forms of free and responsible involvement in the world. It is true that in order to be involved with the world, human beings need a certain "openness" that allows us to understand and manipulate our environment (Ingarden 1987, 123–124). But were it not for the isolators that partially shield us from the world, there would be no portion of the soul or the «I» that is "its own"; we would be swept deterministically to and fro by all the causal influences pouring in from the outside world, and there would be no space in which we could sense, feel, think, decide, or act freely (Ingarden 1987, 127). It is only by blocking out most of the world's realities that our being is able to create such sheltered "inner" spaces within which, for exam-

ple, an artist can develop his or her vision for a new painting or the reader of a novel can patiently nurture his or her own unique interpretation of the work and relish his or her emotional response.

3.4. The Aesthetics of Isolation as Environmental Aesthetics?

There is a sense in which an aesthetics of isolation might even be said to be “more environmental” than typical environmental aesthetics. Namely, both cognitive and non-cognitive approaches to environmental aesthetics view the modern human being as increasingly distanced and disconnected from the natural world, insofar as they focus on the contemporary challenge of creating meaningful aesthetic experience for the emotional soul (in the case of non-cognitive approaches) or the intentional «I» (in the case of cognitive approaches). However, Ingarden reminds us that our physical biological organism—our body—is already and always engaged in a rich, complex array of countless forms of causal interaction and engagement with the entire natural world (Ingarden 1987, 137). Most of the information about the world and its aesthetic qualities that the body receives will never be manifested to the soul or the «I»; it will remain forever hidden within the body. But it nevertheless raises the possibility of aesthetic “experiences” that involve neither sensation, emotion, or intentionality and yet are, in some sense, both “ours” and quite “real.”

3.5. The Importance of Partial Isolation in an Age of “Aesthetic Overload”

One might argue that a well-developed aesthetics of isolation becomes increasingly valuable today as a counterbalance to conventional environmental aesthetics, amidst what Docherty (in a discussion of Benjamin and Vattimo) refers to as the “information/aesthetic overload” of the Information Age and its negative impact on our ability to aesthetically appreciate anything (Docherty 2006, 68). The rise of the Internet, mobile computing, streaming video, social media, virtual reality, and related technologies means that our environment is now teeming with countless devices that offer us endless access to downloadable literary works, films, and music; virtual museums; live-streamed performance art; collaborative online concerts; and new forms of interactive fiction and shared virtual worlds. Such devices are not simply tools for mass entertainment; they are transmitters and agents of both “popular” and “high” culture. Moreover, autonomously

functioning software is increasingly capable of creating music, paintings, poetry, literature, fashion designs, and other works of art with a degree of ingenuity, emotional and cultural sensitivity, "imaginativeness," and technical skill that approaches that of human artists.⁷ This means that the 15+ billion smartphones, tablets, and other networked devices that fill our world (Nordrum 2016) are not only capable of transmitting works of art created by human artists; the artificial agents embodied in many such devices are also capable of becoming the creators of original works of art—of becoming artists—themselves. Increasingly, even a modest smartphone has the potential to craft an endless stream of novel, unique, personalized, and deeply meaningful works of art.

In such a world, the overflowing sea of art becomes inescapable. It is no longer a challenge to find artistic objects or opportunities for aesthetic experience; they find us through the glowing screens that lurk in every corner of our lives. The greater challenge is to isolate ourselves from most of them, so that each day we might be able to enjoy, say, one true and meaningful aesthetic experience rather than a thousand fragmentary "semi-experiences." An aesthetics of isolation points toward a new type of environmental aesthetics that might help us navigate such a reality.

Conclusion

From a phenomenological perspective, contemporary environmental aesthetics emphasizes the manifold ways in which the world reveals itself to us. An Ingardenian aesthetics of isolation suggests that perhaps a more philosophically interesting dynamic is not the way in which very narrow shards of the world manifest themselves to us and make themselves present but the way in which the overwhelming majority of reality is actively made absent—and the essential role that such partial isolation plays in enabling human artistic creativity and aesthetic experience. If conventional environmental aesthetics asks how we can enjoy experiences of greater oneness with the natural world, the aesthetics of isolation asks why it is that we are not already one with such reality to start with; it seeks to understand those mechanisms of our body, soul, and «I» that prevent us from enjoying a single overwhelming aesthetic experience that encompasses the whole of time and space and all of the unglimped aesthetic qualities embedded within the universe. Each approach elicits a different set of insights, and if used as

⁷ For ongoing developments in the fields of artificial creativity and robotic art, see, e.g., McCormack, d'Inverno 2012; Besold *et al.* 2014; Herath *et al.* 2016.

complementary tools they enrich our ability to understand those forms of artistic creativity and aesthetic experience that exist today, as well as those that may emerge in the future. In an era in which new forms of art and aesthetic experience reach out to us continually—aided by the proliferation of powerful and ubiquitous new technologies—the ability to both open and close ourselves to our environment’s countless forms of self-manifestation can be expected to become an ever more important element of the search for meaningful aesthetic experience.

Bibliography

1. Berleant Arnold (1999), “On Getting Along Beautifully: Ideas for a Social Aesthetics”, [in:] P. von Bonsdorff, A. Haapala (eds.), *Aesthetics in the Human Environment*, Lahti: International Institute of Applied Aesthetics, pp. 12–29.
2. Berleant Arnold (2005), *Aesthetics and Environment: Theme and Variations on Art and Culture*, Aldershot: Ashgate Publishing Limited.
3. von Bertalanffy Ludwig (1969), *General System Theory: Foundations: Development, Applications*, New York: Penguin University Books.
4. Besold Tarek Richard *et al.* (eds.) (2014), *Computational Creativity Research: Towards Creative Machines*, Paris: Atlantis Press.
5. Buonarroti Michelangelo (1900), “Madrigal XII”, [in:] *Sonnets and Madrigals of Michelangelo Buonarroti*, trans. W. Wells Newell, Boston: Houghton Mifflin and Company, p. 36.
6. Buonarroti Michelangelo (1904), “Sonnet XV”, [in:] *The Sonnets of Michael Angelo Buonarroti*, trans. J. Addington Symonds, New York: Smith, Elder, & Co, C. Scribner’s Sons, p. 17.
7. Carlson Allen (2016), “Environmental Aesthetics”, [in:] E. Zalta (ed.), *The Stanford Encyclopedia of Philosophy*, [online] <https://plato.stanford.edu/archives/sum2016/entries/environmental-aesthetics/> [accessed: 29.12.2017].
8. Carlson Allen, Berleant Arnold (2004), “Introduction: The Aesthetics of Nature”, [in:] eidem (eds.), *The Aesthetics of Natural Environments*, Peterborough, Ontario: Broadview Press.
9. DeLanda Manuel (2011), *Philosophy and Simulation: The Emergence of Synthetic Reason*, London: Continuum.
10. Docherty Thomas (2006), *Aesthetic Democracy*, Stanford: Stanford University Press.
11. Fisher Saul (2016), “Philosophy of Architecture”, [in:] E. Zalta (ed.), *The Stanford Encyclopedia of Philosophy*, [online] <https://plato.stanford.edu/archives/win2016/entries/architecture/> [accessed: 29.12.2017].
12. Fletcher Roscoe Maria (1868), *Vittoria Colonna: Her Life and Poems*, London: Macmillan.
13. Foster Cheryl (1998), “The Narrative and the Ambient in Environmental Aesthetics”, *The Journal of Aesthetics and Art Criticism*, 56, 2, pp. 127–137.
14. Herath Damith *et al.* (eds.) (2016), *Robots and Art: Exploring an Unlikely Symbiosis*, New York: Springer Singapore.

15. Ingarden Roman (1957), *Studia z estetyki*, t. 1, Warszawa: Państwowe Wydawnictwo Naukowe.
16. Ingarden Roman (1987), "O odpowiedzialności i jej podstawach ontycznych", trans. A. Węgrzecki, [in:] idem, *Książeczka o człowieku*, Kraków: Wydawnictwo Literackie.
17. McCormack Jon, d'Inverno Mark (eds.) (2012), *Computers and Creativity*, Berlin-Heidelberg: Springer-Verlag.
18. Nordrum Amy (2016), "Popular Internet of Things Forecast of 50 Billion Devices by 2020 Is Outdated", [in:] *IEEE Spectrum*, [online] <https://spectrum.ieee.org/tech-talk/telecom/internet/popular-internet-of-things-forecast-of-50-billion-devices-by-2020-is-outdated> [accessed: 31.12.2017].
19. Pearson Michael Parker, Richards Colin (1994), "Architecture and Order: Spatial Representation and Archeology", [in:] eidem (eds.) *Architecture and Order: Approaches to Social Space*, London: Routledge, pp. 1–33.
20. Sienkiewicz Piotr, Wojtala Roman (1991), "Systems Thinking in Poland", [in:] M. Jackson *et al.* (eds.), *Systems Thinking in Europe*, New York: Springer Science+Business Media, LLC, pp. 197–199.
21. Tuan Yi-Fu (1977), *Space and Place: The Perspective of Experience*, London: University of Minnesota Press.
22. Zimmerman Michael (1985), "The Role of Spiritual Discipline in Learning to Dwell on Earth", [in:] D. Seamon, R. Mugerauer (eds.), *Dwelling, Place and Environment: Towards a Phenomenology of Person and World*, New York: Columbia University Press.

