Aesthetics: A Tool or a Thing Thing
–Empirical Assessment of Two Incompatible Frameworks

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Abstract

The paper summarizes a part of my dissertation research, centered on the investigation of possibilities for the naturalization of creativity and its recognition through a domain-agnostic, abstract-mathematical approach called "functional analysis and reduction". This customized methodology has a lot in common with category theory, with a key twist: Its function is to reconstruct information while preserving complete language agnosticism. This allows for the investigation of reality at a fundamental level of abstraction, scrutinizing the nature of what we refer to as a "category". This paper specifically investigates the interaction between two products obtained in the dissertation through this methodology, and proposes an assessment of their contact with empirical data from mental activity. The first product is the formula "aesthetics - a tool for data interpretation and expression" - an information framework excluding the classical definition from the computational mechanism. It emerges in art theory. The second is "aesthetics - an element in a definition-based information framework" in neuroaesthetics. Since the research method is domain-agnostic abstract mathematics, this sets the tone for the equal treatment of all information processed in the research, thus prioritizing only the logical coherence of the judgments and their contact with empirical data. Despite the clear functional incompatibility of the two frameworks in a computational aspect, both products deny the existence of art as a domain. In addition, a logical continuity is identified between them. The findings of the study make the case for the emancipation of art theory and practice as a natural-mathematical domain.

Keywords: aesthetics, neuroaesthetics, information theory, mathematics, epistemology

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Introduction

Aesthetics. What does the concept mean? This is what the humanities have long sought to understand, and, in recent decades, so have studies in the natural and information domains. From a certain perspective, it is entirely justified to assert that this is a discipline which openly does not know what it means or what it studies. Beneath the surface, however, this pronounced eclecticism and multilayered contradiction create the conditions for uncompromising testing of reality, whereas the state of confusion can be interpreted as a natural manifestation of heightened self-reflection.

Background

In 1968, art theorist and artist Jack Burnham wrote: "For systems, information, in whatever form conveyed, becomes a viable esthetic consideration" (Systems Esthetics). This statement sparked my curiosity as a master's student in art history and theory and became the motivation behind two major research projects—an interdisciplinary master's thesis and a transdisciplinary dissertation—seeking to answer what this statement means. In the final phase of my dissertation, a narrative emerged about the crystallization of a mathematical artifact in the humanities, which this article will summarize and examine through the lens of empirical assessment. In this narrative, Burnham's statement is understood as an axiom rooted in empirical data.

Methodology

In a society where we speak of "art and science," the theoretical divisions separating artistic theory and practice from the so-called "exact sciences" are too deep. Therefore, I came to the conclusion that for the purposes of this study, an ascetic and rigorous, yet flexible mathematical approach is necessary—one that is free from inherent requirements for a specific method of calculation. An approach applicable both to the studies in art theory and artistic practice, as well as to the linguistic aspects of the exact sciences, of which the cognitive sciences are a part.

The solution I propose is an abstract-mathematical methodology, developed and formulated for the purposes of the present study - "functional analysis and reduction." "Functional analysis and reduction" is a method based on fundamental logic - it is realized in the constant asking of the question: "How does something work?" This is essentially considered the basis of the research method per se in the pursuit of systematization and synthesis, which renders the method entirely conventional. However, if the procedure is used as the sole methodology, it becomes a radical approach to knowledge, as it calls into question the existence of each and every concept in every language system. The power of the procedure increases with the distance between the localized languages being studied. Thus, the practical application of the method is expressed in the purification of the linguistic field from self-referential concepts and the aggressive exposure of hypothetical modules, otherwise embedded even in the very foundations of the language systems. Since the method, by nature, consists of listening and seeking coherence and rejects any partially coherent concept through emphasized linguistic agnosticism, it is a mathematically sound procedure for addressing Gödel's theorem on the unprovable absence of information in an information framework. Gödel's theorem in the exact sciences has so far been unavoidable—every existing language system contains implicit and unverifiable information. I will give an illustrative example with category theory, which, although at a high level of abstraction, if applied to a computational mechanism, implicitly

assumes, through Gödel's treatment, that the category, i.e., the definitive module, exists in a computational mechanism that ensures holism. Similarly, any natural-mathematical system that allows the existence of $1 + 1 = 2$, with the intention of incorporating this logic of calculation into a computational mechanism, implicitly postulates that the calculation is performed on the basis of definitive modularity, since what we call "1" is a definitive module in the logic of calculation. Functional analysis and reduction as the only method of study is a method for systematizing and reconstructing knowledge, free from unprovable missing information.

Functional analysis and reduction is applied as a method in the analysis of art theoretical investigations, general information processing paradigms, brain function interpretations, and brain data, incorporating my experience from art education, practice, and critical writing. The application of the method aims at investigating predictive power, transdisciplinary coherence, theoretical fragmentations, and loops.

The method is applied organically.

Aesthetics' Definitional Problem

The definition of "aesthetics" is widely recognized as a central problem in modern aesthetic theory (Munro & Scruton, 2025). In addition, a meta-analysis through NLP of all articles (27,159) across domains in Web of Science, published between 1970-2018 tagged with "aesthetics", summarizes:

> it remains unclear what aesthetics is about, and, consequently, if aesthetics research pursued by different scientific disciplines addresses common problems. [...] If we take empirical aesthetics and neuroaesthetics as examples, it is, for instance, far from obvious what, to these disciplines, constitutes an aesthetic problem. (Anglada-Tort & Skov, 2019)

In contemporary humanities research, aesthetics occupies an increasingly central place in art theory and practice, but its definition remains unclear and controversial. The problematic understanding of the concept is identifiable not only in the theorists' attempts to define the concept within each proposed aesthetic framework (for an overview, see Zlatanova, 2025 a), but also in the functional characteristics of the concept when it is used in context (Zlatanova, 2025a, b).

Derivation of Products Assessed

Figure 1

Functionality of the Concept "Aesthetics" in the Arts vs. in Neuroaesthetics. Obtained Through Functional Analysis and Reduction of Theoretical Investigations in Both Domains.
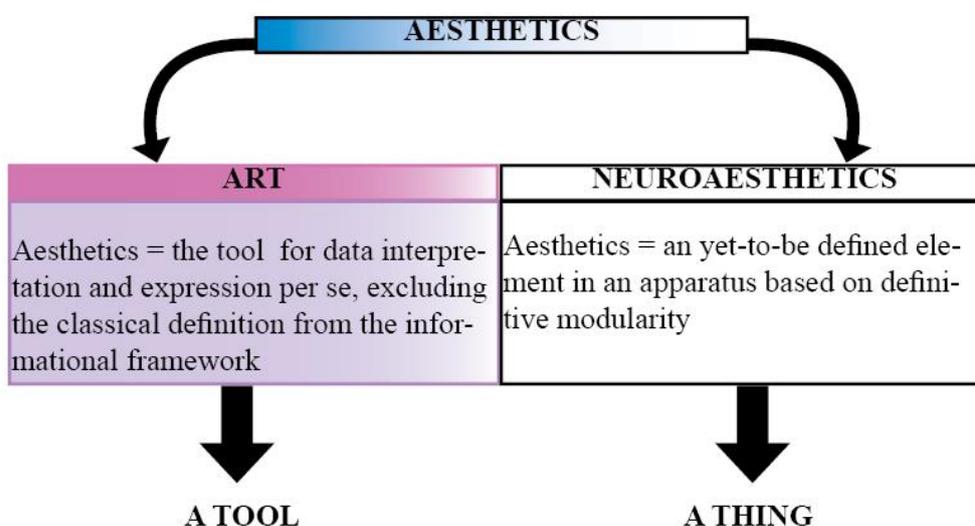
Aesthetics as a Tool

The diversity of aesthetic theories has become a distinctive feature of the discipline of Aesthetics since its inception by Baumgarten. This diversity has been catalysed by the theoretical developments aimed at examining Duchamp's readymade (Zlatanova, 2025b). The theorization of the readymade, the attempt to find a justification for its presence in a museum, becomes paradoxical, since the readymade, in itself, imposes a strict linguistic field that excludes the existence of creativity as something separable from life. Duchamp (1968) stated:

> Art etymologically means to do — not even to make, but to do. And the minute you do something, you are an artist… art means activity, any kind. But we as society have decided to make a group that would be called artists — a group of conductors — which is purely artificial.

In this linguistic field, aesthetic perception is distinguished as any judgment of liking or disliking, and the judgment itself is formulated as possibly not being felt, due to the connection of its "perceptibility" with the concept of "habit." The result is an active opposition between the conceptual framework of the readymade and the existence of a theory that distinguishes something as "art" from "non-art." Thus, the appropriation of the readymade in a museum becomes an unsolvable paradox, still active today, since a working mathematical (or "naturalized," as termed in contemporary literature) expression of creativity and its recognition does not yet exist, while art theory continues to operate around a concept termed "art", delineating it within specialized physical and theoretical spaces.

This paradox was recognized (Goldsmith, 1983). To it, two solutions appeared. They developed approximately at the same time and place—this is the interpretation supported by

Danto, which initiated the institutional theories of art, describing the readymade as "the most radical dissociation of aesthetics from art" (Danto, 2000). The alternative solution is the transformation of aesthetics exclusively into a tool for data interpretation and expression per se. It was formalized with mathematical commitment for the first time in "Systems Esthetics" (Burnham, 1968) and was quickly forgotten, but in recent decades—since around the beginning of the century—the field of new media has been producing with increasing vigor theoretical studies that are developing the same solution, in most cases seemingly independently of Burnham, in search of an operational framework—a unifying theoretical framework for creative research. This separation, though implicit and vague, is clearly recognizable through the application of functional analysis and reduction to the studies in art theory (Zlatanova, 2025a). The influence of this conceptualization is concentrated around the theorization of system-oriented works, for which digital arts are the central vehicle. The reason for this is that, through their infinite diversity and firm domain agnosticism, digital arts unfold the potential for conceptual, material, and algorithmic experiments, making the development of a unifying theoretical apparatus a task of paramount importance with a deeply analytical character. Thus, they constitute the theoretical core of creative practice ipso facto.

The two logical solutions are recognized through functional analysis and reduction as derivatives, respectively, through logical fragmentation (the interpretation of "dissociation of aesthetics from art") and functional reduction (aesthetics as a data interpretation and expression tool) of the concept of "aesthetics," as created by Baumgarten. This is the shortest explanation of the more complex interactions of each solution with the depths of art theory, which outline the fragmenting nature of the first solution and the continuity of the second with the foundations of art theory.

Aesthetics, as conceived by Baumgarten, denotes "a science of how things are to be known by means of the senses" (scientiam sensitive quid cognoscendi), described as the theory of the liberal arts, lower gnoseology, the art of beautiful thinking, and the art of the analogue of reason (Metaphysica, §533; Aesthetica, §1), as cited in Guyer (2005). This distinguishes it as a discipline, directed toward the study of the principle of mental processing—how we extract knowledge from bits of information that are waiting to be made sense of. At the same time, the reference to the "liberal arts" shows that this is also the way we recognize and identify art in everyday reality. This formula alone is sufficient to recognize "aesthetics" as a hypothesis for mental architecture—through its simple conceit, it hypothesizes the existence of a single principle for data processing, that explains the extraction of knowledge from bits of information that are waiting to be made sense of, and this principle, in itself, is hypothesized as enough to explain how we identify what we call "art" from what we think isn't.

This formula in the article is referred to as "aesthetics as a tool." It designates aesthetics as an interface.

Aesthetics as a Thing

In neuroaesthetics, the aesthetic experience is conceptualized, regardless of the plethora of interpretations of its nature, as an "element".

The element is situated within theoretically framed mechanisms based on definitive modularity.

Here, we recall the conclusion from the analysis (Anglada-Tort & Skov, 2019), as highlighted in Aesthetics' Definitional Problem.

In the biological domains the aesthetic is sometimes viewed as closely linked to art, e.g. by Zeki (the first to refer to the neuroscientific study of art as "neuro-aesthetics" in Inner Vision (Skov, 2023), to "the perception, production, and response to art, as well as interactions with objects and scenes that evoke an intense feeling, often of pleasure" (Chattarjee, 2011) (as cited by Skov, 2023), to domainless like and dislike (common currency hypothesis as an interpretation of meta-analyses, e.g. Skov, 2022), to the concept "speed" through processing fluency theory (Reber et al., 2004), to positive evaluation (e.g. processing fluency theory again), and others. There is also a view that neuroaesthetics does not tackle the problem of art recognition and evaluation, because the matters of art theory supersede the scope of neuroaesthetics (Brown & Dissanayake, 2009).

To summarize, unlike in art theory, where aesthetics is transforming into not "a", but "the" tool for data interpretation and expression, the neuroscientific discourse operates with a variety of concepts and hypotheses regarding "mechanisms" of data interpretation and expression. In this interpretive approach aesthetic appreciation becomes a thing in a computational mechanism - currently predominantly hypothesized as centered around how people like and how people like and dislike, but those conceptualizations are tightly linked with further hypothetical definitive modularities in the mental computational mechanisms. E.g., there are the functions of learning and memory, which, if existing in separation from liking, are known to be intrinsically connected with it through generative computation. The neurosciences currently conceptualize the existence of a currency—more precisely, a common currency—a variable denoting the "aesthetic value", which, according to predominant interpretations, is implicitly hypothesized and explicitly stated as generated by a system—the reward system. And the interpretations regarding how this value (a separate unit) is computed, begin cascading—through an evolutionary mechanism for energy efficiency, through curiosity and attention guidance, through habits, etc. With this in mind, the field, just like its mother domain, is going through rapid shifts in assumptions, diversification and deeper dive in computational neuroscience.

Empirical Assessment of Aesthetics as a Tool

Aesthetics as a tool for the interpretation and expression of mental data is rooted in a domainless *"how"*. This is the conclusion after a functional analysis and reduction was performed on the work(s) of more than 43 theorists dating back from Baumgarten to most recent theoretical investigations concerning "aesthetics" in the arts, with an emphasis on new media theory. This conceptualization excludes the classical definition from the informational framework, because aesthetics represents the interface, i.e., it denotes the method of information processing itself.

Pedagogy in the Arts

The attendance of each lecture shows that the pleasure of a work of art is closely linked to its understanding, i.e., in order to perceive and interpret its creative capacity, an accompanying theory is needed to act as a kind of a chemical medium, allowing for systematic interpretation. This function of the theoretical medium lies at the core of the institutional theories. A reduced, albeit implicit, analytical product of the institutional theories is the highlighting of the

function of "understanding" for the aesthetic judgment (understood as liking/disliking), i.e., its analytical character.

In artistic practice, there is a consistent use of the axiomatic understanding of "wayness" at the basis of creative generation and evaluation—at the basis of art education, regardless of the creative domain, stands the axiom "Art is not a thing, but a way". This notion is the tool through which creative work is done, regardless of any sub-methodologies, with people of all ages—from children to adults.

The "wayness" is particularly emphasized in the construction of what we traditionally perceive as fixed in time and space objects—an "object", whose perception takes a moment, often took weeks, months, or even years to construct. In creative practice, the perception of an object is not understood as the perception of a static or even deterministic structure, but rather as the creation of a mechanism in which the play with attention is brought out as a "carrying" construct. This means that the construction and interpretation of a traditional, time-fixed image, for example, should be understood as a product developed and perceivable in time and space, just as much as the construction and interpretation of works currently positioned as "time-based". In both cases, the "wayness" lies at the basis of creative work.

Another, much more straightforward argument in this section could be that we (art theorists and practitioners) cannot build a theory around a thing—whatever this thing might be, we need it only temporarily, and it will eventually be replaced or transformed. Art needs to step onto something, but also needs to supersede it. The reason? It's not a thing—it's a way.

The Art Critical Approach = (Systems) Analysis

Today, the art critical approach is easily formalized as systemic analysis—or simply, analysis, because:
  a. *holism*, or *systematicity*, in creativity research in the arts is treated as the starting point
  b. because of the fundamental role of the context provision in art evaluation - a conceptualization marked in the next section (The Role of the Context: Context Provision = the Art of the Day)

A systems analysis of what we call an artwork can have many manifestations and nuances, leading to completely different results from the same starting point, and although it does happen, albeit rarely, that systems interpretations claim universal validity, such claims are sporadic. Claims of universal validity are more likely to be part of theoretically oriented studies offering a kind of historicization, systematization, or some kind of definiteness, but they are not inherent to the art critical approach by default—on the contrary, the art critic rarely (or increasingly rarely) seeks to create a "universally valid" or "final" interpretation. Instead of definitiveness, the critical approach is often open to multiple interpretations, subjectivity, contextuality, and even deconstruction. It rarely claims definitiveness, but rather insight, provocation, or informed opinion. Postmodern criticism, for example, actively and purposefully rejects the idea of a single, universal truth or grand narrative in art: by rejecting the concept of "universal aesthetic criteria" (extending to aesthetics altogether) in favor of a contextual and culturally specific understanding—i.e., practices close to the institutional theories or their critique; by supporting artistic practices that themselves undermine ideas of originality, fixed meaning, and linear progress; and by deliberately challenging the categories of "high art" and "popular art". In addition, as a prime example stands the integration of philosophy as an art critical tool, in place of aesthetics. While postmodernism deconstructs

traditional categories, other approaches, such as analytical aesthetics, offer a systematic and logically rigorous analysis, seeking ways to integrate conceptuality into universal frameworks that allow for dynamic, definitive transformations.

Systems analysis, devoid of a claim to universal validity, is a manifestation of the recognition of the cognitive function of "understanding" as key to creative recognition and evaluation, regardless of the physical parameters of what we call "a work of art". In other words, it validates aesthetics as a tool for interpreting and expressing data per se throughout the entire artistic discourse.

Systems analysis does not imply the existence of a statically divided object and perceiving subject, because in it the sensitivity to all information during interpretation is an explicit fundament, i.e., it does not work with the concept of objective reality. Rather, it works with the concept of directing attention toward building coherence.

The Role of the Context: Context Provision = The Art of the Day

Any context is a logical medium. Contemporary art, especially what we call "systems-oriented art", recognizes context provision as "the art of the day" (Vesna, 2007). The systemic orientation in creative production reveals the following: the emerging positive and negative values in the aesthetic judgment are information structures/values "locked out" without context, which is often a traditional text or multimedia content. This makes it clear that the "qualities" of an "artwork" are not inherent aesthetic characteristics, but rather the result of interpretive manipulation of information, which is the essence of pure analysis.

Through practical contact with systems analysis in artistic evaluation—through our human experience at the boundary between theory and practice—we sense that the analytical structure itself acts as an aesthetic factor. This strongly suggests that it is not formalistic (the form here should be understood as a hypothetical, definitive module in a computational sense) but analytical fragmentation that is evaluated negatively in a negative aesthetic judgment. This means that the perception of what we call "form" is strongly suggested as evaluated in a manner identical to the evaluation of just another analytical product. Form is evaluated as an analytical structure with the clarification that we do not know in what form this structure exists— e.g., an iconographic/representational system, or whether it is an ultimate system or another type of coherence in the confections of mental processing. The systemic "turn" in art brings to the fore that the computational mechanism, the principle of evaluation, is identical across conventionally systemic and conventionally object-based elements.

Aesthetics As a Tool As an *Operational* Language in the Exploration of Creativity

Finally, a functional tracing of the theoretical points at which the formalization of "aesthetics as a tool for data interpretation and expression" is most clearly established, is linked to the intention to build an operational information framework for creative research. As mentioned, the leading "impulses" for the emergence of the concept are theoretical developments in the field of new media, due to the need to build a unified operational framework for creativity exploration (e.g., Burnham, 1968; Kwastek, 2013; Manovich, 2001a, 2001b; Vesna, 2007).

Intermediate Conclusion 1

Pure analysis (meaning, analytics itself, regardless of the formal characteristics) emerges as the empirically derived scientific methodology for art examination and evaluation. It performs the function of recognizing art, because art, in this view, is not a thing - it's a way. This means that the scientific method of the artistic domain confirms the concept of aesthetics as a tool for data interpretation and expression across all subdomains of creativity research.

Empirical Assessment of Aesthetics as a Thing

As noted above (in Derivation of Products Assessed), aesthetics in neuroscience is treated as an element in a computational mechanism. While its exact function(s) is/are being explored with increasing precision, its essence – its conceptualization as an "element" – practically constitutes a scientifically untested assumption. Its working – its mechanical characteristics – regardless of the exact hypotheses for what the aesthetic evaluation is (about), is based on the conception of mental processing as something emerging through an orchestrated flux of definitive entities. Some of those entities in the theoretical research can easily be identified as key hypothetical modules. The following text in this section examines a few such hypothetical modules in neuroaesthetics' models of the aesthetic through the lens of empirical assessment.

Object Perception

This module is often referred to as "objective beauty," "features," or anything that applies an interpretive lens to the stimulus itself. It's part of what are called bottom-up hypotheses about mental dynamics.

A recent meta-analysis (Bignardi et al., 2023) reveals that this approach has low predictive power when applied to visual artworks—and more interestingly, that the predictive accuracy drops as the space for individual interpretation increases—which is exactly what happens in real-world settings:

> Aesthetic judgments of images of visual artwork (paintings) tend to produce highly individual ratings; it is typical that less than 10% of repeatable variance can be accounted for by a shared factor (Leder et al., 2016; see Figure 6.2, Vessel et al., 2018). Of course, artworks are a very heterogeneous category of stimuli. Yet even within artworks, representational works produce higher agreement than abstract works. (Schepman et al., 2015)

While object perception as a definitive module is not itself contested, there are big fields in the arts, to which the object, as a computational module, seems to be empirically inapplicable - such as music, dance, and literature. There, instead of interpretation based on an object's perception, a highlight is put on "higher order information processing", which firmly contributes to the rise of an interactionist view. Two key insights from this line of research, as noted by Bignardi et al. (2023) are:
1. Higher-order information—such as semantic, conceptual, or personal meaning—matters more than low-level features.
2. People derive the most pleasure from experiences that allow for learning.

The perception of an object is conceived as emerging within a temporally delineated mechanism (hence the concept of "temporal processing") with at least partially automated phases. A large body of studies suggests that unconscious sensitivity to rhythmic patterns— such as those observed in structural priming— influence the distribution and interpretation of information during cognitive processing. This implies that object perception occurs simultaneously as a process governed by the temporally delineated mechanism and as a factor with its own direct implications for temporal processing. These rhythmic patterns can be externally triggered—through simple auditory cues or more complex tasks such as solving mathematical equations or language processing tasks. However, internal (interoceptive) signals also influence the processing of external stimuli in a complex manner (e.g. Galvez-Pol et al., 2022). Those findings signal the need for a highlight on the questions: How does the object exist in consciousness, if we understand it as an informational structure? What kind of language would fit the nature of object perception?

These questions relate to the investigation of the models of mental representations. E.g., two such prominent models are the iconographic model and the distributed representational model.

The question of object perception strongly implies the need for a functional understanding of the design in which mental processing occurs. In this sense, the current neuroaesthetic literature does not directly address this question - it is regarded as "ahead of its time". However, in a sensitive computational model, the design of the processing is crucial for the interpretational framework, thus creating a loop of contradictions due to missing information.

This question, though seemingly distant, is in fact directly linked to the still-missing causality protocol for brain activity in neuroscience.

Sensory Modality

Another key bottom-up concept is sensory modality. In the following parts I will present an argument rooted in empirical data questioning whether it actually exists as a definitive module in the computational mechanism of the mind.

Fiona Macpherson (2010) examines different criteria for defining the senses—such as the kind of experiences they produce, the stimuli they detect, and the organs and brain areas involved. Her conclusion is that we currently don't have a reliable way to define what counts as a separate "sense". Instead, she suggests we might achieve greater coherence by treating senses as a relational space, clustering perceptions based on similarity rather than fixed categories.

Both object perception and sensory modality feel distant from analyses of creative expressions like music, dance, or literature, where more abstract concepts such as understanding, attention, timing, synchrony, and coordination seem more appropriate.

There's also tension when considering cross-modal structural priming—a process where interaction between different senses becomes automatic. For example, hearing can influence visual processing. One study suggests that cross-modal interactions are the norm, not the exception, and that even brain pathways once thought to be sense-specific are shaped by signals from other modalities. It concludes that "brain imaging and recording studies provide evidence against modularity" (Shimojo, 2001).

A recent research shows that even viewing static images triggers sensorimotor activity, and some argue that attributing aesthetic value to art also involves motor processing (Gallese & Di Dio, 2022).

So, do clearly separate sensory modalities exist from the earliest stages of processing? If we're being strictly scientific, the current state of literature should firmly require that the answer be that: We don't know. The simplest explanation is that the concept of a "sense" remains functionally undefined.

Yet structural priming—even when not focused on cross-modality—reveals that the mind responds to hidden abstract rhythms that guide attention and meaning. This suggests a complex, systems-level behavior that challenges the traditional hierarchical models of mind architecture, with their distinction between "higher-order processing" and "low-level processing" as discrete entities conceptually tied to meaning. I consider this a solid argument for caution against relying too heavily on the fixed idea of "sensory modalities".

Furthermore, the first recorded visual illusion caused by sound already demonstrated how one sense can change the subjective experience of another (e.g. Shams et al., 2002).

Beauty, or Positive Value

Similar to certain humanistic interpretations, a large part of neuroaesthetic perspectives still define the "aesthetic" in terms of "the beautiful". For example, evolutionary aesthetic theories—including processing fluency theory—treat the aesthetic as a form of positive affect. This conceptualization presents a theoretical challenge when it comes to accounting for the roles of understanding and curiosity in aesthetic appreciation.

Art as a Domain

This kind of conceptualization is incompatible with meta-analyses such as Skov (2022), which show that the liking of an artwork is no different from liking anything else. These more holistic interpretations support the common currency hypothesis—the idea that the brain evaluates the value of various stimuli (not just art, but also food, money, or social interaction) through a shared, unified mechanism, resulting in a generalized sense of "liking" or "wanting".

More holistic interpretations of brain activity describe creativity as a balance between fast response and correct solution, or as high associative capacity in problem-solving. In this sense, creativity is redefined as a form of effective productivity. This conceptualization is worked on in studies focused on the effects of incubation on creativity, which, with regard to transdisciplinary cohesion, is one of the most central and holistic areas in neuroscience, investigating how various factors influence mental task performance. Within this framework, creativity is treated as something that exists beyond a fixed domain.

Intermediate Conclusion 2

To sum up, large-scale meta-analyses strongly contest the view that art production and recognition can be naturally translated into a definitive modularity in the computational mechanism. The use of definitive modules in the computational models of the mind is based on research tradition, not empirical justification.

Empirical Overlap

Both the humanistic artifact and the meta-analytical trajectory of neuroaesthetic research point to several converging conclusions:

1. Understanding is not secondary to pleasure but its foundation. Pleasure appears to be derived through processes of interpretation and comprehension, rather than existing as a separate or preceding phenomenon. In this sense, pleasure is strongly suggested to be analytically rooted by both frameworks, although on a mathematical level they are incompatible.
2. The mind seems to compute pleasure in a uniform way across stimuli—regardless of whether it is something referred to as art, food, money, or social interaction. This is the firm conclusion of large-scale meta-analyses, and the hypothetical explanation is "common currency". This conceptualization is supported by both informational approaches, although they are incompatible.
3. Neuroscientific research, especially its transdisciplinary, meta-analytical core centered on incubation effects in creativity studies, provides no evidence for a distinct "creativity system". Thus, both fields operate on a domainless understanding of creativity.
4. A concept which arises in cognitive literature on both creativity and aesthetic evaluation is the notion of speed of information processing—a direction worthy of further investigation. If creativity equals performativity, and better creativity is seen as faster processing, while aesthetic appreciation is seen as simply creativity's recognition, characterized again by speed, those could be the grounds of a new descriptive language of mental processing.

About Empiricism

The survey, as part of its larger framework, critically examines the concept of empiricism: Which data are empirical? There are two ways to approach empiricism in science. One is to work with a loosely understood notion of "empiricism", so that we could call every current scientific approach empirical, as long as it operates with measurable data. The other is to adopt the view that, in order to define which data are empirical, we must already know how to interpret them. This view allows us to question the fundamentals of the methodology of measuring data. In this stricter view, the definition of "empirical data" is possible only if we already have a fully developed fundamental physics and/or a working computational model of the mind. Functional analysis and reduction adopts the second view because it is intrinsically domain-agnostic. Thus, the research favors the view that, up to date, we do not know which data are empirical. Empirical verification is thereby redefined as the search for logical coherence in the interpretation of empirical data, as understood by the first definition. The method then can be recognized as a "compass" for empirical data.

Conclusion

The study presented in this paper is suggested as an initiation of a dialogue between the disciplines of art theory and practice, on one hand, and neuroscience, on the other. The two assessed products, identified through functional analysis and reduction of theoretical investigations in each of the two domains, are in mathematical terms incompatible, but their relation to measurable data provides sustainable evidence for a shared logical fundament. Additional research is needed for examining the precise degree of compatibility and the reason underlying their computational incongruence.

Declaration of Generative AI and AI-Assisted Technologies in the Writing Process

The author used OpenAI's ChatGPT (version GPT-5) and DeepL Pro in a limited capacity for proofreading and making minor readability improvements to the manuscript. No content was generated beyond stylistic adjustments, and the author is fully responsible for the final text.

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