Upon Entropy

Riccardo M. Villa

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**Architectonics of the Image
in the Age of Information**

AUTHOR
Dr. Riccardo M. Villa
Research Unit of Architecture Theory and Philosophy of Technics,
Vienna University of Technology (TU Wien); Chair of Digital
Architectonics (ETH Zürich)

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Introduction

In 1973, architecture historian Manfredo Tafuri penned what would be largely quoted afterward as an "epigraph" on what was considered contemporary architecture at that time. In the introduction to *Progetto e utopia*, he writes:

> What is of interest here is the precise identification of those tasks which capitalist development has taken away from architecture. That is to say, what it has taken away in general from ideological prefiguration. With this, one is led almost automatically to the discovery of what may well be the 'drama' of architecture today: that is, to see architecture obliged to return to *pure architecture*, to form without Utopia; in the best cases, to sublime uselessness.[1]

1 Manfredo Tafuri, *Architecture and Utopia: Design and Capitalist Development* (Cambridge, Massachusetts: The MIT Press, 1976), ix.

There are two points worth highlighting in this quote: firstly, the description of architecture as something stripped from any ideological prefiguration and condemned to "return to pure architecture" or "in the best cases, to sublime uselessness;" and secondly, the statement that directs the aim of Tafuri's book, i.e., "the precise identification of those tasks which capitalist development has taken away from architecture."

In 1979, six years after *Progetto e utopia*, French philosopher Jean-François Lyotard published *La condition postmoderne*. If Tafuri aimed to identify the tasks subtracted from architecture by capitalism, Lyotard's goal was instead to identify how technological transformations changed the statute of knowledge:

> The nature of knowledge cannot survive unchanged within this context of general transformation. It can fit into the new channels, and become operational, only if learning is translated into quantities of information. [...] Knowledge is and will be produced in order to be sold, it is and will be consumed in order to be valorized in a new production: in both cases, the goal is exchange.[2]

2   Jean-François Lyotard, *The Postmodern Condition: A Report on Knowledge* (Minneapolis, Minnesota: University of Minnesota Press, 1984), 4.

In computerized societies, Lyotard writes, knowledge ceases to have an end in itself and starts to be produced in order to be sold and consumed. *Exchange* becomes its ultimate goal: the introduction of the computer and information technology defines not only a society but a condition at large and a stage of progress in which knowledge turns into a commodity. According to Lyotard, such a condition can be found "in the most highly developed societies:"[3] his argument underlies a notion of progress that the term "postmodern"—understood as what comes *after* the modern—already foregrounds. Modern and postmodern appear here as two stages of a process that is the outcome of science's conflict with narratives: while trying to distance itself from the ground of narratives and "fables" that, given their fictional nature, are not compatible with scientific knowledge, science must nevertheless produce its own ground of legitimization. Science "is obliged to legitimate the rules of its own game."[4] This novel discourse (that Lyotard identifies in philosophy) is what he calls a "metanarrative." The term *modern* designates for him any science that legitimates itself with reference

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[3] "The object of this study is the condition of knowledge in the most highly developed societies. I have decided to use the word *postmodern* to describe that condition." Lyotard, xxiii.

[4] Lyotard, xxiii.

to such a ground.[5] Postmodern corresponds to the next natural stage of the conflict, or with the realization that even such metadiscourse is ultimately a narrative: "Simplifying to the extreme, I define *postmodern* as incredulity toward metanarratives," Lyotard writes. "This incredulity is undoubtedly a product of progress in the sciences: but that progress in turn presupposes it."[6] The invariant between the two is the figurative loss of ground caused by the incredulity towards narratives first and metanarratives next. The fulfillment of this conflict closes one age and opens another with a question: "Where, after the metanarratives, can legitimacy reside?"[7] Lyotard's postmodern condition presents us with one of the central paradoxes of the contemporary age. Inscribed as forms of knowledge, in the core of science and philosophy stands a nihilism that, if fulfilled to its maximum, reverts itself into its opposite. If the modern incredulity

5 "Science has always been in conflict with narratives. Judged by the yardstick of science, the majority of them prove to be fables. But to the extent that science does not restrict itself to stating useful regularities and seeks the truth, it is obliged to legitimate the rules of its own game. It then produces a discourse of legitimation with respect to its own status, a discourse called philosophy. I will use the term *modern* to designate any science that legitimates itself with reference to a metadiscourse of this kind making an explicit appeal to some grand narrative, such as the dialectics of Spirit, the hermeneutics of meaning, the emancipation of the rational or working subject, or the creation of wealth." Lyotard, xxiii.

6 Lyotard, xxiv.

7 Lyotard, xxiv–xxv.

towards narratives turns to metanarratives, the postmodern incredulity towards the latter unites with a condition in which knowledge becomes a matter of exchange, i.e., shifts, in Platonic terms, from *sophia* to *sophistry.*

Tafuri's statement on the one side and Lyotard's on the other present us with a challenge: on the one hand, the open question over the "lost" legitimacy of knowledge—a knowledge that, in the meantime, has turned into exchangeable quantities of information—and, on the other hand, an erosion of the tasks of architecture (which does not disappear, but remains there, almost like a ghost, in the form of "pure architecture"). Two *aporie*, two impossibilities: the impossibility, in information, of a legitimate science and the impossibility of a "usefulness" or an actuality of architecture.

The present work picks up this challenge by bridging these two *aporie* under the sign of the *image.* Medium par excellence, the image is copy (not original), fictional (not real), accidental (not substantial), ornamental (not structural), subjective (not objective), part of an imaginary (not of reality), subject to interpretation (not calculus), representative (not effective), contingent (not necessary), religious (not scientific).[8] Quite similarly to

8 "The word 'image' is in bad repute because we have thoughtlessly believed that a drawing was a tracing, a copy, a second thing and that

the ornament for modern architecture, the image is precisely what modern science tries to liberate itself from, in the quest for absolute transparency.[9] As a medium, the image corrupts; it infiltrates and pollutes that space in between the observer and the observed; it compromises the possibility of a genuine and uncorrupted "friendship" with knowledge—of a *philo-sophia*, of an intimacy with knowledge that would nevertheless remain "chaste," that would not "conceive" but only acknowledge what stands *upon* (*epi-histēmi*), and thus beyond cycles of generation and corruption.

And yet, the question posed by the image is not just a metaphysical or an epistemological concern. The timeliness of the image, especially when related to what is referred to in the title of the present work as an "information age," is in the fact that, now more than ever, it becomes a relevant notion from a physical and thus *material* point of view. Not only architecture and knowledge find themselves in crisis in the contemporary condition: physics itself is

the mental image was such a drawing, belonging among our private bric-a-brac." Maurice Merleau-Ponty, "The Eye and the Mind," in *The Merleau-Ponty Reader*, ed. Ted Toadvine and Leonard Lawlor (Evanston, Illinois: Northwestern University Press, 2007), 356.

9   On this particular aspect, see Riccardo M. Villa, "Architecture of the Diaphanous," in *Ghosts of Transparency. Shadows Cast and Shadows Cast Out*, ed. Michael R. Doyle, Selena Savić, and Vera Buehlmann (Basel: Birkhäuser, 2019), 183–96. This essay is, in a way, prototypical for the present research.

faced with a profound upheaval with the quantum. The positivist and materialist determinacy according to which the world could be "pictured" (and thus determined) without any subjective interference that dominated the field and kept it apart from any idealism seems untenable from Heisenberg onwards. To a quantum-physical understanding, *observation matters*: not only can science not liberate itself from images but, quite on the contrary, it has to take them into account (and it cannot just do so in logical or calculative terms, as suggested, for instance, by perspective). If, on the one hand, knowledge becomes "exteriorized," as Lyotard says, on the other, it cannot avoid taking into account the relationship it entertains with some cryptic interiority, an incalculable "as much."

The title of book draws precisely from the field of physics, borrowing the notion of entropy and making it central beyond physics itself. Entropy is quite an "elusive" notion. Even in physics, this term absorbed a variety of meanings: a way to account for the loss of the capacity for work in a thermodynamic system, a "measure of disorder," the amount of information relative to a code, just to name a few. The notion of entropy polluted the exact science in which it was born with a certain degree of polysemy. At the moment of its coinage, Rudolf Clausius chose a Greek term so that such a name could be

transcribed into different languages: "I consider it better to take the names of such quantities, which are important for science, from the old languages, so that they can be applied unchanged in all new languages."[10] In this regard, entropy belongs to different territories both in a linguistic sense and a technical-scientific one.

What is interesting, though, is that despite these variations, the term entropy was ultimately chosen by Clausius to preserve a certain *invariance.* Quite counter-intuitively, such an unchangeable character does not imply sameness and cannot be mistaken for a "stable" identity, fixed once and for all. On the contrary, as a *ne varietur*, entropy cannot be grasped but in the continuous change of its discrete states, as a bridge between being and time. Clausius chooses the Greek *tropē* precisely to indicate transformation and change (*Verwandlung*), a change that the prefix *en-* turns into a "content" (*In-*

10   Here translated from the German. "Sucht man für S einen bezeichnenden Namen, so könnte man, ähnlich wie von der Größe U gesagt ist, sie sey der *Wärme- und Werkinhalt* des Körpers, von der Größe S sagen, sie sey der *Verwandlungsinhalt* des Körpers. Da ich es aber für besser halte, die Namen derartiger für die Wissenschaft wichtiger Größen aus den alten Sprachen zu entnehmen, damit sie unverändert in allen neuen Sprachen angewandt werden können, so schlage ich vor, die Größe S nach dem griechischen Worte ἡ τροπή, die Verwandlung, die *Entropie* des Körpers zu nennen." Rudolf Clausius, "I. Ueber verschiedene für die Anwendung bequeme Formen der Hauptgleichungen der mechanischen Wärmetheorie," *Annalen der Physik*, No. 125 (1865): 390.

halt): it makes of it something contained, withheld. The setting of such a relation between variation as potency and a determination of an interiority, or rather the understanding of such potency as a field circumscribed by a horizon, is at the core of how the image is put forward. It is not just a matter of *ratio* but of *proportion*: the relationship between transformation and content is always duplicated: as a connection between transformation and content—as the *Verwandlungsinhalt* of bodies— entropy appears in the doubling of their duality, as a double duplication (as an *image*, a "copy") or as a "quaternity."[11] Entropy is, in this sense, what provides a proportional double, a latent image of energy, and Clausius himself chooses the term to establish a certain resemblance (*Gleichartigkeit*) between the two.

Physics is a point of departure—and of return— of a broader circle that crosses its path with fields that are foreign, if not quite alien, to modern science. Entropy is here a key to understanding the image under the informational paradigm—information as a contingent paradigm, which is deter-

11   "Thus, we have two opposite terms: hot and dry here correspond to the masculine, cold and dry to the feminine. But by means of what mediating dialectic may we proceed from one to the other, uniting the two so as to produce a *quaternity*?" Henry Corbin, *Temple and Contemplation* (London and New York: KPI in association with Islamic Publications, London, 1986), 25.

mining the present condition as much as it is historically determined and, in this sense, constitutes an "age"—and the image becomes, in turn, a key to investigate entropy and to open it up to contamination from concerns that are external to physics. However, the point is not, as some contemporary debates seem concerned with, to counter physics with philosophy or, worse, to use philosophical discourse to explain physics and physics as a tool to legitimize philosophical discourse. Physics and philosophy, materialism and idealism, natural sciences and sciences of the spirit, and all the possible antinomies that can be thought along this line are here conceived instead in *architectonic* terms: the question is not how to deconstruct or to analyze one with the other, but rather how the picture of the first can be integrated into the latter, and the other way around. The preposition *upon* is to be understood in these terms: as a way to look at a subject matter that is a "detachment" as well as an "erection" of an argument that uses that subject matter as its very ground. The image is here understood in terms of *re aedificatoria*, as a "matter" (*res*) of edification. In Latin, *aedes facere* means "to make a fire," conveying the idea that it is possible to make room and to preserve it by at the same time giving up to an irreversible (thus entropic) process of transformation of matter, of *Stoffwechseln*.

The terms of such a double process of integration—of such an architectonic edification—always have to rely upon a certain "giving up" of things, something *negligible*, to describe it with the words of Simone Weil. Understood in an architectonic way, the image is a contract, a pact, a sort of domesticating submission to an absolute other over which no complete dominance can be claimed. The science that springs from such a movement is not a belief but *faith*, a kind of pact (*fides* and *foedus* are akin to each other) that endures only in the absence of evidence of the other party's trustworthiness.[12] The asynchrony between substance and evidence constitutes modern science as research. It has to continue indefinitely precisely because it cannot be there without a reserve of verification, which is always not immediately present. Reaffirming the image is, in this sense, a way to reaffirm the importance of such a "genealogy" of the modern paradigm, and affirming it architectonically is a way to rediscover and perhaps reinvent the constitutive role of theology in such a paradigm. Theology is here to be understood as a relationship (a *logos*) with an absolute other, a source of invariance that can never be exhausted or entirely rationalized but accommodated within that "domesticating sub-

12   "Substance of what is hoped for and argument of what is not visible," as defined in the Bible. *Hebrews*, 11:1.

mission" mentioned above. In this sense, theology is not necessarily referring to a determinate god or divinity; theology entails here a relationship not with gods but with *tò theîon*, to what writer Roberto Calasso described as "the divine before the gods":

> It is perfectly possible to live without gods. This, according to the criteria of the scientific community, is the state that corresponds to *normality*. Gods are not accepted there, inasmuch as they are unverifiable. It is their privilege and a rule of their etiquette. If gods were verifiable, they wouldn't be gods. It is more difficult, however, to live without the divine. [...] The divine is perpetual, in that it is woven into all that appears. Within what appears, it is that which allows access to what does not appear.[13]

The rediscovery of the architectonic qualities of theology can, therefore, be pursued even from an agnostic perspective: in the *complexio* of the quantum age, atheism and theism are antinomies that articulate but *one* categorical position.[14] On the other hand, agnosticism stands as a way of not stepping into the logical game of such an antinomy, levering instead on the gnoseological aspect without mak-

13   Roberto Calasso, "The Divine before the Gods," in *The Celestial Hunter*, trans. Richard Dixon (London: Allen Lane, 2020), 337.
14   A *complexio* that is in itself already "foreseen" in some readings of Christian theology: Ernst Bloch, *Atheism in Christianity: The Religion of the Exodus and the Kingdom* (London: Verso, 2009).

ing it a personal issue, as a gnosticism would, but rather—in the "open void" instituted by the alpha privative—an ethical and political one.

The current book does not have one line of argumentation but, instead, proceeds through different stages that do not necessarily follow one after the other. The underlying themes are looked at through quite different perspectives and with the help of sources from a broad disciplinary spectrum, if not beyond the notion of disciplinary spectrum itself. This peculiar form is due to a couple of reasons: the first being that this book has been, for its large part, compiled using work developed over the last four years or so in articles, essays, lectures, and conference presentations. This partly explains the heterogeneity of the content, as the interest or the themes of the book have been, on these occasions, turned to "serve" scopes other than the one of the book itself. The book's core has been kept absent or suspended on the one hand—as a *hypostasis* rather than a hypothesis—and exposed to the contingencies or chance the different calls brought onto it. From the beginning, the book refused to conceive itself systematically, planning itself in advance and executing itself accordingly by systematizing linearly and progressively whatever it finds on its path. Instead, it has been conceived closer to a *garden*, as something in which the moment of planning can-

not be extricated from the contingencies presented by the weather and whose execution is not linearly derived from its planning, but in which these two moments keep on overlapping and calling upon each other, providing an image that is stable only upon the perpetual instability provided by this contract struck with chance.[15]

The other reason for the refusal of an analytical and "logocentric" argumentation and in favor of proceeding instead through a sort of rhapsody— articulating the content in different episodes that can be considered independent from each other— is the attempt to provide the book with a certain degree of autonomy from the question or the personal interest from which it sprung. The outcome of the book is, therefore, not a solution to a problem but rather the articulation of an issue through a different set of lenses. In this sense, the form of the book is coherent with its content: its "image" is a transparent, absent one that is concerned with outlining its transcendental nature and that, to do so,

15 "In regard to architecture, the making of a garden blurs the traditional distinction between design and construction that since the Renaissance has ruled the discipline. [...] The design of a garden can thus be seen as a paradigmatic example of a working process that develops in time: it does not happen all at once but is constantly performed as the garden evolves across years and seasons. It is possible to say that gardening is more about maintenance than execution." Pier Vittorio Aureli and Maria Shéhérazade Giudici, "A Concise History of Gardens," *Accattone*, October 2019, 216–223.

must free itself from a utilitarian, solution-oriented paradigm. It is an *instrument* rather than a *tool*.

The refusal of a systematic character and embracing the garden paradigm entails a further unusual feature of the book, especially compared to the established academic practices: the renunciation of the claim to the possibility of drawing an exhaustive picture of the state of the art. On the one hand, because a "state of the art" would be here hard to assess: which "art" is this state belonging to? Is it architectural history, philosophy, physics...? Nevertheless, even beyond this question, which could perhaps more or less be answered in some way, the renounciation of such a claim stems from a precise ethical stance. A work that deals with the "age of information" cannot ignore that an evident feature of such an age is a copiousness and superabundance of sources. This sole fact makes the claim to exhaustiveness not only destined to fail but is also blind to that "lack of ground" that, according to Lyotard, characterized the postmodern condition. Instead, I propose to adopt a *canonical* attitude towards sources, an explicit act of filtering and selection. Such a canonical attitude implies the awareness that the sources will determine the argument as much as the argument will determine them. To write architectonically means to keep in mind the articulation of this *quantum*, of this

incalculable "as much." To write architectonically means to reintroduce the possibility for an ethical and political form of writing that acknowledges the responsibility of decision as the ethico-political act par excellence and refuses to demand its legitimization to a "state of the art."

The relationship with the sources does not only change in their selection: such a paradigm shift entails that their treatment must be rethought. The analytical approach, in which references are brought in and analyzed—repeatedly cut apart "to the bone" in order to turn them into the evidence of an intellectual trial that unveils what *really* happened—and the exegetical one—that tries to be as faithful as possible to what the author *really* meant, following the ideal of the possibility of recovering an original meaning—cannot, in this setup, be kept. If the image interferes with the possibility of understanding the world in terms of original and copy, this means that also the dealing with the sources has to follow a much more "dirty" approach. I tried to exercise such an approach through the commentary format in the book. Unlike analysis, commentary is a form of writing that does not claim to speak in the name of its source. It sits *next* to it; it parasites the source while at the same time declaring its cosmetic, decorative character; it affects its object and, by doing so, it is both de-

termining to it and determined by it. It proves that the connection between *cosmos* and *cosmetics* is more than an etymological one.[16] Like the image, commentary opens a space in which the predeterminate becomes simultaneous with the indeterminate and where the relationship between the two can be endlessly rethought.

The references through which the book flows are the product of the encounter between its guiding hypostasis and the different occasions through which it has been articulated, a confrontation of personal interest with objective chance. Such conjugation between foreign characters is replicated on a higher level, as the accumulated material is accommodated in an organization that is in principle

16   On the "cosmic" nature of the ornament, see Ananda K. Coomaraswamy, "Ornament," *The Art Bulletin* 21, No. 4 (December 1939): 375–82. The correspondence between commentary and image is one of the carrying themes of Emanuele Coccia's doctoral dissertation, a significant reference in this book. Coccia writes: "In the commentary, a completed writing seems to regain its poetic possibilities: in it, poetry coincides with its passing on and tradition regains all its poetic faculties. This peculiar inversion can be compared to the change of aspect that in the Hebrew language the *vav* determines in the verb on which it relies: it passes from designating an accomplished fact (*perfectum*) to an unfinished fact, one that has not yet taken place, and vice versa. [...] Like a writer who enjoys placing a *vaw conversivum* next to each text, each commentator, without changing the letter in any way, overturns the state and appearance of the language of a work and transforms what is written into something that is yet to be said and formulated, reverses tradition into the highest poetry of memory." Emanuele Coccia, *La trasparenza delle immagini: Averroè e l'averroismo* (Turin: Bruno Mondadori, 2005), 6 (here translated from the Italian).

alien to such content and that follows the mechanics of the *tetraktys*, the same exploited by Vitruvius in the *De architectura*: ten books, collected in four sections; the books collected in even numbers (I–IV; VIII–IX) are divided into three chapters each; the books collected in odd numbers (V–VII; X) are divided into four chapters each.

The first section, *Bildverlust* (literally: the "loss of the image"), deals with the modern attempt to gain a transparent, crystalline view over the world, one in which the image, as I try to conceive it, would no longer play a role. It deals with references such as German philosopher Hans Blumenberg and his lecture on world images and world models, in which Blumenberg describes the shift from pre-modern to modern precisely as a shift between the first and the latter; it engages with the work of Italian philosopher Massimo Cacciari, particularly his essay on the project as a sort of modern political device able to overcome political theology and to throw the political in a programmatic domain. A further essay by Cacciari on the work of Walter Benjamin serves as a way to unravel the intricate relationship between the technical domain of language and the symbolic one of names. The section concludes with Tafuri's work on history not as progress but as a *space*. This is important because it fore-

grounds a way to address images again precisely in their total absence.

If, in the previous section, the image was sounded as an absence, the second section, *Non-Referential Image*, inverts the perspective and addresses the image as an autonomous entity from subjects and objects. It does so first by picking up Plato's critique of images and Aristotle's one on money, as it anticipates the role of images as a sort of currency that circulates between subjects and objects. Emanuele Coccia's doctoral dissertation plays a central part in this section on Averroes, which is quite tellingly titled "The Transparency of Images" (*La trasparenza delle immagini*). Averroes's work—which comes as a commentary to Aristotle's writings—revolves around the notion of a *material intellect*: a mind separate from individual ones, in which images live as autonomous beings. The autonomy of images is investigated then through the further example brought by Russian theologian Pavel Florensky, in which the religious icon is described as a contraction between two different temporalities: a daylight one, in which time flows as we are used to, and a dream one, I which time flows backward and instantaneously. This is helpful as it connects a theological understanding of images with the informational one, in which the image converts light into mass and vice-versa.

The third section, *Nomos of the Garden*, is perhaps the one that tries the most to understand the image in its architectonic nature. The image becomes the lieu, the "place" of a contract. This contract can happen between subject and object, heaven and earth, human and nature... what matters is not the ontological classification of the antinomies—of the two parties that strike the contract—but the contract itself: it is the image, as a contract or as a *nomos* that determines the role of the parties and puts them into communication. This architectonic and almost juridical character is addressed via two main examples: Henry Corbin's *Imago Templi* and Gilles Clément's *garden*. The first is helpful to outline the principle of double duplication: the *Imago Templi*, literally the "Image of the Temple," is what puts heaven and earth in communication, but it does so by addressing them in couple with their own images, hence articulating this communication in what Corbin calls a "quaternity." Clément's *garden* is instead a locus of encounter between landscape and environment, thus between a subjective and objective image. In the garden, though, landscape becomes objectified, and environment opens itself to subjective rules; one is contaminated through the other.

The final section, *The Architect as Demiurge*, tries to reconnect the heritage just laid down with the

paradigm of quantum physics and information theory and with how the role of the architect can be rethought within this novel paradigm, as a demiurge, as a "public worker" able not just to describe the world, but to cast it through its project actively. Heisenberg's stress on the role of observation and Leon Brillouin's theorization of information in relation to energy pave the way to once again emancipate the image from a conflation into a subject-object dualism and to understand it in terms of code and currency. This shift embraces the "groundlessness" described by Lyotard's postmodern condition: the loss of ground turns here into a "metaphysics of the negligible:" narratives, metanarratives, images, and any presupposition is not what is eliminated or lost but what has to be spent or neglected in order to establish a connection—in this case, between physics and metaphysics. This connection is never predetermined, but it is also not wholly arbitrary: in this sense, it comes close to what has been previously described as an "agnostic theology," as it is weaved in accordance with an "unnamable substance."

The different sections constitute an arc that bridges a more historiographic approach with a somewhat theoretical one, in which the two are always present within each other. The first is undoubtedly the legacy of my studies and work previously developed at Politecnico di Milano and in

the longstanding collaboration with Prof. Marco Biraghi and with the Architectural Research Collective *Gizmo*. The latter sprung from the encounter with the Department of Architecture Theory and Philosophy of Technics and, in particular, with the work of Prof. Vera Bühlmann, who supervised the dissertation from which the present book stems. The overall latent interest that runs from both sides of such an arc is nevertheless unchanged: it concerns the relevance of architecture in the contemporary condition, within and beyond what its disciplinary boundaries might appear to be.[17]

But, ultimately, why is it important to recover such a quite outdated format and to rethink architecture through a notion of image that has more to do with Medieval theology and Islamic theosophy than with modern technology? To begin with, this book has been compiled in complete antithesis to a "compartmentalized" understanding of history or science. If the image is a mixture, an aggregate, this is also the case of the approach presented here: physics compenetrates with theology, architecture with philosophy, and so on. And so do historical periods: antiquity resonates with the contemporary, modern, and postmodern are not seen as a linear succession but as two faces of one coin, and so on.

17 Riccardo M. Villa, "Stefano Boeri: Mutazioni di un Architetto" (Masters Thesis, Milan, Politecnico di Milano, 2012).

This is, in a way, something characteristic of the "information age" at large. The status of knowledge in computerized societies, as Lyotard called it, is characterized by a copiousness of sources and converting knowledge into an object of exchange, into a currency. Nevertheless, there is a further argument to support the reasons for looking at such a currency as an image in the sense proposed until now and to do so in the form of commentary as just discussed.

Another element distinguishes the information age: what Roberto Calasso calls the confluence between *digital* and *digitable*.[18] Such a confluence shakes to its foundations the edifice of epistemology—of a conception of science as a discourse that stands beyond contingencies. Once it becomes digital, every form of knowledge does not simply stand but is always open to "digitability." To quote Calasso, it turns into "[a]n encyclopedia that juxtaposes impeccably reliable information with baseless information, equally accessible and on the same level."[19] In its "baseless" character, this knowledge

18   Roberto Calasso, *The Unnamable Present*, trans. Richard Dixon (London: Penguin, 2020).
19   "An enormous mental upheaval, which no one would be able to contain, was caused—and continues to be caused—by the confluence of *digital* and *digitable*. Knowledge assumes the form of a single encyclopaedia, in perpetual proliferation, and generally speaking digitable. An encyclopaedia that juxtaposes impeccably reliable information with baseless information, equally accessible and on the

or reality lacks a predetermined hierarchy. It is an "anarchic condition" (or a condition of "technical anarchy," perhaps) in which actuality and potency compenetrate with each other. This is, I believe, a novel fertile ground for architecture.

However, this compenetration of actuality and potency, to speak in Aristotelian terms, is precisely what the image—the image of Averroes, the iconostasis of Florensky, but also, the garden of Clément, the project of Cacciari and Tafuri, and ultimately, the quantum-physical image and the informational code—can "picture," and what the commentary as a format is able to speak of. The confluence of digital and digitable corresponds indeed to "an enormous mental upheaval," as Calasso calls it. However, this epistemological revolution—or, perhaps, the end of epistemology itself—also foregrounds a novel relevance, if not a primacy, of architecture. Architecture is here not just a *Baukunst* and not just a theory of architecture but is a kind of wisdom that is not just epistemic but that touches with the

same level. What is digitable belongs to what is familiar and can so be used with fond indifference. Knowledge loses prestige and appears as though made up of items—in the sense of headings in an encyclopaedia and incontrollable, drifting rumors or *boatos*, as they say in Portuguese. The most fascinating—and potentially fruitful—aspect of this total encyclopaedia is the *algorithmic chaos*, so that once the most probable connections have been reached, they become increasingly arbitrary and misleading, as is supposed to happen in a neural network." Calasso. 70.

political, too, as Aristotle writes (so that it is not just about necessities, but also and mainly about chance and contingencies).[20] Quoting Tafuri once more, what matters here is not (anymore) identifying those tasks that have been taken away from architecture. What matters now is to look for and open novel domains *freed* for it.

This attempt—I am aware of it—features what could be perhaps described as a "loud silence:" the quasi-complete lack (except for a few slips and exceptions) of architecture in the traditional sense. This is not a case. Architects and buildings did appear in much of the work I did in preparation for this book, but their presence has been omitted from the final composition. They acted almost as a sort of cast, a scaffold to be removed after completion. I wanted to foreground not the exemplar character of specific architectures but rather the theoretical milieu in which they could have been accommodated. In a way, if the image I tried to speak of is the paradox of an *image without image*, the architecture I tried to foreground is an *architecture without architecture*. To use architectures as examples would have perhaps inevitably created a "non-unraveled calligram," to paraphrase Michel Foucault:[21] it

20   Aristotle, *Nicomachean Ethics*, 1094a 25–28; 1140a.
21   Michel Foucault, *This Is Not a Pipe* (Berkeley, California: University of California Press, 1983).

would have cast images in which the architecture becomes functional or programmatic (in Tafuri's terms: normative, operative), in which architecture becomes a metaphor or a picture of the theory, and in which the theory explains the architecture, hence subjecting my work to the same logocentrism I tried to avoid. This implies, *ça va sans dire*, a broad rethinking of architecture and architecture theory beyond its current disciplinary boundaries. This book is an attempt, even if perhaps still a timid one, to go in that direction.

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BILDVERLUST

I
Scientific Reserve

The Age of the World Model

Weltbildverlust, or "the loss of world images," such is, according to German philosopher Hans Blumenberg, the distinctive trait of the modern condition.[1] Blumenberg spoke such words in his speech for the anniversary of the foundation of the University of Giessen. That occasion also marked the reinstating of philosophy amongst the other faculties. Such a reconciliation is illustrated, in Blumenberg's terms, as the reversal of a "genetic process:"[2] the

[1] Hans Blumenberg, "Weltbilder und Weltmodelle," in *Nachrichten der Giessener Hochschulgesellschaft*, Vol. XXX (Gießen: Schmitz, 1961), 67–75. All the following English quotes have been directly translated from the German text.

[2] "Das Einzigartige des Gießener Restitutionsvorganges, dessen

natural sciences—that at that moment constituted the characterizing and more expansive part of the modern university—were then called to reintegrate faculty of philosophy from which they initially sprung. In Blumenberg's view, natural sciences and philosophy are both endowed with a sort of common genetic code, as they both arise from the human attempt to gain consciousness of oneself and of one's condition by bringing it to language: they share a theoretical attitude that passes by a *Sprachwerdung,* their development in and through language. According to Blumenberg, this function is part of the human "spiritual economy."[3]

In his speech, Blumenberg highlights how the role of language in the formation of consciousness and awareness of action is, in fact, fundamental for the establishment of ethical guidance. A constant difference, or a sort of rift, persists between action and consciousness, between theory and praxis. In Blumenberg's words, "[w]e need to know what we are doing in order to ask ourselves if it is what we

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Zeugen zu werden wir erhoffen, liegt nun darin, daß dieser genetische Prozeß umgekehrt erscheint: die auf Grund ihrer fast tödlichen capitis damnatio vorwiegend naturwissenschaftlich geprägte Universität integriert sich aus der Autonomie ihres Wollens und trotz drängender Bedürfnisse des Ausbaus innerhalb der bestehenden Fakultäten durch Wiedererrichtung der Philosophischen Fakultät." Blumenberg, 67.

3 "Die Aufgabe, die der Philosophie im Verband der Wissenschaften zufällt, läßt sich auf ihre Funktion im geistigen Haushalt des Menschen überhaupt zurückführen." Blumenberg, 67.

ought to be doing."[4] The consciousness of one's actions that language allows for is necessary in order to ascertain whether those actions are ethical or not, whether a "reasonable" connection—i.e., one that can be "logically" articulated through language and its *logos*—can be established between their possibility and their enactment. "Only in language can the ominous incongruence of consciousness and action be neutralized," as Blumenberg puts it.[5] Language ties the two together, suspending and "neutralizing" (*aufhebt*) their distance.

With Descartes, Blumenberg maintains, this process undergoes a substantial and irreversible alteration. The connection between the theoretical attitude, proper to science and philosophy, and an ethics of praxis (or a *sollen*) appears severed and not reliable anymore on the process of *Sprachwer-*

4 "Wir müssen wissen, was wir tun, um uns fragen zu können, ob es das ist, was wir tun sollen. Der Zusammenhang zwischen Wissen und Sollen ist komplizierter geworden als Sokrates ihn zuerst sehen konnte." Blumenberg, 68.

5 "Nur in der Sprache hebt sich die verhängnisvolle Inkongruenz von Handeln und Bewußtsein auf, die für unsere Situation immer bestimmender wird." Blumenberg, 68. Blumenberg's speech does not directly mention ethics, which seems nevertheless implied in formulations such as the one just quoted—connecting possibility or *können* with 'ought to' or *sollen*—as well as in periphrasis such as "theoretical responsibility." (75) *Logos* and *logics* are also never mentioned by Blumenberg, yet the "function" he outlines is close to the term's original meaning of collection-connection: language is then making action "passively" legible by "actively" tying *können* and *sollen*—a "logos" of consciousness that establishes a "logics" of action.

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dung. Descartes postulates man as the "reference of sense" for all the natural sciences. However, precisely by doing so, he unties the representation of nature from what Blumenberg defines as the "instrumentality" (*Zweckbestimmung*) of all of its knowledge. Turning the human (*der Mensch*) into a reference implies de facto undermining the centrality of his position in nature, a position that, once absolute, can now potentially be considered relative. The human shifts from being *Sinnzentrum* to *Sinnbezug*, from the "center of the sense" of nature to being a mere "reference" of its process of knowledge.[6] In Blumenberg's argument, such a shift produces a significant repercussion: what the relativization of man's position within nature entails, in return, is the emancipation of natural science from the human cosmos—its autonomy. The representation of nature becomes a "vectorial" one, so to speak, contingently oriented according to the point it takes as a reference and thus independent from any supposedly necessary orientation. The connective character of language, its ability to bridge praxis with theory, becomes completely autonomous from what one could call personal consciousness: the emancipation of sciences from the human scale goes hand in hand with the affirmation of an *impersonal* logos. Consciousness, or

6   Blumenberg, 69.

the "making-sense" of things, is disentangled from man's interiority and becomes a thing in itself: *res cogitans*, "thinking matter." The logos that Descartes introduces with his method is not necessarily absolving an ethical and orientational function in the human spiritual economy anymore; it breaks off with the process of *Sprachwerdung*. Even if the aim of the Cartesian method was still, eventually, "to unify theory and morality,"[7] as Blumenberg clarifies, the vicariousness opened up by its referential character turned this aim into a merely contingent and instrumental one. For the first time in history, a subtle and yet fundamental difference emerges between what Blumenberg calls "the total representation of nature," within which man is at the *center*, and the "instrumentality of the totality of the knowing of nature," to which man is only a *reference*. In his words, what appears with Descartes is the distinction between *world image* and *world model*:[8]

7 Blumenberg, 68–69.
8 "Obwohl für Descartes und seine Zeit der Mensch schon nicht mehr in der Mitte des Weltalls und im *Sinnzentrum der Natur* beheimatet war, wurde er doch um so entschiedener als *Sinnbezug der Naturerkenntnis*, der Gesamtheit der Wissenschaften, postuliert. Hier liegt eine Differenz zwischen der *Totalvorstellung von der Natur* einerseits und *der Zweckbestimmung der Totalität der Naturerkenntnis* andererseits vor, die in der Folge höchst bedeutsam werden sollte. Denn in ihr sind zum ersten Male 'Weltbild' und 'Weltmodell' auseinander getreten, ja ihr fundamentaler Unterschied wird damit überhaupt erst sichtbar aktualisiert." Blumenberg, 69 (italics added).

By 'world-model' [*Weltmodell*], I mean the total representation of empirical reality that depends on the respective state of the natural sciences and takes into account the entirety of their statements. By 'world-image' [*Weltbild*], I refer to that quintessence of reality in which and through which man understands himself, orients his values and goals of action, grasps his possibilities and necessities, and projects himself in his essential needs.[9]

The *world image* fulfills precisely the need for ethical orientation and reconciliation between consciousness and action. It settles this connection into a determinate order, into a cosmos of fixed constellations that provide guidance for one's navigation. The "magical" world image, the image of *kosmos* of antiquity, and the representation of the *ordo* in the Middle Ages are the few cases explicitly addressed by Blumenberg as examples. According to him, the

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[9] "Unter 'Weltmodell' verstehe ich die von dem jeweiligen Stand der Naturwissenschaften abhängige und die Gesamtheit ihrer Aussagen berücksichtigende Totalvorstellung der empirischen Wirklichkeit. Als 'Weltbild' bezeichne ich denjenigen Inbegriff der Wirklichkeit, in dem und durch den der Mensch sich selbst versteht, seine Wertungen und Handlungsziele orientiert, seine Möglichkeiten und Notwendigkeiten erfaßt und sich in seinen wesentlichen Bedürfnissen entwirft. Das Weltbild hat 'praktische Kraft,' wie Kant gesagt hätte." Blumenberg, 69. *Weltbild* is here translated as "world image" and not as "world picture" in order to maintain the character of alterity of the *Weltbild* from something more technical such as the *Weltmodell*. World picture and world model are, in this sense, almost synonymous—Heidegger's "world picture," for instance is the necessary *Bild* of the world model.

"horizon" of this image can work as a "screen" to protect man's interiority from the threats to the sense of his position in nature brought by his exposure to a continuous confrontation with it.[10] It has what we could perhaps describe as a "domestic" or even a "domesticating" character. The *world model*, on the other hand, is still a "total representation" (*Totalvorstellung*), but whereas as an *Inbegriff*, as a "quintessence" of reality, the world image imposes itself as absolute, the world model is always dependent (*abhängige*) on the status of natural sciences and is, therefore, a representation *of* empirical reality. Such a dependency implies that the world model is never complete in itself—in other words, it is never a "systematic construction"[11]—but that it is always factoring in what natural sciences situationally "dictate" to it through their statements (*Aussagen*), and that it is continuously "corrected" by these. It is important to remark that this process is indefinite: the world model is indeed a "total" representation that considers scientific statements in their *Gesamtheit*, but such an arithmetic totality has to be indefinitely integrated within the model.

10 "Sicher ist es richtig, daß Weltbilder in der Geschichte des menschlichen Bewußtseins eine höchst positive Funktion gehabt haben. Es war notwendig, daß der Mensch nicht ständig offen mit seiner exzentrischen und im Sinn bedrohten Lage in der Natur konfrontiert war. Bildhorizonte konnten dabei abschirmend und Inneres beschützend wirken." Blumenberg, 72.
11 Blumenberg, 75.

The world model is, therefore, undoubtedly "exhaustive" and "resolved" within itself, hence the character of *Totalvorstellung*. However, it can never be "exhausted" nor lead to a definitive "solution," as this would confer the systematic character proper to the world image. "Scientific findings," Blumenberg writes, "are statements to be put at the test and under the permanently efficient reserve of their verification"[12]: even when considered in their totality, the statements must always confront themselves with a "reserve," a domain upon which statements cannot be made—or at least not yet. This reserve (*Vorbehalt*) must always be "held before" (*vor-behalten*) the domain of statements. It marks the very boundary of this domain, a boundary beyond which *silence* must be observed: "To say no more than we can know—that is infinitely more difficult to realize critically than the one who

12   "Wissenschaftliche Erkenntnisse sind Aussagen auf Probe und unter dem ständig wirksamen Vorbehalt ihrer Bewährung; wenn sie sich zu Bildern stabilisieren, ist dieser Vorbehalt gefährdet, geschwächt, latent geworden und alsbald vergessen." Blumenberg, 74–75. *Vorbehalt* is literally a "reservation." It has been here translated intentionally as "reserve" in order to give such reservation into a magnitude and, by doing so, to unveil a reading of Blumenberg's argument that perhaps Blumenberg himself did not think of and which perhaps he might have even disagreed with, but that is nevertheless consistent and contained in the autonomy of his words. Furthermore, a similar translation has been provided in Hans Blumenberg, "Immagini del mondo e modelli del mondo," in *Filosofi per l'Europa: differenze in dialogo*, ed. Luigi Alici and Francesco Totaro, 1. ed, Filosofia (Macerata: EUM, 2006), 13–26.

observes with scientific enthusiasm might guess at first glance."[13] This silence must not nevertheless be misunderstood as a "muting" or as a "mutilation": the reserve still acts upon scientific statements, it is *wirksam*, "efficient" and operational, and it is so precisely as long as it is prevented from developing into language—if so happens, the reserve's effectivity is threatened, and the scientific world-model falls back into a world-image. There seems to be a correlation, in Blumenberg's argument, between *Sprachwerdung* and *Weltbild*, and hence between language and picture, as if to develop into language what is "sealed" in the reserve—and therefore to be able to *speak* of it—would be synonymous to *picture* it. The reserve is then not only the domain of the unspeakable but also of the invisible and unimaginable or, if understood temporally, of the unpredictable and of the unforeseeable (i.e., of chance) that must be kept as such in order for the model to be scientifically verifiable.

Parallel and Meridian

As *Vorstellung*, the world model never coincides with what is kept in the reserve but must always

13   "Nicht mehr auszusagen als wir wissen können—das ist unendlich viel schwerer kritisch zu realisieren, als der wissenschaftsfreudige Betrachter auf den ersten Blick zu erahnen vermag." Blumenberg, "Weltbilder und Weltmodelle," 74.

parallel it: reserve and model must stand beside each other without ever crossing or overlapping. *Paradeigma,* the Greek word for "model," preserved in the modern term *paradigm*, literally means "what is shown beside." Only through parallelism and without a "direct" showing can the model safeguard the reserve while simultaneously entering in resonance with it. A picture of this model can only be conceived as an arbitrary connection (as a *con-tingency*, a "touching together") between model and reserve, as a provisional stoppage or pause of the indefinite chain of resonance between the two. The most paradigmatic case of this picturing is perhaps Renaissance's perspective drawing, an "imaging" method based on the convergence of parallel lines at a horizon. Since this convergence is always established arbitrarily, the picture produced is veritable only circumstantially, *in relation to* and *depending on* the contingency of that decision. In this analogy, the vanishing point would coincide with Blumenberg's *Sinnbezug*, the contingent reference of sense. The world model can provide pictures that are always "hanging from" (*ab-hängige*) the crossing of "parallels" with a "meridian"—an angular section or cut, a particular take over something—and are therefore *dispositional*: not only do they portray a particular position or localization, but this particular "address" is always *disposed* ac-

cording to a global partition, i.e., to a specific *order* of the world-as-model.[14] According to such a "parallel" understanding of representation, there can only be a *world model*, and never a *world image* or a *world picture*, since no *Bild* can ever claim global coverage and can instead only be a "patch" or an "address" of a global model. Ideologies and worldviews are instances in which the *Weltbild*'s plurality becomes evident and has adverse effects. As Blumenberg stresses, "the function of the world-image

14   A "fundamental process involved in the relation between localization order [*Ordnung*] and orientation [*Ortung*]:" according to Carl Schmitt, this is the meaning of the term *nomos*. As a "take" over something, the meridian well resonates with the nomos as *Nahme*, as the impersonal "seizing" or "appropriation" that Schmitt attributes to the *nomos*. The entanglement between order (ordinality) and position (cardinality) is the key or the double cipher behind which Blumenberg's "reserve" is kept. See: Carl Schmitt, "Nomos – Nahme – Name", in *Staat, Großraum, Nomos: Arbeiten aus den Jahren 1916–1969*, ed. Günther Maschke (Berlin: Duncker & Humblot, 1995), 573–91; Carl Schmitt, "On the Meaning of the Word Nomos', in *The Nomos of the Earth* (Candor, NY: Telos Press, 2003), 67. As Michel Serres puts it: "Nature is hidden [*dissimulée*] behind a cipher [*sous une grille*, literally "behind a grid."] Mathematics is a code, and since it is not arbitrary, it is rather a cipher [*chiffre*]. Now, since this idea in fact constitutes the invention or the discovery, nature is hidden twice. First, by the cipher [*grille*]. Then with an ingenuity [*une adresse*], a modesty, a subtlety, that prevents our reading the cipher [*grille*] even from an open book. Nature hides beneath a hidden cipher [*grille*]. Experimentation and intervention consist in bringing it to light. They are, quite literally, *simulations of dissimulation*." Michel Serres, *The Birth of Physics*, trans. David Webb and William Ross, 2018 edition (London: Rowman & Littlefield International, Ltd, 2018), 168.

is essentially monistic, as the world-image does not tolerate other world-images besides itself."[15]

Once understood, the dispositional nature of images, and the way they can be produced contingently as a provisional, disposable, and arbitrary symbolization of the reserve, the task of philosophy becomes clear: to mathematically apprehend the mechanics of this construction and to cross them in the opposite direction, counter-current. Philosophy, Blumenberg maintains, can still have a place amongst sciences not by claiming a role of guidance but by "transcending them from within."[16] Philosophy must prevent the production of world images, a task that can be paradoxically taught precisely through the critical study of such systematic constructions: only by finding one's way into the "labyrinth" of a system, says Blumenberg, can one learn how to find the way out of any of them.[17] Only by going through them can world images be left behind and their power dissolved. The paradox of Blumenberg's notion of *Weltmodell* consists in the

15 "Aber diese Positivität der Weltbilder muß als unter Bedingungen bestehend begriffen werden. Die wichtigste läßt sich in die Formel fassen, daß die Weltbildfunktion ihrem Wesen nach monistisch ist. Das 'Weltbild' verträgt keine anderen Weltbilder neben sich; schon der Plural 'Welten', 'Weltbilder' ist ein Sprachprodukt des Zeitalters der historischen Reflexion, ist ein Stück Philosophie der Philosophie." Blumenberg, "Weltbilder und Weltmodelle," 72–73.
16 "Denn Philosophie transzendiert Wissenschaft nicht nach außen, sondern nach innen." Blumenberg, 74.
17 Blumenberg, 75.

fact that the world model cannot be conceived if not through the active "dissolution" of images; after all, the world model is presented by himself as what rises *as a difference in itself* from world-images. The *Weltbildverlust*, the "loss of world-images," is not just a condition of the contemporary age but something to be actively practiced so as to continuously "present" to oneself.

Like images, languages—especially *scientific* ones—must always be considered in their provisional, instrumental, and thus *referential* nature: the "exactness" of scientific languages cannot be traced back only to their formal structure, Blumenberg argues.[18] This is the danger brought by specialistic languages and their self-enclosed and "territorial" character of *geschlossene Fachsprachen*. Exactness is instead *paradigmatically* relying on an unnamable else, on its development according to a model that develops *parallel* to the efficient reserve. For this reason, the referentiality of both images and language must always be severed and "absolved" from any stable or explicit coordinates—from any *Sinnzentrum*. Science, Blu-

18   "Es ist die in den geschlossenen Fachsprachen der Wissenschaften angelegte Gefahr, daß sie ihre Exaktheit schon in ihrer formalen Struktur erfüllt zu haben scheinen und darin die Aufgabe ihrer 'Wissenschaftlichkeit' als gelöst vorgehen. Aber die wahre Strenge einer Wissenschaft liegt in der Kongruenz ihrer Leistungsdefinition mit ihren Ergebnissen." Blumenberg, 74.

menberg maintains, produces the necessities and regularities of its progress autonomously. Sense is not a "constant" nor anything imposed on science from outside or above; it is instead up to science itself "to generate, reawaken, and withhold sense through the vitality [*Lebendigkeit*] of its praxis."[19] In order to ensure this autonomy, philosophy must keep the domain of sense open by impeding the affirmation of world images and, in the words of Blumenberg, by "denying man the obedience to his needs, precisely from the coming-to-speech [*Zur-Sprache-kommen*] of scientific consciousness."[20] A call to perpetual deconstruction and critique of images and languages seems to be at the basis of science and to constitute its *Lebendigkeit*, its "vital-

[19] "Es ist eine nackte Feststellung, daß die Funktion der Wissenschaften in unserer gegenwärtigen Wirklichkeit nichts mehr mit den Motiven ihres frühneuzeitlichen Ursprunges gemein hat. Wissenschaft ist autonom geworden. Sie bringt die Notwendigkeiten und Gesetzmäßigkeiten ihres Fortschreitens aus sich selbst hervor. Und wenn sie so etwas wie ein sinnhaftes Ganzes ist – und die Universität ruht als Institution auf dieser Überzeugung –, dann übernimmt sie nicht diesen Sinn aus einer hinter ihr oder über ihr liegenden Sphäre umfassender Sinngebungen, sondern erzeugt und erweckt und erhält diesen Sinn ständig selbst in der Lebendigkeit ihres Handelns." Blumenberg, 70.
[20] "Freilich, der Weltbildverlust ist eine schmerzvolle Amputation, denn der Mensch hat das unausrottbare Bedürfnis, auf seine letzten und umfassendsten Fragen Antwort zu beanspruchen. Aber gerade hier wird Philosophie in einem radikalen Sinne dem Menschen die Hörigkeit gegenüber seinen Bedürfnissen verwehren müssen, und zwar aus dem Zur-Sprache-kommen des wissenschaftlichen Bewußtseins heraus." Blumenberg, 75.

ity." The world model must "consume the residual substance of the world images" to make room for the "belief in science."[21] The philosophical task is one of analysis, in its etymological understanding of *ana-lusis*, a perpetual and recursive "dissolution," a *Verlust* as much as an *Auflösung*.

Public Sense

Blumenberg's speech advocates for science as a *publicness of sense*: the domain of sense, i.e., something that has to do with the determination of causes as much as with an empirical "sensing" of things, must be kept open and publicly accessible—*öffentlich*—so that natural sciences can keep on "making-sense" of the world through its paradigmatic modeling. The ability to abstract and to abstain oneself from settling the world to a specific sense

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21 "In Wirklichkeit war es so, daß das 'Weltmodell' die Stelle des 'Weltbildes' besetzte und noch immer dabei ist, die Restsubstanz des Weltbildbestandes aufzuzehren. Daß es so etwas wie Wissenschafts-gläubigkeit geben kann, beruht darauf, daß die Wissenschaft ihre Bedingtheit durch einen Weltbildglauben verloren hat." Blumenberg, 71. The "belief in science," or *Wissenschaftsgläubigkeit* assumes in the active deprivation of images a nature very close to the similarly active practice of *faith*—following a famous biblical definition faith is "substance of what is hoped for" and "articulation [πραγμάτων or *argumentum*] of what is not sensible" (*Hebrews*, 11,1). Despite Blumenberg's opposition to an understanding of modernity in terms of secularisation, the link he establishes between the "loss" of images as an active practice and the importance that such practice has in the preservation of a reserve of what cannot be positively stated and yet can still be sensed strikingly resonates with the "functioning" of sacrifice.

and a *Sinnzentrum* is constitutive, according to Blumenberg, for a civic education: "Education [*Bildung*] is essentially the ability of not being seduced [*Unverführbarkeit*]."[22] As already pointed out, such education must paradoxically pass through the "enclosing fullness" of world images, as the etymological kinship between *Bild* and *Bildung* suggests, and through their domestic-and-domesticating character. It is an *ex-ducatio*, a "leading-out" from the labyrinthine path of world images and languages as systematic constructions and a training against their power of seduction: *ex-ducere* against *se-ducere*.

To be seduced would mean to believe in a given sense, to let oneself be mis-lead (*ver-führen*, *se-ducere*), and therefore to exhaust or cover up the efficient reserve in the production of a world image. In its unnameability, the efficient reserve can communicate with the senses only apophatically, through the paradigmatic information of the world model; images and languages arise only out of a sort of *profanation* of the sacred boundary of the reserve. Behind every profanation stands, therefore, the risk of privatization, a subtraction (*privatio*) from the public domain, and its reorientation towards the singular interests of enclosed domains—where the world image turns into ideologies and worldviews, and speech into closed-off specialistic languages.

22 "Bildung ist ganz wesentlich Unverführbarkeit." Blumenberg, 75.

II
Project

Ocean and Utopia

One of the merits of Blumenberg's argument is that it highlights how the loss of world images is an *irreversible* condition. It is not just world images to be lost, but also a sort of infancy: the modern age seems to bring along a closure within itself, a "maturation" of time that, even if it is able to comprehend the previous traditional set-up, it cannot think—or not "honestly" at least—how to rewind to it. "[T]he atheist amongst the aristocrats lifts his hat as he walks past a church," writes Adolf Loos in *Ornament and Crime*,[1] hinting at the fact that

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1 Adolf Loos, "Ornament and Crime," in *Crime and Ornament: The Arts and Popular Culture in the Shadow of Adolf Loos*, ed. Bernie Miller

coexistence between the modern and "scientific" world model and the pre-modern and "religious" world image is, therefore, still possible. However, this is so precisely because it is not just a matter of different worldviews: the world model is rather what can *integrate* within itself the world image in the contingent nature of its renderings. "What disempowered the world images was the acute new experience of their plurality," Blumenberg writes.[2] The world model *abstracts* from this plurality and the inevitable territorial contrasts it comes with. Whereas the world image "does not tolerate other images next to it,"[3] the world model is what emerges upon their plurality and, to a certain extent, "feeds" on it—it "consumes" the world image as what Blumenberg calls "a remaining substance."[4] The aristocrat whom Loos speaks of embodies precisely this abstract and integrative position: different from

and Melony Ward (Toronto, ON: YYZ Books, 2002), 35.

2 "Was die Weltbilder entmachtete, war die akute neue Erfahrung ihrer Pluralität, eine Erfahrung, die sich unmittelbar in historische Reflexion und in Kritik umsetzte." Blumenberg, "Weltbilder und Weltmodelle," 72.

3 "Das 'Weltbild' verträgt keine anderen Weltbilder neben sich; schon der Plural 'Welten', 'Weltbilder' ist ein Sprachprodukt des Zeitalters der historischen Reflexion, ist ein Stück Philosophie der Philosophie." Blumenberg, 73.

4 "In Wirklichkeit war es so, daß das 'Weltmodell' die Stelle des 'Weltbildes' besetzte und noch immer dabei ist, die Restsubstanz des Weltbildbestandes aufzuzehren. Daß es so etwas wie Wissenschaftsgläubigkeit geben kann, beruht darauf, daß die Wissenschaft ihre Bedingtheit durch einen Weltbildglauben verloren hat." Blumenberg, 71.

the revolutionary, someone that, in Loos's prose, "would pull the old lady away from the roadside shrine" to tell her that there is no God, the aristocrat is the individual that stands "at the pinnacle of humanity and nevertheless has the deepest understanding for the motivations and privations of those who stand further below."[5] Abstraction and integration are here profoundly intertwined with a notion of *progress*: even if the modern spirit can understand, tolerate, and even respect and appreciate the non-modern one, there is no doubt, in Loos's words, that the former stands *above* the latter, as a "pinnacle" whose reach changes the vision of the world, and irreversibly so.

Such a detachment from the ground is not just a matter of hierarchy: being able to abstract from different world images also means uprooting from the specific "territories" they define. The loss of world images goes hand-in-hand with an *Entortung*, an eradication brought to the very "elimination of the place."[6] The tension between world image and

5 Loos, "Ornament and Crime," 35.
6 "[T]he elimination of the place is here trans formed into the *imago* of the whole Earth made place. The disappearance of the 'brick' that preserves and separates is not experienced as a simple desanctification but as a kind of extreme, paradoxical, and often ironically self-destructive *templificatio* of the whole cosmos. *Entortung* is seen, on the one hand, as a condition—peculiar to this epoch—for the affirmation of a renewed Metaphysics of Light, but on the other hand, the paradoxicality of the attempts to make this affirmation becomes transparent, since no metaphysics of light is conceivable in the defla-

world model can be reformulated with respect to such process of eradication as a tension between what Schmitt calls "Terran order" and "maritime existence":

> While in a Terran order every technical invention automatically falls into fixed orders of life and is grasped and classified by them, in a maritime existence every technical invention appears as progress in the sense of an absolute value in itself.[7]

Like the one described by the world image, the Terran order sets the ground for a fixed, absolute reference towards which actions, goals, and, in Schmitt's rendition, technical inventions can be oriented. More similarly to the world model, in maritime existence, it is instead progress—Blumenberg's "total representation of empirical reality that depends on the respective state of the natural sciences"[8]—to assume an *absolute* position. "The

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gration of forms." Massimo Cacciari, *Architecture and Nihilism: On the Philosophy of Modern Architecture* (New Haven, Connecticut: Yale University Press, 1993), 200–201.

7 "Während in einer terranen Ordnung jede technische Erfindung von selbst in feste Lebensordnungen hineinfällt und von diesen erfaßt und eingeordnet wird, erscheint in einer maritimen Existenz jede technische Erfindung als ein Fortschritt im Sinne eines in sich selbst absoluten Wertes." Carl Schmitt, "Die geschichtliche Struktur des Gegensatzes von Ost und West. Bemerkungen zu Ernst Jüngers Schrift: 'Der gordische Knoten,'" in *Staat, Großraum, Nomos: Arbeiten aus den Jahren 1916–1969*, ed. Günther Maschke (Berlin: Duncker & Humblot, 1995), 541–542. All the citations are here translated from the German.

8 Blumenberg, "Weltbilder und Weltmodelle," 69.

unconditional belief in progress is an indication that the step towards a maritime existence has been taken," Schmitt concludes.[9] Contrary to Blumenberg, for which technics was but a "source of problems" for science,[10] Schmitt reaffirms its centrality in the modern shift: within the maritime existence, technical invention is quintessential. Within the "optics" of the world model, scientific comprehension cannot avoid affecting—by sourcing it—the efficient reserve. As a world *model*, the interaction between science and reserve is not only one-way. The reserve does not just instruct the model: it is also *affected* by it. Hence the unavoidable question of technics as a matter of articulation, of ways in which this model is achieved—one that cannot be disentangled from what the model itself achieves.

Blumenberg's dismissal of technics is the symptom of a more significant issue that the loss of world images has to deal with: the paradox of still being able to see anything in the absence of images, of

9 "Der unbedingte Fortschrittsglaube ist ein Anzeichen dafür, daß der Schritt zur maritimen Existenz getan ist." Schmitt, "Die geschichtliche Struktur des Gegensatzes von Ost und West," 542.

10 "Nicht über Weltdinge und Weltkräfte zu verfügen und sich ihrer zu bemächtigen, ist der wesentliche und primäre Sinn von Wissenschaft (vielmehr derjenige der Technik, die sowohl angewandte Wissenschaft als auch Problemquelle der Wissenschaften ist), sondern unsere Weltvorstellung in der Verfügung und unter der Kontrolle theoretischer Verantwortung zu halten." Blumenberg, "Weltbilder und Weltmodelle," 73.

being able to dwell without any "earth" below.[11] "Only on the ocean," Schmitt writes, "does the ship become the absolute *Gegenbild* of the house:"[12] in the most extreme affirmation of that "maritime existence" that is the ocean, dwelling becomes an exclusively technical matter. On the ocean, the image cannot be conceived but in the paradox of a *Gegenbild*, of an "inverted" or of a "counter-image."[13] One of these counter-images can be recognized in Cacciari's reading of *utopia* as the synthesis of the conflict between "absolute freedom" and the

11 As Cacciari masterfully framed it: "*Entortung* is seen, on the one hand, as a condition—peculiar to this epoch—for the affirmation of a renewed Metaphysics of Light, but on the other hand, the paradoxicality of the attempts to make this affirmation becomes transparent, since no metaphysics of light is conceivable in the deflagration of forms." Cacciari, *Architecture and Nihilism*, 200–201. For a more recent reflection on the condition of groundlessness, see Hito Steyerl, "In Free Fall: A Thought Experiment on Vertical Perspective," *E-Flux Journal*, No. 24 (April 2011).

12 "Erst auf dem Ozean wird das Schiff zum absoluten Gegenbild des Hauses." Schmitt, "Die geschichtliche Struktur des Gegensatzes von Ost und West," 541.

13 It would be interesting to compare Schmitt's Gegenbild with other negational concepts such as Paul Celan's *Gegenwort*—"das Wort, das den 'Draht' zerreißt, das Wort, das sich nicht mehr vor den 'Eckstehern und Paradegäulen der Geschichte' bückt," and is therefore "ein Akt der Freiheit. Es ist ein Schritt"—and perhaps even rethinking Florensky's notion of a "time that flows backward" as a *Gegenzeit*. See Paul Celan, *Acceptance Speech for the Georg-Büchner-Preis 1960*; and: Pavel Florensky, *Iconostasis*, trans. Donald Sheehan and Olga Andrejev (Crestwood, NY: St. Vladimir's Seminary Press, 1996).

"will of state,"[14] a conciliation of the contrast between Schmitt's Terran order and maritime existence. "Separateness and totality dominate together in Utopia"[15]: the *Entortung*, the separation from the land that the image of the ship on the ocean achieved as an inversion to the one of the house, is here accustomed and accommodated in the wholeness of an image and of the framing that it provides. In Cacciari's rendition of utopia, Schmitt's maritime existence becomes *inhabitable*, as everything still responds to an overarching order and is sheltered by it. Its insular character ensures its wholeness while simultaneously showing how such a totality is produced out of a negative image of the sea.

Cacciari's understanding of utopia could then be considered as a sort of "terrestrialization" of the oceanic features outlined by Schmitt. Nevertheless, does this further inversion resolve itself in a complete restoration of all the characters of the Terran existence symbolized by the house or is something left behind? Framed by the ocean's waters, utopia produces a negative image of it; as a State, it can only be conceived as completely isolated from the rest, whatever that "rest" might be. But

14   Massimo Cacciari, "Project," in *The Unpolitical: On the Radical Critique of Political Reason*, ed. Alessandro Carrera, 1st ed (New York: Fordham University Press, 2009), 132.
15   Cacciari, 122.

here is the crux: to do so, it is forced to incorporate the character of such a rest, to accept the "price" of its mediation. As a mythic image of the *Entortung*, to be sacrificed in the transaction of utopia is the very notion of image as well as the one of place. Utopia is literally *nowhere*, yet this nowhere does not correspond to a transcendent elsewhere, such as a heavenly city or a promised land. As Cacciari remarks, the freedom of utopia entirely belongs to "a process of secularization-rationalization."[16]

Programmatology

Both *Entortung* and utopia are connected, in Cacciari's thought, with the notion of *project*, a term that sounds mostly innocuous and "normal" in ordinary language but whose implications, as the Venetian philosopher shows in an eponymous essay, run much deeper than it might seem. The project's emphasis, Cacciari writes, is similar to the one of technics (*la Tecnica*). The project's critique seems to uncover and directly address the problematic (and yet un-problematized) link between *Weltmodell* and technics: the project elaborates models, and it does so according to a productive paradigm:

> The question at stake in the project concerns the strategy on whose basis something must be pro-

16   Cacciari, 122.

duced or brought to presence. The project foresees, so to speak, this future presence; it unfolds its character in advance. However, in the project, precisely, one is not limited to "project" (*ideare*) this presence; one also has to show by which means and in what ways presence is actually producible. [...] Let us keep this point firmly in mind—whereby in the term *project* we mean essentially the techno-scientific project.[17]

Not only the (world) model, but science, too, is here inextricably conceived as bound to technics: as "techno-scientific," the project, as well as the model it conceives, cannot be considered just as a passive form of representation of a particular matter, but it must necessarily affect its object as much as it is affected by it. In other words, there is an "intra-materiality" that the project sets in place or disposes.[18] Nevertheless, such co-determination and intra-materiality are precisely what the project conceals: "The project," Cacciari writes, "appears constitutively logocentric. Everything in the 'meanwhile' between its original word and the realization of its goal (*telos*) carries out a techno-instrumental function, a secondary function, a simple explica-

17 Cacciari, 122.
18 The notion of "intra-material" is here borrowed from Michel Serres. See: Michel Serres, *L'Incandescent* (Paris: Le Pommier, 2003). See also: "A Logos Genuine to the World: 'Le logiciél intra-matériel,'" in Vera Bühlmann, in *Mathematics and Information in the Philosophy of Michel Serres* (London: Bloomsbury Academic, 2020), 66–72.

tion of the idea."[19] Representation is here reduced to a functional process, and the image to a mere explication. The space of images itself, the symbolic distance they preserve—what Cacciari defines as the *meanwhile*—is to be "liquidated"[20] and operationalized into a linear process: "The ideal, in fact, would be the abolition of 'meanwhile,' the perfect coincidence between the point of the prefiguring-anticipating idea and the line that realizes it."[21]

What the shift to the project foregrounds is an understanding of thinking itself as a *work* (almost in a physical sense, as the translation of an oriented force into a directed linear displacement) or, in Cacciari's words, of production: "*Producing* and *project* are joint terms representing, in our language, a single family. The project is understood as intrinsically productive: it elaborates models of production."[22] This "elaboration of models" brings the notion of the project closer to the side of Blumenberg's *Weltmodell*; however, the relation to a scientific and verifiable conception of empiric reality—thus the promise of a trustworthy, rational ground—starts somehow to be questioned, even

19 Cacciari, "Project," 128.

20 Cacciari, 129.

21 "Only the liquidation of every traditional organicism, of every symbolic holding between social and political, of every symbolism of the political itself, makes possible the project as calculus, rational will of power, constructive force." Cacciari, 132.

22 Cacciari, 122.

if just indirectly. The *poiesis* that the project spells out is less concerned with being a veritable rendering of the absence or of the invisible it materializes and more interested in the *modes* and in the *codes* through which this bringing-into-presence operates: "in the project" Cacciari writes "one is not limited to 'ideate' this presence; one also has to show with what means and in what ways presence is actually producible."[23] *Dictability*, or the ability to say—as well as the one of picturing—is not just a boundary to be presided over (as in Blumenberg) but acquires relevance and autonomy in itself. Hence, the presence of what Cacciari defines as a "grammatological perspective" transversal to the project's logocentrism. This perspective "sees in the contents of the project (in the projected) not the signifying of the original *logos*, mere image or figuration of its language, but *programs*, systems of conventional signs (*grammata*) endowed of intrinsic rationality, not external and instrumental films of the true word."[24] Under this light, the constructive (logocentric) power of the project appears to be hindered by its necessity to recur to a deconstructive (grammatological) functioning. "The project is transformed here, precisely, in a text of pro-*grams*,

23   Cacciari, 122. Translation edited to better match with the original.
24   Cacciari, 128.

an open system of conventional signs that explain their own reason only in their play of differences."[25]

The reduction of the project to program—or perhaps its *concealment* into the latter—stands in the very "circuitry" of the project, or in the fact that the elimination of any presupposition that the project promises is in itself a presupposition: as Cacciari frames it, "this entails that the very same thinking that founds the project be thought as presupposed."[26]

The Project's "Will"

This transformation is, nevertheless, not to be mistaken as a "failure" of the project or as the overcoming of deconstruction over the project's metaphysical system. As a form of imagination on *becoming*

25 Cacciari, 129.
26 Cacciari, 126. "Ma ciò comporta che presupposto sia ora pensato lo stesso *pensiero* che fonda il progetto." Cacciari, *Progetto*, 93. Cacciari stresses the concealing character of the project at the beginning of his essay, as he writes that "[i]t is also necessary to realize how the anticipating emphasis of the 'pro' tends to conceal a presupposition" rather than abolishing it. Cacciari, "Project," 122–123. Such concealment reveals the "onto-theological" nature of the project, a nature that the project itself secularises and moves, as discussed further ahead, from transcendence to extra-ordinariness. Along these lines, it would be interesting to develop a connection between the project's concealing power and religious sacrifice as an act of concealment, as discussed by René Girard. See René Girard, *Things Hidden since the Foundation of the World*, trans. Stephen Bann and Metteer Michael, Repr (Stanford, California: Stanford University Press, 2000), and *Violence and the Sacred* (Baltimore, Maryland: Johns Hopkins University Press, 1977).

this dissolution of project into programs is the *will* of the project, the "fate" of the term itself, as Cacciari calls it. In order to be foreseen and controlled (to be *projected*), becoming must be encrypted into cases by which chance can be objectified.

In order to dominate becoming effectively, it is necessary to recognize the arbitrary character of every regularity; it is necessary to construct in probabilistic terms the anticipatory models. We will discover that the most potent anticipatory forms are, precisely, those that have more clearly abandoned every deterministic illusion. The project appears, thus, finally, as anticipation of chance: the anticipated chance no longer surprises nor irrupts; it is a priori "accounted for" [*scontato*] within the grid of the project [*nelle maglie del progetto*], which, in its turn, frees itself from any eschatological characteristic to be transformed in techno-experimental apparatus devoted to the effective pursuit of contingent objectives.[27]

The project appears, therefore, as a form of transcription that turns the indeterminacy of becoming—chance—into a form of sacred text. Nevertheless, such text is denied any representational character: it is, as Blumenberg's reserve, merely efficient. In this context, becoming is not anymore just "linearly" conceived; it frees itself

27 Cacciari, "Project," 127.

from an eschatological perspective: "To define the project of chance entails necessarily a conception of becoming as delinearized pluridimensionality and its languages as systems of sign relative to one another."[28] By freeing the project from an eschatological perspective, such a delinearized pluridimensionality puts into question the very status of *necessity*: if, on the one hand, the project must *necessarily* operate in the form of programs, on the other such a necessity is the one set by the project itself, it is deliberated by its own logos. The programmatic determination of the project, its will and its necessity to turn itself into program is precisely what empowers it. "The project will be the more powerful the more programmatically analyzable and analyzed it is. If the project must have value, it can only have value according to this form."[29] The project *wants* its own deconstruction; in order to really be a *pro-ject*, it needs to break away from any symbolic understanding of the image and be critical of it. On this point, the resonance with Blumenberg is quite evident, as well as the overturning of his proposition. Cacciari's project fully absorbs the task that Blumenberg hoped to destine to philosophy to preserve its role in the ecology

28   Cacciari, 129.
29   Cacciari, 129.

of scientific specialisms.[30] As a form of foreseeing and control over becoming, the project secures the reserve of scientific verifiability—but it does so precisely by "stabilizing" it into cases, thus binding it to a more abstract notion of image.

The project refuses any traditional form of authority, one in which "source and sense of power seem, instead, to be truly ontotheologically founded."[31] It refuses the eschatology of a Solution in favor of contingent programs and resolutions: "The virtue (*virtus*) of duration against the chance (*tyche*) of the event, a collision renewed incessantly that ends up by admitting only programs, without ever finding the solution [la *Soluzione*]."[32] Traditional authority, Cacciari writes, holds a "diabolical" vision of the project: the project is what bifurcates and thus deviates such power from its vocation, namely "maintaining the unity and the general ordering of the eon, until its fulfilment, against any *seduction*."[33] Blumenberg's *Unverführbarkeit* is here revealed not just as a task specific to the ethos of modernity and

30 Cacciari speaks, in fact, of a "techno-scientific project," indissolubly weaving together technics and science that Blumenberg assumed as separate. Heidegger has discussed a similar 'absorption' to the one operated by the project in relation to cybernetics—yet the latter seems to describe the issue from a position in which the "fate" of the project is seen as already fulfilled and in which the project has completely been lost into its "programmatological destiny." See Martin Heidegger, "On the Question Concerning the Determination of the Matter for Thinking," *Epoché* 14, No. 2 (Spring 2010): 213–23.
31 Cacciari, "Project," 130.
32 Cacciari, 130.
33 Cacciari, 131.

the task of its *Bildung*: Cacciari's gaze into the project uncovers the ultimately "imaginal" nature of the world model, in the latent theologico-political character of science's "theoretical responsibility."[34] The very notion of *project* fully embodies and enacts seduction: "To seduce [*se-ducere*]," Cacciari writes, "is to throw power beyond its foundation, attempting mere ethico-worldly justifications."[35]

34 Blumenberg, "Weltbilder und Weltmodelle," 75.

35 Cacciari, "Project," 131. The political footprint of the project shifts authority from transcendence to extra-ordinariness: "Even the obedience owed to this *extraordinary* authority (since such is a completely secularized authority), however absolute, is always *reasonable*. It is founded on a *contract* with the sovereign thanks to whom the separate egoistic interests coexist finally in *peace*. And maybe in this reduction of the idea of peace to the dimension of security and satisfaction of egoistic interests, of the exchange between them, of their almost *physically* calculable equilibrium, lies the most revolutionary trait of the modern political." Cacciari, 131–132 (emphasis added according to the original version). The reduction of the political domain to one of a physically calculable equilibrium—to a "project of state"—implies the reduction of *nomos* to *physis*. On the importance of the antithesis between the two, see Felix Heinimann, *Nomos und Physis: Herkunft und Bedeutung einer Antithese im griechischen Denken des 5. Jahrhunderts*, second, unaltered reprographic reprint of Friedrich Reinhardt Verlag Basel (Darmstadt: Wissenschaftliche Buchgesellschaft, 1972).

III
Troping Line

The Impossible Synthesis

This notion of image is historically determined; it corresponds to the "techno-scientific project," as Cacciari calls it. However, it would be naïve to think of such a historical determination as only a face or a moment of an immutable diachronic structure. The project shows an irreducible *mutual influence* between what is determined and what is determining, as well as their mutual fundamental *estrangement*. The impasse of the project, its aporia, surfaces here under another light. Transcendental forms are not an a priori but something that the project itself actively casts. Its secularizing power is one of a *mathematics of history* that simultaneously

belongs to a *history of mathematics*.[1] The project is caught in what Pier Vittorio Aureli defined as the "paradox of a unilateral synthesis,"[2] entangled in "dictability" and in an expressivity continuously determining *as much* as it is determined. Nevertheless, this "as much" is not univocally quantifiable: it is not a quantity but a *quantum*.[3] According to this paradox, quantity is always accounted as a contingency, and any necessity cannot be expressed at all

[1] A similar aporia is developed, according to Vera Bühlmann, by Michel Serres regarding history and science: "we have to think about a *science of history* that is at the same a *history of science*." The only relation between the two is of *equipollence*. See Vera Bühlmann, "Chronopedia I: Counting Time," in *Mathematics and Information in the Philosophy of Michel Serres* (London: Bloomsbury Academic, 2020), 55–71.

[2] Pier Vittorio Aureli, *The Possibility of an Absolute Architecture*, Writing Architecture Series (Cambridge, Massachusetts: The MIT Press, 2011).

[3] "At the extreme moment of the 'fall' into *pure* language, the history that has led to this point also emerges—and this history the artwork *must* represent. And *it can only have to*: because its instruments of representation are now inextricably rooted in the space of signs, of writing. The *quantum* of destiny that appears in *this* work determines its position. The positions are infinite." ("Nel momento estremo della 'caduta' nel *puro* linguaggio, emerge anche la storia che ha portato a questo punto—e questa storia l'opera *deve* rappresentare. *E può dovere soltanto*: poiché i suoi strumenti di rappresentnzione hanno ormai radici inestirpabili nello spazio dei segni, della scrittura. Il *quanto* di destino che in *questa* opera appare, ne determina la posizione. Le posizioni sono infinite.") Massimo Cacciari, "Di alcuni motivi in Walter Benjamin (Da 'Ursprung des deutschen Trauerspiels' a 'Der Autor als Produzent')," *Nuova Corrente*, No. 67 (1975): 209–43. 236 (all the citations are here translated from the Italian). Under this light we could perhaps see quantum physics as a "physics of (self) determination," as a point of conjunction between information theory and "natural will."

but only indexed *via negativa* as a non-contingency. This paradox excludes the possibility of any general theory of language and a "fundamental legality" of scientific discourse, as legality can only be *positionally* constituted and, therefore, only be contingent on the specific discourse it supports.[4]

The exclusion of any possibility of the image as representation, even just as a system of representations, cannot be more radical. Cacciari's "project" converges here with his work on Walter Benjamin's "motives" and his conception of the Name as an essence *absolutely other* to language. "The pure symbolic character of the Name represents a statute of separation," Cacciari writes.[5] Is then the name another placeholder for what utopia stood for? If so, the name would still "share a border" with the ocean of technics; it would still be comprehended under the project of secularization. However, the Name is utterly *alien* to this; there is instead something rather "divine" about it. "The symbol" Cacciari writes, is not "a relation between appearance

4 This is, according to Cacciari, the point of arrival of Husserl's work: the *"verification* of the *absence* of the transcendental foundation" ("*verifica* della *assenza* della fondazione trascendentale"). And again: "The *Krisis* is implicit as of now: the systematic unity that the philosophical discourse expresses cannot be mediated with the structures of the scientific *operari*." ("La *Krisis* è implicita fin d'ora: l'unità sistematica che il discorso filosofico esprime non è mediabile con le strutture dell'operari scientifico.") Cacciari, 216.

5 "Il carattere simbolico puro del Nome rappresenta uno statuto di *separazione*," Cacciari, 223–224.

and essence"—but the very essence of the Name, as the coincidence of idea and thing, as the unity "of the sensible object and the supersensible one." The symbol is a "theological paradox."[6] There is thus a total coincidence—if not almost a transubstantiation—of idea and name: it is in this sense that the Name becomes a symbol, a "throwing together" whose identity is not to be looked for outside of it (as in the allegory) but is perfectly *sealed* within, in a tautological manner. In the Name, the idea is not simply given or represented: it *gives* itself; it *represents* itself ("*si da*," "*si rappresenta*"), and it does so in an unintentional way. "The name is, at the same time, maximum closeness to the phenomenal and maximum abstraction: the being of the name is analogous to the pure and simple being of things, yet it is subtracted from any phenomenality. This depends on its immediate *giving itself*."[7]

6 Cacciari, 224. The inner quotations are from Walter Benjamin, *Ursprung des deutschen Trauerspiels* (Frankfurt am Main, 1963), 167. "Die Einheit von sinnlichem und übersinnlichem Gegenstand, die Paradoxie des theologischen Symbols wird zu einer Beziehung von Erscheinung und Wesen verzerrt."

7 "Il nome è, insieme, massima vicinanza al fenomenico e massima astrazione: l'essere del nome è analogo a quello puro e semplice delle cose, eppure è sottratto ad ogni fenomenicità. Ciò dipende dal suo *darsi* immediato." Cacciari, "Di alcuni motivi in Walter Benjamin," 219.

Name and Language: Crisis

What is, then, the relationship between Name and language? The absorption in the opacity of the Name of any possibility of nominalism *liberates* the space of language and technics from logocentrism and any quest for a systematic legitimization. "Having defined the tragic space of the Name as the *absolute* coincidence of idea and thing, extraneous to it, radically *other* than the statute that founds this coincidence, is precisely the space of the *sign*."[8] There is almost an "anti-vicarious invariance" within the Name that seems to stand as the very condition of possibility for language as a vicarious or "allegoric" space: the Name is what cannot be replaced or substituted and is thus "condemned" to its "destiny." The Name resists any *translation*; its domain is instead one of *transcription*—and yet, it is precisely through the support of transcription that translation—between different languages and signs—can take place. The "tragedy" of the Name is given not only by its absolute sealing in the symmetry of a tautology,[9] but also in the possibility for a *catharsis*: it is only by constantly re-acknowledging its opacity

8   Cacciari, 224.
9   "At the root, the symbol is tautology, not synthesis. Here the foundations of the *tragic* interpretation of the symbolic are given." ("Alla radice, il simbolo è tautologia, non sintesi. Qui si danno i fondamenti dell'interpretazione *tragica* del simbolico.") Cacciari, 222.

that the Name, as a symbol, liberates and "purifies" the allegorical space of the sign. It is endowed with a photosynthetic ability, so to speak: illuminated by the light of the idea, it clears the air for the sign to reproduce. The acknowledgment of the absolute difference of the Name, of its tragedy, unchains the reserve from a secularized dominion over becoming; it casts it back into a symbolic domain. "The space of the allegorical is understood only *as alternative and by negation* with respect to the destiny of the symbol. The sign is what appears after this whole affair has been held in the inexpressible. But this *consumption* is therefore *determinant* for the appearance of the sign."[10] As already discussed in the context of the project, this space is a *technical* space—in the sense of a space of techniques. It is the domain of languages, of different dictabilities, of modes of expression. The space of language, in Cacciari's reading of Benjamin, appears "as alternative and by negation" to the Name; as such, it is a space of the allegory: the identities that it expresses are always vicarious, they can never claim the divine fullness that the Name absorbs in its opaqueness, and they can, therefore, only *alla-agoreuein*,

10   "Lo spazio dell'allegorico si comprende soltanto *in alternativa e per negazione* rispetto al destino del simbolo. Il segno è ciò che appare dopo che tutta questa vicenda è stata trattenuta nell'inesprimibile. Ma questo *consumo* è perciò *determinante* per l'apparire del segno." Cacciari, 237.

they can only speak of something else. Nevertheless, their very ability to speak springs precisely from the fact that they are *not* tautological, as this is instead the nature "reserved" to the Name: their statute is the "allegorical" one of difference, of *crisis.*

Techniques and languages speak and produce in virtue of their "ontological difference," thus, they are determined by their own crisis, by the unsurmountable difference between what can be spoken—here and now, as "what could be a case"—and what is "to be left unspoken."[11] Schmitt's image of the ocean surfaces again: the space of unbridgeable distances is the domain in which technical invention is affirmed as an absolute value, in which the ship becomes the absolute *Gegenbild* of the house. "Only on the ocean" means *only upon crisis*: only upon the loss of a possibility of instituting an order or a balance, and thus in the very limit imposed by this *non plus ultra* does the technical domain of the ship arise. In the light of crisis, the ocean represents the exhaustion of every possible analogy; its horizon is the one of entropy. The boundary of crisis is both *entropic* and *mathematical*: no communication

11   In the same years, Cacciari works on Benjamin as well as on what he calls "the genesis of negative thought," namely the elaboration and the refutation of Hegel by Schopenhauer, Nietzsche, Kierkegaard, and Wittgenstein. It is not surprising that Cacciari's interest in Benjamin's work on Name and signs seems to fit well with the first and the last theses of Wittgenstein's *Tractatus.* See: Massimo Cacciari, "Sulla genesi del pensiero negativo," *Contropiano*, No. 1 (April 1969): 131–200.

can be established beyond that, yet the *mathesis* of its techniques works precisely through a *troping* in the sense of an intransitive "consummation" as a "withholding" into the unspeakable.[12] It follows that crisis is not just an "event" in the history of techniques, but the very principle under which they must be understood: "crisis," Cacciari writes, "is not a moment that the development of techniques goes through, but their immanent structure."[13]

Position and Resolution

Cacciari's stress on the notion of crisis has to do with the fact that what matters is not an ontological classification between what can and what cannot

[12] A similar "boundary" has been described by Quatremère de Quincy as the "mathematical line": Quatremère de Quincy, *An Essay on the Nature, the End, and the Means of Imitation in the Fine Arts*, trans. J.C. Kent (London: Smith, Elder and Company, 1837), 285. The etymology of trope and of the verb *trepō* (to turn) seems closely related to the one of *trephō* (to thicken, to feed). This "metabolic" understanding of the trope would be supported by its connection with sacrificial rituals as a sort of divine consummation and further on in the understanding of gods and myth as the "assimilation" of enemies or sacrificial victims. A hint in this direction can be found in George Hersey, "Troping Ornament," in *The Lost Meaning of Classical Architecture: Speculations on Ornament from Vitruvius to Venturi* (Cambridge, Massachusetts: The MIT Press, 1988), 1–10.

[13] "This structure is *critical* towards the representation of its "idea;" it is critical in relation to any setup *given* (*dato*) by the system." ("Questa struttura è *critica* nei confronti della rappresentazione e della sua 'idea'; è critica nei confronti di qualsiasi assetto *dato* dal sistema.") Cacciari, "Di Alcuni Motivi in Walter Benjamin. (Da *Ursprung Des Deutschen Trauerspiels* a "Der Autor Als Produzent"), 239.

be expressed (the unspeakable does not "geometrically" determine what can be spoken of), but rather the very *conflict* (the crisis) between the two: "a conflict to reach the maximum of the *expressible*, to subtract the maximum of the overall idea of the oeuvre from the limits of representation, of language, of its game — to reduce the margin of consumption implicit in each statement, in each voice."[14] What this conflict foregrounds is, then, a sort of negotiation or "pact" that is also a "convention," as it directly deals with the limits (the codes) of its expression. Techniques are, therefore, "utopian" in the sense outlined before: their limit is not the one between territories but is the insular boundary of separation itself — as a conflict that provides the ground for the institution of conventions, of peace treaties within the ocean of the Name-less.

This conventional character implies that the techniques and the languages that crisis produces are not necessary solutions to the conflict or syntheses, but only *resolutions*, contingent manners of bridging such a difference. "Technics — Cacciari writes — does not mean ideal constitution (*Verfassung*) of signs — but the immanent modalities of those transformations. Technics is the expression

14   "[U]n conflitto per giungere al massimo dell'esprimibile, per sottrarre il massimo dell'idea complessiva dell'opera ai limiti della rappresentazione, del linguaggio, del suo gioco, per ridurre il margine di consumo implicito in ogni affermazione, in ogni voce." Cacciari, 236.

of differences, of the *crises* that determine them."[15] The critical definition of techniques implies that their emergence cannot be impartial, their transformations cannot represent a single and progressive "universality," but a *partial* position: as Cacciari remarks, such an emergence springs instead "from the affirmation of *one* line, of *one* point of view."[16] This point was already made via Blumenberg's re-

15 "Tecnica non significa Verfassung ideale di segni—ma le modalità immanenti di quelle trasformazioni. Tecnica è l'espressione delle differenze, delle crisi che le determinano." Cacciari, 238.

16 "If techniques define *themselves* (*si* definiscono) critically and, as we have seen, determine crises, it means that they are *subjectively* acted upon by *contradictory* social relations—it means that their emergence is the affirmation of *one* line, of *one* point of view, from the conflict expressed in these relations. If the transformations of techniques do not represent 'universalities' that limit themselves to quantitatively shifting the boundaries of the system, to reproducing the system, without affecting or attacking its structure—they depend on, and condition in turn, a working that *interests* that structure. Therefore there cannot be a universal point of view, a paradigm of truth, in the understanding of techniques—the partiality of subjective optics breaks into their system, as it had already done in the definition of the new physical universe and its methodologies." ("Se le tecniche si definiscono criticamente e, come abbiamo visto, determinano crisi, significa che esse sono *soggettivamente* agite da rapporti sociali *contraddittori*—significa che il loro emergere è l'affermarsi di *una* linea, di *un* punto di vista, dal co nflitto che si esprime in questi rapporti. Se le trasformazioni delle tecniche non rappresentano 'universalità' che si limitano a spostare quantitativamente i confini del sistema, a riprodurre il sistema, senza intaccarne o attaccarne la struttura—esse dipendono da, e condizionano a loro volta, un operari che *interessa* tale struttura. Non può perciò darsi punto di vista universale, paradigma di verità, nella comprensione delle tecniche—la parzialità dell'ottica soggettiva irrompe nel loro sistema, come già aveva fatto nella definizione del nuovo universo fisico e delle sue metodologie.") Cacciari, 240.

fusal of world images in favor of a world model, in which the only "picturing" possible would be one of contingent renderings. Nevertheless, what is new here is the stress on what could be defined as the *positional value* of the picture (the work). The value of the work—the resolution power that its technique or language has—determines and, at the same time, is determined by its *position* in the conflict—in crisis as the "immanent structure" of its techniques. As Benjamin himself wrote in *The Author as Producer*: "Rather than asking, 'What is the attitude of a work *to* the relations of production of its time?' I would like to ask, 'What is its position *in* them?'"[17]

Through Cacciari's optics, Benjamin's notion of the oeuvre (thus of intellectual work) can almost be seen in analogy with a quantum-physical understanding of observation. The position of the technique determines its resolution power (its "quickness")[18] and vice-versa. Furthermore, the attempt by the oeuvre-work "to subtract the maximum of the overall idea of the work from the limits of its technique, to reduce the margin of consumption

17   Walter Benjamin, "The Author as Producer. Address at the Institute for the Study of Fascism, Paris, April 27, 1934," in *Selected Writings. Vol. 2, Part 2. 1931 - 1934* (Cambridge, Massachusetts, and London: The Belknapp Press of Harvard University Press, 1999), 768–82.
18   "Quickness" is here preferred to more established terms such as "speed" or "velocity," since it refers to the latter as a "resolution power," and not as a movement of positively measured distances.

implicit in each statement" can be compared to the quest for an observation that subtracts the maximum of the overall energy of the work from the limits of the system, to reduce the entropy implicit in each transformation and, conversely, the cost of the observation itself (its informational-energetic expenditure).[19] As intellectual work, philosophy is no longer the *other* to science—Blumenberg's guardian of scientific verifiability—nor can it claim an outside "utopian" or "sacred" position to it. It is brought back *within* science itself, within its very technical nature.

Most importantly, though, the cross movement of liberation of language from the Name (the disappearance of the *aura* from the oeuvre) and the redefinition of technics according not to necessary solutions but to contingent resolutions allows for a freeing of intellectual work from the "imperative" character of the program and for the opening up, within and through technics—and thus within a historically determined domain of *technischen Reproduzierbarkeit*— of the "deliberative" dimension already implicit in the project (as a "liberation-from").[20] The question of the image is, under

19 Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres.*
20 "If we analyze, for example, the German term *Entwurf*, then the root of the project reemerges with force. In the *ent-*, the anticipation, the before (*avanti*) do not resound; what resounds, rather, is the way-

this light, one of a "technical reproducibility" sub-tracted from the secular religion of linear progress. Understood in this way, the image comes close to an act of gardening, as the placement of a boundary (the one of the Name) that "keeps" as much as it liberates—a room for *otium*, laziness, upon neg-*otium*, business.

from, the separation-from, the departing—not so much the con-structive-productive in its advance, as much as the destructive or the overcoming. In *Entwurf* one perceives the 'pull' (*strappo*) of the 'throw' (*lancio*), not its eventual prefiguring, predictive force." Cacciari, "Pro-ject," 123.

IV
Historic Space

From Deliberative to Operative Criticism

The understanding of image attained thus far extends beyond artistic production, scientific inquiry, or philosophical investigation—at least in their traditional sense. Conceiving such an image as an artwork, object, or theory to be looked at and inspected from the outside is simply out of the question. The reciprocal link of co-determination established in the previous pages does not allow for such an outside position: any *outside* is always determined by and determining an *inside*. Any position is always caught within this relationship, within this "crisis" in the abovementioned sense. It is a matter of techniques and their contingent disposition (of

how they articulate a quantic resolution between position and quickness), of techniques as *decided* and *decisive* simultaneously: a matter thus of architecture, of a sovereign and yet dependent on their relation to techniques. The contingency of dispositions provided by an architectonic understanding is not absolute; it is caught instead in a necessary play of co-determination. In this sense, architecture is to be understood as historically determined.

Precisely at this confluence between architecture and history, Cacciari's work on crisis finds a remarkable "application." The author of this implementation is not Cacciari himself but architecture historian Manfredo Tafuri, for whom the deliberative and "projectual" possibilities of languages and techniques were one of the main concerns, even before his encounter with Cacciari. His "operative criticism" notion can be seen as an inverted image of technics liberated from the aura. "Operative criticism," writes Tafuri in *Theories and History of Architecture*, "is an analysis of architecture (or of the arts in general) that, instead of an abstract survey, has as its objective the planning of a precise poetical tendency, anticipated in its structures and derived from historical analyses programmatically distorted and finalized."[1] This sort of analysis,

1   Manfredo Tafuri, "Operative Criticism," in *Theories and History of Architecture* (New York: Harper & Row, Publishers [et al.], 1980), 141.

conducted chiefly by Tafuri's fellow historians, is a distorted and instrumental use of that liberation. It submits the deliberative understanding of language and technics (and the discourses they project) to ideological patronage. The problem of such a distortion resides in the fact that operative criticism presents itself as a "prescriptive code"[2] that assumes a *normative* function and does so by exploiting history as a source of legitimation. "We could say, in fact, that operative criticism *plans* past history by projecting it towards the future."[3] The figure of the project resurfaces here, next to the one of the plan: a programmatic blueprint that "writes in advance" (pre-scribes) the cases of becoming, that *anticipates the past-to-be*, and does so according exclusively to its sign (to its program). There is a whole performative or "athletic" character that makes this attitude perfectly compatible with Blumenberg's world model, and thus with Cacciari's techno-scientific project: "its verifiability," Tafuri writes, "does not require abstractions of principle,

2 "In other words, we see already a typical feature of operative criticism: its almost constant presentation of itself as a prescriptive code. This code may be dogmatically systematic or methodologically wide open, but the difficulty in placing this kind of operativity in history comes, doubtless, from its wavering between the deduction of its values from history itself and the attempt to force the future by introducing—on a critical level only—brand new values and *a priori* choices." Tafuri, 144.

3 Tafuri, 141.

it measures itself, each time, against the results obtained."[4] By affirming this measure as its value, the language of operative criticism implicitly lays claim over the Name since it is pretending to have meaning within itself. In other words, it refuses its nature as an allegory. In this folding of technics and language upon themselves, the code—the contingent convention through which a technique deals with the crisis given by its inherent limits of expression—becomes invisible: In the transparency of this optics, "operative" become synonymous with "normative."[5]

The transparency of code set by the normative character of criticism (by its "plan," as Tafuri calls it) excludes the possibility of articulating a question over the position *in* the relations of production and their contingency (as Benjamin advocated). On the contrary, this transparency promotes a view that is always pre-oriented according to the norm that its plan establishes—that is thus inevitably *normal* (perpendicular) *to* its invisible geometric plane. Seemingly contradicting positions, such as the conservative and the progressive ones, can, therefore, be understood as just two faces of this same normativity, as they both challenge each other under

4 Tafuri, 141.
5 Tafuri later replaces "operative" with "normative criticism." This invisibility of code is, once again, related to the *gigantic*, as outlined by Heidegger. Tafuri's aim is precisely to unmask such invisibility.

the same currency and within the same theoretical horizon.[6] The concealment of codes engenders an all-encompassing interiority in which the walls are so diaphanous that one can mistake it for an outside space. According to Tafuri's materialist critique, this is not just what operative criticism but the "Plan of the Capital" can achieve and what an honest criticism must unmask.[7]

Intellectual Work as a Project of Crisis

How can we pursue the unmasking of what is already invisible? How can we conceive of an outside to it or—since an outside would again be an ideological position—a "door" whose frame would allow for these walls to be seen; an intellectual device able to *invert* once again its totalizing image? Schmitt's

6   This horizon is, according to Tafuri, one of "the pragmatist and instrumentalist tradition." Tafuri, "Operative Criticism," 141. Mannheim's distinction between "conservative" and "progressive thought" is discussed just concerning what Tafuri defines as a "mystified version of the functioning and reality of utopia," as it promotes a progressive attitude as the one able to break the order, whereas this breaking (this *crisis*) is instead perfectly structural to the system. See Manfredo Tafuri, "Ideology and Utopia," in *Architecture and Utopia: Design and Capitalist Development* (Cambridge, Massachusetts: The MIT Press, 1976), 52. An interesting parallel to this "squaring" can be found in Schmitt's notion of *complexio oppositorum*. Carl Schmitt and G. L. Ulmen, *Roman Catholicism and Political Form* (Westport, Connecticut: Greenwood Press, 1996).

7   An architectural rendition of such an all-encompassing interiority could be found in Archizoom Associati's *No Stop City* (see further in this chapter).

architectural metaphor of the house becomes in Tafuri a literal one: architecture, along with the discourses such as criticism and history—the product of languages and techniques—is a form of "intellectual work."[8] Conversely, as shown through the paradigm of operative criticism, discourses are always as analytical as they are projectual.

As intellectual oeuvres, architecture and criticism always try to overcome the limits of their techniques and languages by subtracting the construction of an idea (the work itself, the oeuvre) from the limits of expression immanent in those languages and techniques. Intellectual work is then a project that implies a planning, a "horizontal" elaboration that weaves together the "vertical" modes of production[9] (and hence of consumption,

8   It is significant that Tafuri's original subtitle of Tafuri's book *Progetto e Utopia*, "Architecture and Capitalist Development," takes as a model his previous essay entitled *Intellectual work and capitalist development*, hence suggesting an understanding of architecture as "intellectual work." See Manfredo Tafuri, *Architecture and Utopia: Design and Capitalist Development* (Cambridge, Massachusetts: The MIT Press, 1976). Manfredo Tafuri, "Lavoro Intellettuale e Sviluppo Capitalistico," *Contropiano*, No. 2 (1970): 241–81.

9   "[M]odes of production, isolated in themselves, neither explain nor determine. They themselves are anticipated, delayed, or traversed by ideological currents. Once a system of power is isolated, its genealogy cannot be offered as a universe complete in itself." Manfredo Tafuri, "Introduction: The Historical 'Project'," in *The Sphere and the Labyrinth: Avant-Gardes and Architecture from Piranesi to the 1970s* (Cambridge, Massachusetts: The MIT Press, 1987), 10. For a more comprehensive outlook on the question of sheaves, see Ludger Hovestadt and Vera Bühlmann, eds., *SHEAVES: When Things Are Whatever Can Be the Case* (Vienna: Ambra, 2013).

of "fashions," both in the sense of *mode* as well as of sheaves, *fasci*) immanent to the techniques and the languages employed within these works. Tafuri lines up architecture, institutions, languages, techniques, and historical space as different "bodies" in which this elaboration occurs. The task of criticism is to avoid adding itself up to this work and to counter the normative character of these constructions by cutting these weavings open and revealing the plan implicit within these projects. In order to accomplish this, the critic's and the historian's task is to examine the omissions, the points of resistance—the *crises*—that arise from the techniques employed in these projects. Tafuri speaks of history as a "historical space:" It is not a matter of a linear continuity broken by punctual events, but somewhat of a multiplicity of force-fields, traversed and intersecting in an endless amount of fault lines that overlap one another. "Historical space," writes Tafuri in *The Sphere and the Labyrinth*, "does not establish improbable links between diverse languages, between techniques that are distant from each other. Rather it explores what such distance expresses: it probes what appears to be a *void*, trying to make the absence that seems to dwell in that void speak."[10] Historical space refuses any dialectical

10   Tafuri, *The Sphere and the Labyrinth,* 13.

synthesis: "In history", Tafuri writes, "'solutions' do not exist."[11]

The task assigned by Tafuri to criticism carries a distinct *deconstructive* charge. His concept of historical space closely resembles an archaeological realm of lineages to be deconstructed through different grammatologies. However, what becomes apparent in the dual reflection of architecture and history is that the deconstructive undertaking for which history and criticism are responsible—their moment of crisis—must, in turn, recognize its constructive nature. According to Tafuri, the analyses of Blanchot, Barthes, and Derrida "can break up works and texts, construct fascinating genealogies, hypnotically illuminate historical knots glossed over by facile readings." Nevertheless, he maintains, "they must necessarily negate the existence of the *historical space*."[12] They must negate their contingency, the inevitable fact that these analyses are also "spoken" through a series of crises: "Textual criticism, semantic criticism, iconological reading, the sociology of art, the genealogy of Foucault, our own criticism: are they not techniques that decipher only by hiding the traces of 'murders' committed more or less consciously?"[13] Any critical

11   Manfredo Tafuri, *Theories and History of Architecture* (New York: Harper & Row, Publishers [et al.], 1980), 237.
12   Tafuri, *The Sphere and the Labyrinth*, 9.
13   Tafuri, 9.

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language can quickly become the instrument of a "sacred rite," according to Tafuri: ultimately, they still unconsciously claim to speak *in the Name*, to have an outside, untouched, and thus "sacred" view on their subjects.

Therefore, the (re-) acknowledgment of historical space is paramount: as a critical practice, history must "de-sacralize" any position that claims to speak from an outside position and understand itself as continuously *determining as much as determined*. In this sense, history must be understood, according to Tafuri, as a *project of crisis*.[14] It must *produce* crisis: separate (*krinein*) the historically determined fashions and conventions (thus show their "plan") by clashing their different techniques and

14 "History is viewed as a 'production,' in all senses of the term: the production of meanings, beginning with the 'signifying traces' of events; an analytical construction that is never definite and always provisional; an instrument of deconstruction of ascertainable realities. As such, history is both determined and determining: it is determined by its own traditions, by the objects that it analyzes, by the methods that it adopts; it determines its own transformations and those of the reality that it deconstructs. The language of history therefore implies and assumes the languages and the techniques that act and produce the real: it 'contaminates' those languages and those techniques and, in turn, is 'contaminated' by them. With the fading away of the dream of knowledge as a means to power, the constant struggle between the analysis and its objects—their irreducible tension—remains. Precisely this tension is 'productive': the historical 'project' is always the 'project of a crisis.'" Tafuri, 2–3. For an in-depth investigation of this notion within Tafuri's overall oeuvre, see Marco Biraghi, *Project of Crisis: Manfredo Tafuri and Contemporary Architecture*, ed. Alta L. Price (Cambridge, Massachusetts: The MIT Press, 2013).

languages against each other and bringing them to the brink of their limits of expression—it must try to make the "absence" that dwells in what seems to be a "void" between them speak. At the same time, it must understand that this production of crisis is itself historically determined and "positioned." It must understand that it is a *project*, and it must therefore put itself into crisis as well: "'True history,'" Tafuri writes, "is not that which cloaks itself in indisputable "philological proofs," but that which recognizes its arbitrariness, which recognizes itself as an "unsafe building.""[15]

Analogously to the one of Cacciari, Tafuri's "project" becomes here a movement (both a dynamism and a mechanics) of liberation (in the sense of a liberation-from, of a subtraction that still "feels the pull of the throw") of history from a linear and logocentric understanding of time, an "optics" (both a seeing and a screening) able to *project* its space out of uncertainty, to *de-cide* (to "choose" by cutting away from) the connection between position and resolution—and thus putting them in communication with each other. The "historical project" of *The Sphere and the Labyrinth* has to be understood in these terms: as a communication between the sphere's *absolute position* and the labyrinth's *total resolution*. "Here lies the 'fertile uncertainty' of the

15   Tafuri, *The Sphere and the Labyrinth*, 12.

analysis itself, its interminableness, its need to return constantly to the material examined, and, at the same time, to itself."[16] Upon uncertainty, every decision—every project—is contingent: precisely in this apparent weakness lies its "fertility." The historical space that Tafuri's project of crisis casts off is one of the infinite constructions—of analyses that "incorporate uncertainty"—a domain of pure potency, endlessly resourceful and laborious.[17]

From De-Sacralisation to Domestication

The same waters crossed by Tafuri as a historian are traversed, almost in an opposite sense, by Rem Koolhaas as an architect. Presented at the London's Architectural Association along with Madelon Vriesendorp and Zoe and Elia Zenghelis, Koolhaas's diploma thesis is entitled "Exodus, or the voluntary prisoners of architecture."[18] The utopian paradox of Cacciari's project—the one of a "state" only defined by separation, by its being liberated-from—appears

16   Tafuri, 11.
17   It is an *informational* space (but not one without form).
18   Rem Koolhaas and Bruce Mau, *S, M, L, XL: Office for Metropolitan Architecture*, ed. Jennifer Sigler (New York, NY: Monacelli Press, 1995), 2–21. The project was also published as an entry to Casabella's 1972 competition, "The City as Meaningful Environment." A more precise outlook on the "parallel lives" of Tafuri and Koolhaas, see Marco Biraghi, *Identification Parade—Manfredo Tafuri and Rem Koolhaas: Ein Vortrag an Der HafenCity Universität Hamburg, Juni 2010*, Auf der Suche nach einer Theorie der Architektur, 18 (Hamburg: Textem, 2011).

here in its inverted image: it is not a state but an *exodus*, a movement that "quits" a state; furthermore, such escape is not a liberation but a *captivity*. Nevertheless, what is preserved in this inversion is an arbitrariness, the role of decision upon uncertainty incorporated by Tafuri's historical space: the captivity of *Exodus* is *voluntary*. Koolhaas's "prisoners of architecture" *want* to be separated; they *want* to live in crisis. Their prison is a gigantic inhabited wall that cuts the city of London in two, what he calls a "mirror image" of the Berlin Wall, that in those years still stood as the architectural manifestation of the post-war division of Europe between the U.S. and the Soviet Union. The in-between space of the wall liberates its prisoners from this division— between a "Good Half" and a "Bad Half." *Exodus* immanently transcends such programmatic divisions from within. It lets its prisoners escape in a purely symbolic space: "The life inside—reads the text that accompanies the project—produces a continuous state of ornamental frenzy and decorative delirium, an overdose of symbols."[19] However, such symbolism is not the tragic one of the Name: no "sacred" meaning or truth is to be found in it, only mundane and self-fulfilling desire. Benjamin's *tragedy of the symbol* turns here into a *symbolic satire*: "The most contradictory programs fuse without

19   Koolhaas and Mau, *S, M, L, XL*, 7.

compromise. [...] Nothing ever happens here, yet the air is heavy with exhilaration."[20]

The image presented by Koolhaas is the one of a house on the ocean: the project of inhabitation within the mundane and profane realm of technical invention that nevertheless escapes the sovereignty of the latter and its programmatic directionality, its imperative character and that, precisely by affirming its mundanity (its condition of being *within, in the midst of* the world), also avoids to fall in the domain of the Name and of normativity, thus preserving history as a space of indeterminacy—as one of an architectonic (sovereign yet dependent) *will*.

The paradigm elaborated by Koolhaas in *Exodus* is further developed in his following projects, all dealing, in one way or another, with the mechanics and the optics of this inversion. Koolhaas uses the historic "fertility" indicated by Tafuri and exploits the crises immanent to it to build images to dwell upon. *Delirious New York*, arguably his most famous work, is a manifesto of such sourcing.[21] The novel "retroactively" constructs the history of Manhattan as a blueprint investigated via the Freudian psychoanalysis of the city and its "desires." The diagno-

20   Koolhaas and Mau, 19.
21   Rem Koolhaas, *Delirious New York: A Retroactive Manifesto for Manhattan* (New York: Monacelli Press, 1994).

sis of "Manhattanism" describes it as a "Capital of perpetual crisis," in which congestion is not solved but produced and exploited.[22] Crisis, congestion, desires, delirium... all these "irrational" forces are neither repressed nor mitigated but augmented, harnessed, and consumed. Manhattanism can produce a whole "capital" of secular symbolic values, of images as goods in the ambiguous sense of the word: as shareable properties that incorporate a contingent wealth.[23] "I wanted to construct—as a writer—a terrain where I could eventually work as an architect."[24] *Delirious New York* is an image of the subtraction—or rather an abduction, a form of "voluntary captivity"—of space out of uncertainty through its incorporation, in both senses of the term: a representation of it and, at the same time, a product of its mechanism.

Koolhaas's work sets the bases for a *return* of world images. Attached as one of many "fictional conclusions" to *Delirious New York*, *The City of the Captive Globe* (1972) portrays Earth as constricted in the fabric of a Manhattan-like urban grid, surrounded by a multitude of plinths on which dif-

22   Koolhaas, 11.

23   On this relation, see Emanuele Coccia, *Goods: Advertising, Urban Space, and the Moral Law of the Image*, trans. Marissa Gemma (New York: Fordham University Press, 2018).

24   Rem Koolhaas, "Why I Wrote Delirious New York and Other Textual Strategies," *ANY: Architecture New York*, 1993, 42–43.

ferent architectonic artifacts find their place. The accompanying text presents the city as "devoted to the artificial conception and accelerated birth of theories, interpretations, mental constructions, proposals and their infliction on the World."[25] In this realm, science and art perpetually invent, destroy, and restore the world of phenomenal reality. Koolhaas places their speculations on a grid of identical pedestals, turning them into theoretical and architectural "forms of madness." In a vision worthy of Don Quixote, folly melts with reason, science with mania, and reality with fiction. The suspension from the ground is both architectural and epistemological: it grants to these constructions the condition of an "ideological laboratory," uplifting "unwelcome laws" and "undeniable truths" in order "to create nonexistent physical conditions."[26] Koolhaas refers to these architectural-mental constructions as "institutes," resonating with Heidegger's essay "The Age of the World-Picture;" which in the latter, it is the "institutional character of research" that ensures the "procedural operativeness" (*Betrieb*) of science and its consequent rendering of a world picture.[27] Nevertheless, in Koolhaas's tale,

25 Rem Koolhaas, *Delirious New York: A Retroactive Manifesto for Manhattan* (New York: Monacelli Press, 1994). 294–295.

26 Koolhaas, 294.

27 Heidegger, "The Age of the World Picture," 124. To some extent, Heidegger's *Betrieb* seems to resonate with the "affirmative perfor-

it is not just a picture of the world to be produced, but it is the world itself being "bred" and therefore reproduced in an "ageless pregnancy." Instead of vanishing in the endless replication of the same model—as envisaged instead by projects such as Archizoom Associati's *No Stop City*—architecture here exploits the suspension provided by the endlessness of capitalist development and urbanism to operate a free, *delirious* construction of the world.[28]

mance" (*Aussageleistung*) with which Blumenberg characterizes world models.

28 See my contributions: "Sublime Uselessness: On the Speculative Virtues of the Architectural Project," in *Architecture, Futurability and the Untimely*, ed. Ingrid Mayrhofer-Hufnagl (Bielefeld: transcript, 2022), 161–72; and "Architecture as a Currency," *ARQ (Santiago)*, No. 102 (August 2019): 64–69.

V
Picturing Nothing

Plato and Non-Being

One of the most recurrent paradigms of Western thought—a thread that runs through both philosophy and science—is undoubtedly constituted by its underlying analogy of thinking with vision. *Idea, theory, speculation*: our language abounds with terms that connect the visible with the intelligible. Thinking means, first and foremost, seeing with the mind, a seeing that comes way before listening or touching, and much more than tasting or smelling. When compared to the other four senses, the one of sight has the advantage of covering distances that exceed bodily dimensions—differently from touch, taste, and, to a certain extent, smell, the eye

seems not to need to be corporally in touch with what it perceives but, quite on the contrary, to need *distance*—and yet it allows for a seemingly instantaneous and immediate perception. In describing the contemporary condition as a *Society of the Spectacle*, Guy Debord identifies "the attempt to understand activity by means of the categories of vision" as the *weakness* of what he calls "the Western philosophical project."[1] The privileged status of vision among all the other senses has been, in fact, historically countered by an equally constitutive doubt towards what could be considered its product, namely *the image.*

Plato is perhaps the forefather of such a gnoseological dilemma. The connection between vision and knowledge, as the aim of thinking, and the mistrust towards images seem to be one of the most evident ambiguities of his philosophy. The so-called allegory of the cave famously provides an account of images—i.e., *of what is seen*—as shadows cast by a fictitious puppet show; the task of the philosopher is to unchain man from such a spectacle

1 "The spectacle inherits the *weakness* of the Western philosophical project, which attempted to understand activity by means of the categories of vision, and it is based on the relentless development of the particular technical rationality that grew out of that form of thought. The spectacle does not realize philosophy, it philosophises reality, reducing every one's concrete life to a universe of *speculation*." Guy Debord, "The Culmination of Separation" in *The Society of the Spectacle*, §19 (London: Rebel Press, 1992), 11.

and turn her to a path leading to the contemplation of immutable, universal ideas.[2] Images are either misleading or merely particular instances of such ideas. And yet, *eidōlon*, the word that, in this context, Plato uses for image, is a diminutive of *eidos*, the word by which he indicates the idea as a universal form: participles of *idein*, "to see," both words confirm the analogy between vision and thought as well as the fundamental mistrust towards such sensible form. As Ernst Cassirer noted:

> Eidos and eidolon—two terms that originate from the same linguistic root, that both unfold from the one basic meaning of seeing, of *idein*—and that nevertheless, for Plato, in the specific sense that he gives them, include two fundamentally different directions, two opposing 'qualities' of seeing. In the one case, seeing has the passive character of sensual perception, which only strives to take in and depict an external sensual object—in the other, it becomes a free act, the grasping of an objective *Gestalt*, which itself cannot be accomplished in any other way than in a spiritual [*geistigen*] act of conception [*Gestaltung*]. [...] Such sensual [*sinnliche*] schematization of the pure concept of being is overcome once and for all only with Plato. A sharp cut now separates the world of *onta* and that of *ontōs on*, the mere existence of appearances from the content and truth of pure forms. The real and

2 Plato, *Politeia*, 514a–520a.

genuine origin, the "principle" of the world of the senses cannot be reached as long as we still seek this principle in itself or think it in any way afflicted with sensual determinations.[3]

But what is the problem with images exactly? Why cannot an *eidōlon* eventually become an *eidos*, as their lexical kinship suggests? In the *Sophist*, the production of images is introduced by Plato as a form of imitation or mimesis. Both "arts" (*tekhnai*), that of imitation and image-production, are torn between two tendencies: on the one hand, both images and imitations aim at being veritable *likenesses*, pictures of an existing and thus true refer-

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3 "Eidos und Eidolon — zwei Termini, die der gleichen sprachlichen Wurzel entstammen, die sich beide aus der einen Grundbedeutung des Sehens, des ἰδεῖν entfalten — und die doch für Platon in dem spezifischen Sinn, den er ihnen gibt, zwei grundverschiedene Richtungen, zwei einander entgegengesetzte 'Qualitäten' des Sehens in sich schließen. In dem einen Falle trägt das Sehen den passiven Charakter der sinnlichen Empfindung, die einen äußeren sinnlichen Gegenstand nur in sich aufzunehmen und abzubilden strebt — in dem anderen wird es zum freien Schauen, zur Erfassung einer objektiven Gestalt, die aber selbst nicht anders als in einem geistigen Akt der Gestaltung vollzogen werden kann. [...] Erst bei Platon ist jede derartige sinnliche Schematisierung des reinen Seinsbegriffs ein für allemal überwunden. Ein scharfer Schnitt trennt jetzt die Welt der ὄντα und die des ὄντως ὄν, das bloße Dasein der Erscheinungen von dem Gehalt und der Wahrheit der reinen Formen. Zu dem eigentlichen und echten Ursprung, zum 'Prinzip' der Sinnenwelt ist nicht zu gelangen, solange wir dies Prinzip noch in ihr selbst suchen oder es in irgendeiner Weise mit sinnlichen Bestimmungen behaftet denken." Ernst Cassirer, "Eidos und Eidolon. Das Problem des Schönen und der Kunst in Platons Dialogen. (1924)," in *Aufsätze und kleine Schriften (1922–1926)*, ed. Julia Clemens (Hamburg: Meiner, 2003), 139–140.

ence; on the other, they seem able to trespass the threshold of such a task and produce not just veritable likenesses, but what Plato calls *phantasms*. Speaking through the character of the Stranger, Plato outlines a division of the "art" responsible for the production of images (*tekhnē eidōlopoiikē*) in two: an "icastic" one (*eikastikē*), responsible for producing likenesses, and a "fantastic" one (*phantastikē*), that produces phantasms. However, the production of images seems always to entail both. To illustrate the point, the Stranger makes an example of a painter or a sculptor that, while producing a likeness of something, has nevertheless to tweak the proportions of his artwork so that it can be perceived at best by an observer: shifting away from its reference in order to persuade a referent, the picture produced by the painter or by the sculptor is something that "appears but is not like anything,"[4] it somehow loses its connection to an existing reference—it loses a natural determination—and is thus only a mere appearance, a phantasm. The disentanglement between these two tendencies seems, therefore, to be possible only for dialectical purposes, whereas instead, likenesses and phantasms are de facto always inextricable within the image.[5] In the image, Plato states

4 "φαίνεται μέν, ἔοικε δὲ οὔ." Plato, *Sophist*, 236b7.
5 Plato, 236b10–236c1.

through the character of the Stranger, "*what is not* [*to mē on*] risks to get entangled in an intertwining with *what is* [*tō onti*], and this is very amiss."[6] It is as if, for Plato, the image always carries a residue, some surplus or excess that goes beyond the ontological definition of things. Such a residue can pollute and corrupt thought and reasoning, blur a vision that would be *orthos*, literally "right."

This would not be a problem if the image were not considered a medium of knowledge. If philosophy entails approaching knowledge, *sophia*, through a certain intimacy, or *philia*, the image as a medium stands at the locus of this intimacy: if vision, as already said, needs *distance*, the image puts such distance into place. The image introduces a disruption between the contiguity of knower and knowledge, a sort of empty place that can be "occupied" by foreign agents or beings. The void of this distance resonates with the "nothingness" to which the image is perpetually entangled. As a domain of intermediation, the best paradigm through which to look at this void is perhaps the one of the

6 "Κινδυνεύει τοιαύτην τινὰ πεπλέχθαι συμπλοκὴν τὸ μὴ ὂν τῷ ὄντι, καὶ μάλα ἄτοπον." Plato, 240c. Amiss translates here *a-topon*, literally meaning "without a place." Being and non-being are "folded together" in Plato's words: *cum-plexio* is the literal translation of *sum-plokē*, a "with-folding." In this sense, the image is what Carl Schmitt would have described as a *complexio oppositorum*, a folding-together of opposites. See: Carl Schmitt, *Römischer Katholizismus und politische Form* (Stuttgart: Klett-Cotta, 2002).

marketplace—and is it not a case that, in antiquity, commerce always happens in relation to an "empty" or "open" space, the agora, the forum, the harbor? According to Plato, the sophist, the most dangerous producer of images, is a "merchant of knowledge."[7] Despite Plato and Aristotle having provided an extensive outlook on the figure of the merchant and commerce at large, Aristotle's concern over commerce deserves further analysis, even if it parallels, in some respects, Plato's concern on images.

Improper Possessions: Aristotle and Money

Unlike Plato, Aristotle is not concerned with the epistemological status of images. Tragic poetry, condemned by Plato as one of the principal examples of art able to produce phantasms, is placed instead by Aristotle at the very core of the *polis*.[8] Fiction is not problematic for it since the *catharsis* it provides well-integrates it as one of the natural ends of the life of the city.[9] Nevertheless, Aristotle shares similar concerns to Plato: what he worries about, however are not images without reference, as much as properties without proper purpose. What in Plato is a gnoseological concern becomes a matter of political economy in Aristotle. Every possession

7 *Mathēmatopōlikos* (μαθηματοπωλικός). Plato, *Sophist*, 224c–e.
8 Plato, *Politeia*, 605b.
9 Aristotle, *Poetics*, 1449b.

(*ktēma*), Aristotle writes, has two uses: a "proper" and an "improper" one.[10] The proper one corresponds to what the possession has been conceived for, the use corresponding to the needs according to which it has been produced. The second use, the "improper" one is the one of exchange: "take for example a shoe," Aristotle writes "there is its wear as a shoe, and there is its use as an article of exchange."[11] This duplicity of purpose resonates, to a certain extent, with the ambiguity of the image in Plato: in the same way that the image is entangled with non-being, the purpose of possession can be proper as well as improper. "Proper" is the translation of *oikeia*, literally *in* or *of the house*, making Aristotle's take on non-referentiality not ontological as much as instrumental: non-referential is not what does not refer to being (*tō onti*), but what is "without housing" (*ouk oikeia*) or, in other words, without a proper determination.

If the ambiguity of the image is what makes it ultimately unreliable, according to Plato, the fact that possessions can hold a duplicitous purposefulness is not in itself a source of contempt for Aristotle for at least two reasons. Firstly, it is implicit that the improper use of exchange cannot erase the proper purpose of the possession, to which it is instead

10 Aristotle, *Politics*, 1257a.
11 Aristotle, 1257a.

destined to be subordinate: to follow Aristotle's analogy, a shoe will never really be exchanged just for the sake of the exchange, but, eventually, it will be used according to its intended purpose. The proper use is, in this sense, not effaced, but only *suspended*, withheld. Secondly, even as a token, the use of a possession can be "natural" (*phusei*) while still "improper" (*ouk oikeia*): commerce, or the exchange of possessions, is justified as a barter between the needs of different families or communities, "because men had more than enough of some things and less than enough of others," and such a condition is a natural one (*kata phusin*) to begin with.[12] Economy is not limited to the household walls—the *oikos*—but to the entire "social" domain.[13] The problem, according to Aristotle, arises whenever not only a possession is used improperly, as a token of exchange, but when, in addition to that, the exchange is not determined by the needs of the household or the community. Commerce, or the art of exchange, opens up the possibility of acquiring possession just for the sake of it, independently from needs. It turns into what Aristotle

12 Aristotle, 1257a14–17, trans. H. Rackham (Cambridge, Massachusetts: Harvard University Press, 1944).
13 Such a domain can anachronistically be considered as "social" precisely since it is treated economically: Aristotle speaks here of "community of more people" (*pleionōn tēs koinōnias*) and places the household (*oikia*) as its primary form (*prōtē*). Aristotle, 1257a19–21.

calls chrematistics (*tekhnē khrēmatistikē*), an "art of wealth-getting."[14] Once wealth is decoupled from economic needs, no end is there to limit its means: once a means, wealth becomes, therefore, an end in itself.[15] Possessions are not any more commodities or goods: they are not exchanged and acquired in order to harmonize the unbalances between men that "had more than enough of some things and less than enough of others," they instead *accentuate* them. Such an accumulation of wealth is not interested in a "good life" (*eu zēn*) but in life itself, as a "bare" force without any particular attributes or measures, and cannot but be the expression of an "unlimited desire" for it.[16]

It is perhaps worth mentioning that the absence of limits and ends (*apeiria*) is not univocal: in a way,

14 "But there is another kind of acquisition that is specially called wealth-getting [*khrēmatistikēn*], and that is so called with justice and to this kind it is due that there is thought to be no limit to riches and property." Aristotle, 1256b40–1257a1 (trans. Rackman).
15 "And these riches, that are derived from this art of wealth-getting, are truly unlimited; for just as the art of medicine is without limit in respect of health, and each of the arts is without limit in respect of its end (for they desire to produce that in the highest degree possible), whereas they are not without limit as regards the means to their end (for with all of them the end is a limit to the means), so also this wealth-getting has no limit in respect of its end, and its end is riches and the acquisition of goods in the commercial sense." Aristotle, 1257b (trans. Rackman).
16 "The cause of this state of mind is that their interests are set upon life but not upon the good life; as therefore the desire for life is unlimited, they also desire without limit the means productive of life." Aristotle, 1257b–1258a (transl. Rackman).

it is constitutive of the arts themselves. "Each of the arts is without limit in respect of its end," Aristotle writes, "for they desire to produce that in the highest degree possible."[17] In other words, arts or techniques can provide infinite degrees of resolution to the same question, but this does not mean that their product is entirely arbitrary: the limitlessness of the arts is always oriented towards its end—which, ultimately, is the one of the good. As such, the good never holds a set measure but is always brought into presence within the confrontation of something external to the product of the art. Aristotle brings the example of medicine, an art which "is without limit [*apeiron*] in respect to health:"[18] a doctor cannot indeed make a patient "too healthy," yet at the same time his practice can, within this limit, be indefinitely refined. Chrematistics opens the possibility of renouncing even this horizon. As a price, its "measure" is *absolute*, as it is untied from any orientation towards the contingent satisfaction of life-sustaining needs or towards what Aristotle calls a "good life" and is, therefore, branded by him as unnatural.

Set as absolute, the means of exchange turn from non-referential to self-referential. The principal operator of this conversion is money: Aristotle de-

17 See note 13.
18 See note 13.

scribes it as what is, at the same time, "element and end of exchange."[19] Money cannot be just non-referential in the sense that, as a possession, it does not hold a proper use (thus a "reference") and an improper one, but only the latter: money is what can be exchanged only. If chrematistics abstracts from a "natural" economy, i.e., from the harmonization of differences aimed at collective, symbiotic sustainment of life—and thus to goodness—money introduces the possibility of a "financial" economy, i.e., of an economy in which the ends (*fins*) are not naturally determined, but self-determined. Money transcends the duality of proper and improper, of *oikeia* and *ouk oikeia*, and sets instead a "third" position that goes beyond negative and positive. As "that which is exchanged" (*hupallagma*), money is the positive of a negative, what gives a presence to an absence. In this respect, the essence of money comes close to the one of the image in Plato, as an entanglement of "what is" with "what is not."

From Money to Interest

Nevertheless, for Aristotle, the true discredit falls not really on money itself but in what money—and commerce—are able to self-produce, namely *interest*:

19 "Τὸ γὰρ νόμισμα στοιχεῖον καὶ πέρας τῆς ἀλλαγῆς ἐστιν." Aristotle, *Politics*, 1257b 22–23.

But, as we said, this art [i.e., chrematistics] is two-fold, one branch being of the nature of trade while the other belongs to the household art; and the latter branch is necessary and in good esteem, but the branch connected with exchange is justly discredited (for it is not in accordance with nature, but involves men's taking things from one another). As this is so, usury is most reasonably hated, because its gain comes from money itself and not from that for the sake of which money was invented. For money was brought into existence for the purpose of exchange, but interest increases the amount of the money itself (and this is the actual origin of the Greek word: like the offspring resembles the parents, so the interest is born as money out of money); consequently this form of the business of getting wealth is of all forms the most contrary to nature.[20]

Through interest, usury brings to life the "nothingness" that money carries within itself, not just symbolically but *materially.* The application of money not as a measure of exchange but as a "tax" on the passing of time abstracts it from the economic domain of addition and subtraction, and

20 Aristotle, 1258a38 – 1258b8 (transl. Rackman). The phrase "like the offspring [...] of money" has been edited to better fit the original formulation as an analogy and not as a parataxis, as in Rackman's translation. It is also important to note that *ta tiktomena*, "the offspring," and *ho tokos*, "the interest," are respectively the participle and the substantive of the verb *tiktō*; similarly, *tois gennōsin*, "the parents," and *ginetai*, "is born," are both forms of the verb *gignomai*.

thus goes beyond the limits imposed by a natural balance and, by "increasing the amount of money itself," it introduces a domain of multiplication instead. This multiplication is not just nominal but, as Aristotle hints, it is almost organic: interest is compared by him to the "offsprings" of money, and money becomes like a "parent" for interest, an analogy strengthened by the etymological kinship between *tokos*, "interest," and *tiktomena*, "what is engendered." It is as if, through interest, money acquires its nature that is, nevertheless, artificially produced. A second, prosthetic nature that is not just symbolic or immaterial—the money acquired through usury has value, they are effective—but it interferes, pollutes, and parasites the given value. The "void" generated by the absence of purpose and reference paradoxically produces its opposite: an unlimited abundance, a copiousness that comes out of nothingness—*creatio ex nihilo.* The proliferation of money not only does not match with the given nature of "what is," but it pollutes its economy with new, artificial beings and thus compromises by surcharging any hope of compiling a univocal ontology of the cosmos.[21]

21 See Marcel Hénaff, "The Scandal of Profit and the Prohibition of Appropriating Time," in *The Price of Truth: Gift, Money, and Philosophy* (Stanford, California: Stanford University Press, 2010).

The Invisible Life of Images

The understanding of money and financial interests as *tokoi* as offsprings and, therefore, as living beings capable of reproducing themselves autonomously and without the intervention of an external agency can provide a fascinating retrospective look over the question of images. If, through the financial dimension of interest, money can exist autonomously from a certain purposefulness and beyond its bounding to a specific economy and reproduce itself without limits, then, can the same be said of images? Can images be thought of as some being, as something endowed with vitality? After all, what today goes by the name of *specie* and is associated with some biological classification, is precisely an image: *specie* comes from Latin *spiciere*, "to look," and it is only in modern times that the connection to this visual meaning is mainly neglected. *Speculation* also comes from the same root, a term that, in its contemporary use, both applies to finance and thinking: *to speculate* is something that can be done through money as much as through thoughts. The image is what *invisibly* connects the two: it is as if, after modernity, the image—as the visible itself—is what has become invisible.

VI
Ektropic Intellect

Non-Subjective Thought

Cogito, ergo sum, "I think therefore I am." In René Descartes's well-known formulation, thought is set as the a priori condition of any individual existence, as if intelligence would come before life itself. The I, the *ego*, exists only insofar as there is thought. "I am, I exist, this is certain," writes Descartes in the *Meditations*. "But for how long? Certainly," he continues, "only for as long as I am thinking; for perhaps if I were to cease from all thinking it might also come to pass that I might immediately cease altogether

to exist."[1] The "I" exists as long as it is thinking; the Cartesian subject exists only *within* thought. But what about the inverse? Does a subject, an "I," need to be there in order for thought to happen? Or can it happen independently, separately, outside of personal and individual existence? For how absurd it might appear, such a question is profoundly linked to an understanding of the image as something separate and independent from an original model and, as in the case of the financial interest—of the *tokos*—, as something abstracted from a proper purpose and at the same time almost organic, living. In these terms, asking whether thought can happen without a subject mirrors whether an image can be without an object. In other words: can thoughts and images, vision and intellect, be granted a life on their own?

The philosophical endeavor of Emanuele Coccia developed and unfolded precisely from such questions. His doctoral thesis, entitled *The Transparency of Images*, focused on the conception of images within the philosophy of Averroes and, in particular, concerning his notion of a "material intellect."[2] Introduced in his *Long Commentary* to Aristotle's

1 René Descartes, *Meditations on First Philosophy: With Selections from the Objections and Replies*, trans. Michael Moriarty (Oxford: Oxford University Press, 2008).
2 Emanuele Coccia, *La Trasparenza delle immagini: Averroè e l'averroismo* (Turin: Bruno Mondadori, 2005).

writings on the soul, Averroes's formulation of a separate mind tries to answer the question of the *unity* of the intellect, that is to say, how thought can be something individual and at the same time shared, "public" and "private," so to say. To solve such *magna quaestio*, Averroes postulates a unique, separate intellect—a *unica mens*—which all individual minds are in continuous exchange with, an exchange that happens by means of *intentiones* or *species*: in other words, by means of images. Averroes's conception of images embraces precisely those aspects that concerned Plato so much: images are, in Averroes's model, *phantasms*, pictures of nothing. They exist independently from both objects and subjects: "Images," Coccia writes, "possess nothing that is exclusively anthropologic or cultural, in much the same manner that they possess nothing that is merely natural. The sensible is beyond any and every opposition between nature and culture, life and history, in the same way that the medium is beyond any and every inane dialectic between subject and object."[3] The material intellect is the receptacle of these images, the *lieu* of what Coccia would have later described—in the

3   Emanuele Coccia, *Sensible Life: A Micro-Ontology of the Image*, trans. Scott Alan Stuart, Commonalities (New York: Fordham University Press, 2016), 36.

first of a fruitful series of re-articulations of the topic—as a "sensible life" or a "life of the sensible."

Averroes's *intellectus materialis* offers Coccia a model to conceive of the sensible—and, analogically, of the intelligible—as something separable from the knowing and thinking subject, from the Cartesian *ego cogito*. Sensing, knowing, and thinking are, therefore, no longer tied to a particular subject, namely the human, rational one; to say it with Blumenberg's words, man is no longer the *Sinnbezug*, the "reference of sense" of the world and the "representation" of its model.[4] What is recovered here is the notion of the world image, insofar as within it man could be "center," *Sinnzentrum*, thus meaning that sense—and the sensible—could extend as well *beyond* the individual and the "center" of her faculties, and not only in relation to a reference.[5] What this "beyond" implies is that reason, as a "making-sense," is not sealed anymore within the

4 Representation here has the character of *Vor-stellung*, of a "standing-before." In this sense, the best counterpoint to Blumenberg's "world model" is Heidegger's "world picture." See Martin Heidegger, "The Age of the World Picture," in *The Question Concerning Technology, and Other Essays*, trans. William Lovitt (New York: Garland Pub, 1977), 115–54.
5 "The identity of rationality and humanity sealed by the concept of consciousness in fact brings with it the perfect coincidence of the question of the being of knowledge and language and that of the being of man. Man and knowledge define *in re* only the being of the same singular entity: that particular species of life that we have been taught to call human." Coccia, *La Trasparenza delle immagini*, 57.

reference to a specific subject but becomes instead a *lieu*, an emplacement:

> Reason is a space, a *Denkraum*, a transcendental field in which forms come into existence as knowability and not as an I endowed with a form of its own. Every form, insofar as it can be known and thought, finds its place in this space. The empty place of the sovereign, which through the notion of consciousness is usually articulated in the faculty of the intellect, is replaced by the immaterial spatiality of mediality, a place of thought defined only by the capacity to receive and sustain the knowability of things.[6]

Reason—and, by extension, its bodily conjugate, the intellect—is not as much a matter of anthropology or psychology as one of architecture or architectonics. Conceiving of reason as a *Denkraum*, as a place distinct from an "I" and from its faculties, liberates images—as both sensible and thought—from the necessity of being perceived by a subject. Images are not merely representations or *Vorstellungen*; they do not require, as Heidegger would have said, a "representative" (*Repräsentant*) that lies-before them (*Vor-liegt*).[7] Instead, they are themselves representatives, as they gain autonomy from their referential nature. As Benjamin's *Name*

6 Coccia, 119.
7 Heidegger, "The Age of the World Picture," 131.

is not a representation of the idea but the place in which the idea "gives itself" and "represents itself;"[8] likewise, the image as introduced by Coccia is no longer a mere "meanwhile," a linear *puncti explicatio* or a projective *frattempo*: it is instead the lieu of an intransitive representation, in which the sensible "represents itself." To deprive images of such autonomy means to make the sensible an inferior kind of being, an *eidōlon*, something not separable from a "subjective" kind of perception that, as such, is private and incommunicable and is, therefore, negligible if compared to a higher form of cognition, the "objective" one.[9] The exclusion or the "loss" of images as autonomous entities is, therefore, the *conditio sine qua non* for the subject to exist, to *ergo sum*: "Only the exile of intentional species," writes Coccia about images, "has made it possible for the subject to coincide with thought, as activity, and as a result, in all of its forms."[10] Granting images autonomy implies obstructing this coincidence or at

8   Cacciari, "Di alcuni motivi in Walter Benjamin," 219.
9   "Philosophy, too, has made of it a true pariah: It has decreed that the sensible has no existence separate or separable from the subject who knows the real through the mediation of the sensible. Sensible life is rigorously limited and reduced to an *internal* accident of psychism. It exists solely *within* the subject and never outside of it. Sensible life represents an inferior stage, which is private and incommunicable, of the authentic cognitive act that is consummated in the higher chambers of the understanding and the mind." Coccia, *Sensible Life*, 6.
10   Coccia, 7.

least questioning its natural condition. Once images are conceived as independent from a perceiving subject, the latter cannot immediately identify as an "object" of thinking: the image stands as an obstacle in between the two, as what Coccia describes as "a shard of objectuality that has pierced the subject, hindering it from transiting from the *cogito* to the *sum res cogitans* without an ontological leap."[11] The subjectivity of such thinking is—if a subjectivity at all—an *impersonal* one, in the sense that it cannot coincide with any personal pronoun—neither with an "I" nor a "you" nor a "we" nor a "she" nor a "they" nor an "it"—as if not only with a generic, impersonal and intra-bodily "it thinks," implied in the same way as "it rains" or "it blows."[12]

11 Coccia, 7.
12 "There seems almost a priority of the image over the imagination, a priority of the sensible over sensation and perception. This is not only a chronological priority. There is sensible life in the universe because images exist and because a kind of being exists that is distinct from that of the things and souls, of the psychic and the material. [...] It is for this reason, too, that perception should be tackled from the point of view of the image and not from the subject that perceives it. In his last and very dense work, Merleau-Ponty recognized the necessity to 'be placed back in the 'there is' [*il y a*] ... upon the soil of the sensible world.'"Coccia, 32. Maurice Merleau-Ponty, "The Eye and the Mind," in *The Merleau-Ponty Reader* (Evanston, Illinois: Northwestern University Press, 2007), 352. Coccia quotes William James as saying, "If we could say in English, 'it thinks,' as we say, 'it rains' or 'it blows,' we should be stating the fact most simply and with the minimum of assumption." Coccia, *Sensible Life*, 68 and William James, *Psychology: The Briefer Course* (Toronto: General Publishing, 2001), 19. Serres echoes James and Merleau-Ponty: "This writing, these decisions, these memory storages, these codings, among other examples, endow objects

To disentangle the image from the subject (and, consequently, from the object) means to consider the image as something not only separate but *prior* to imagination and intellection and the sensible as something prior to perception. In Coccia's words, there is a "primacy" of images. If images exist and do not merely originate within the vision of a subject, this implies that vision itself, as a vision of images, must come after, like in hearing, "it is music that makes listening possible."[13] *Visio est posterius visibili* quotes Coccia from Averroes: "Vision is something which follows the existence of the visible as such."[14] Images are, therefore, not so much what pertains to an "imaginary," i.e., to some personal repository, as much as to an impersonal domain, the one of Averroes's material intellect. Such domain is a world of images on its own, a *mundus imaginalis*—what French theosopher and iranologist Henry Corbin defined as the *imaginal*, "the world situated midway between the world of purely intelligible realities and the world of sense perception."[15]

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with quasi cognitive properties. 'It thinks' in the sense of 'it rains' exists as much as 'I think' or 'we think.'" Michel Serres, *The Incandescent* (London: Bloomsbury Academic, 2018), 191.

13   Coccia, *Sensible Life*, 33.

14   Coccia, 33.

15   "[...] the world that I have called the *imaginal* world (*'alam al-mithal*, *mundus imaginalis*) in order to avoid any confusion with what is commonly designated *imaginary*." Henry Corbin, *Temple and Contemplation* (London: KPI, 1986), 265. The one of the imaginal is a "category" (268); its ontology cannot be thought separately from an architectonic

The non-subjective, impersonal nature of the imaginal is not to be understood in antinomic terms. In other words, it would be misleading to think of such a domain as merely "objective." Images are here autonomous from subjects as much as from objects. They are not mere attributes or accidents of a substantial underlying reality nor figures of a higher truth. Their nature as "obstacles," as what hinders a seamless and transparent perception of things, comes close to the meaning of the object as *objectum*, as what is "thrown in the way;" yet, images hinder as much as they allow, they separate as much as connect—they "mediate"—and are, therefore, *potentially* objective as much as *potentially* subjective. Rather than subjective or objective, images belong to an intransitive or potential kind of projectivity, they are not projections but "projects."[16]

set-up—what Corbin will further develop as an *imago templi*. The category of the imaginal has furthermore recently been picked up by other scholars—see Chiara Bottici, *Imaginal Politics: Images Beyond Imagination and the Imaginary* (New York: Columbia University Press, 2014).
16   This aspect will be developed further in the text—see chapter 8.1, "The Transcendental-Projectual." On the political and architectural implications of the autonomy not of images but of projects, see Pier Vittorio Aureli, *The Project of Autonomy: Politics and Architecture Within and Against Capitalism* (New York: Princeton Architectural Press, 2008).

Reception without Transformation

The potential (and thus "projectual") character of images finds in the material intellect its proper place. The material intellect, or the imaginal, is the domain in which the fact that images can be received in potency "becomes substance." Precisely since the receptivity of this matter exists but does so only *in potentia*,—i.e., it holds potency as a substance and not as an accident of something already *in actu*—such receptivity is one, as Averroes himself notes, of *passio sine transformatione*, of a reception that does not imply any transformation.[17] This unique feature marks the main difference between the material intellect and a traditional understanding of matter as a material density whose form is changed by what it receives and that, in turn, "corrupts" the form that has been impressed on it.[18] No Newtonian law of action-reaction is to be found in the material intellect: it is a domain in which forms are received as forces without any counter-reaction or given without the need of being returned. It leads to "the paradox of a substance that the less it is form, the more it *is*."[19]

17 Coccia, *La Trasparenza delle immagini*, 28.
18 "Normally, when a form enters the material density of its receptor, the form is changed and changes in turn its own receptor." Coccia, *Sensible Life*, 28.
19 "Il paradosso di una sostanza che tanto più *è* quanto meno è forma." Coccia, *La Trasparenza delle immagini*, 85.

The comparison between this kind of receptivity against what could be anachronistically defined as a "thermodynamic" form of reception—i.e., a transformative one, in which the receiver is irreversibly corrupted—is presented by Averroes himself, that describes it in analogy to thermic exchange. According to him, affection or reception can be, in fact, twofold: "One is the affection which is a corruption of a patient by a contrary by which it is affected, as the affection of the hot by the cold." To this "thermodynamic" affectivity, Averroes adds one:

> which is an eduction of what is affected in potency by what is in actuality and act, insofar as what is in act is like, not contrary, namely, drawing it out from potency to act, contrary to the disposition in the first [kind of] alteration.[20]

Instead of being corrupted by what it receives as a contrary, this form of affection preserves *in act* a *potential* reception. Therefore, what is in act becomes the "image"—insofar it is *like*, and not

20 Averroes (Ibn Rushd) of Cordoba, *Long Commentary on the De Anima of Aristotle*, ed. Therese-Anne Druart, trans. Richard C. Taylor (New Haven, Connecticut: Yale University Press, 2009), 167–168. Also cited by Coccia in *La Trasparenza delle immagini*, 89. "Eduction" is the translation of *evasio*, a Latin translation of what in Aristotle's fragment quoted by Averroes is σωτερία, literally a "saving."

contrary[21]—as it stores and withholds a potentiality rather than simply losing it as a form of corruption.[22] Such an image is, in the words of Averroes, a "disposition," something that the soul can actualize; it can move it from *potentia* to *perfectio.* Instead of being a corruption of a form that is already given, the disposition makes it possible to acquire something out of nothing, precisely as it happens in knowing: only in the act of knowing, writes Averroes, can one shift from non-contemplation to the contemplation of something.[23] However, it is not a matter of an absolute nothing: the *mutatio* that is at work in this receptivity without transformation "is not from non-being but is an addition in what can be transformed [*additio in transmutabili*] and a going toward actuality [*ire ad perfectionem*] without there being a corruption or change there from non-be-

21   "[S]imile, non contrarium." Averrois Cordubensis, *Commentarium Magnum in Aristotelis De Anima Libros*, ed. Stuart Crawford (Cambridge, Massachusetts: The Medieval Academy of America, 1953), 216.
22   The image as conceived by Averroes operates a shift similar to the one in physics from thermodynamics to information: entropy, the loss of energy available for further transformation (*tropē*) and thus the "measure of disorder" and the irreversible "corruption" of a system becomes here a measure for "information" understood as the actuality of potential combinations of a determinate code. Information is, in this sense, *passio sine transformatione.*
23   "That mode of affection is from a mode which is an eduction of the patient by what is moving it in act, not its corruption. *For only one who knows contemplates something after he was not contemplating.* This is not an alteration according to the first intention, which is the corruption of what is affected." *Long Commentary*, 168. Italics added.

ing."[24] As a part of the soul, the disposition implies a change that is not a transformation into something else but that, almost paradoxically, makes its object become even more what it already is. In the attempt to explain the paradox presented in Averroes's comment, Coccia quotes the description given by Plotinus of the substance of thought as something that "leads what it *naturally is* to activity and perfection, just as the unsown is led to perfection when it is sown." To this analogy, Plotinus adds an even more powerful one: "Whenever the female desires the male," he writes, "the female is not destroyed; rather she is made still more feminine. That is to say, *it becomes more what it already is.*"[25] An example of this addition-mutation is, according to Averroes, precisely the one constituted by the change from ignorance to knowledge, *mutatio ex ignorantia ad scientiam.*

24 *Long Commentary*, 168. "Idest, et quia ista transmutatio non est ex non esse, sed est additio in transmutabili et ire ad perfectionem absque eo quod sit illic corruptio aut mutatio ex non esse, ponitur sicut mutatio ex ignorantia ad scientiam." *Commentarium Magnum*, 217. An addition that corresponds as well to a subtraction: "In this sense the performance proper to every act of thought or knowledge consists in a kind of ontological reduction, which subtracts from everything that does not constitute its species, its possibility of being known. To know something is to separate (*abstrahere*) its knowability, to distil it." Coccia, *La Trasparenza delle immagini*, 127.
25 Coccia, 107 and Plotinus, *The Enneads*, ed. Lloyd P. Gerson (New York: Cambridge University Press, 2018). Emphases added. Plotinus's analogy could be an interesting point from which to re-develop Serres's *hominescence* instead as a "feminescence."

Prime and Ultimate Perfection

Within disposition, ignorance and knowledge cannot be understood in a logic of either-or, or on an indefinite scale of zero-to-infinity. The change from ignorance to knowledge is, still in the words of Averroes, *mutatio de prima perfectione ad ultimam*, a change from a "first" to a "last perfection."[26] Within these terms, ignorance cannot be conceived simply as a less perfect form of knowledge but as its "prime" actualization.[27] As a disposition, the image is, therefore, what turns this absence or non-being into the minimum degree of actualization, into a *prima perfectione.* "It is the image, Averroes would explain, the operator of the individualization of the intellect and the place where the absolute transparency of thought becomes knowability of something."[28] As a disposition, it is as if the image unfolds and "declines" the absolute potency of the material intellect within a range of minimal and

26 "Alteratio enim que est evasio patientis est duplex, alteratio scilicet de non esse ad perfectionem, et alteratio de prima perfectione ad ultimam; et hoc est additio quam innuit." Averroes, *Commentarium Magnum*, 217.

27 Along this line, Coccia speculates that the ignorant "is not so much the one who does not think as the one who thinks in an abstract and indeterminate way; of thought he only contemplates its material aspect, the simple fact of *being able* to think this or that, without ever arriving at *this* thought, at *this* knowledge." Coccia, *La Trasparenza delle immagini*, 146.

28 Coccia, 146–147.

maximal "degrees" of actuality.[29] It is important to remark that these different degrees do not correspond to "more" or "less" amounts of actuality or perfection: the minimal degree, the grade-zero, is still a *perfectione*, an actuality in its own right. What changes is that, in this initial, inchoative state, the substantial potency preserved by such actuality can be contemplated at its maximum since it did not yet assume any specific form. The "last perfection" is then the summit or the maximum degree of actuality that can be "drawn out" (*extrahere*) from potency, its *non-plus ultra*. As a disposition—i.e., as a locus of non-transformative reception—the image encrypts these poles and withholds within itself the range that unfolds between them. In this sense, the image is *natural* as much as *naturing*: it

29   First and last perfection are, in this context, close to an "economy of maxima and minima:" they are the indexes of an economy "for which no purity or original balanced state need be assumed as a reference." The model for such an economy "can be achieved in terms of scalar models that straddle maxima and minima points, as with the diurnal mapping of the year where the two *maxima* are the days in which day and night are of equal length, and the corresponding *minima* are the days where their difference is maximal (or the other way around, it is not important whether equality or difference is considered as maximum)." The relationship between potency and actuality would then resonate with the one between *mass* and *information*, concerning which "Serres proposes to distinguish between points of maximal hardness and minimal softness (one side of the scale), and maximal softness and minimal hardness (the inverse side of the same scale)." Vera Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres* (London: Bloomsbury Academic, 2020), 69.

preserves a potency by bringing it to actuality, by engendering it.[30]

Public Wealth and Sacred Expenditure

The potential nature of the imaginal domain is best expressed by the figure of *infancy*: the infant or the child is, in fact, the one that knows only in absolute potency. Infancy is, therefore, a sort of state outside of consciousness: "Consciousness—writes Coccia—is the knowledge that one has of something, but the infant does not know that he can think, and in being able to think he does not know [*non sa*]."[31] Such a state of ignorance constitutes a privileged position from which to contemplate the imaginal as a domain of potential relations and codes: the advantage of the infant is that her relation to knowledge is not yet bound to a specific form or a particular language—it is not yet "rational." Furthermore, this cannot be reduced to a matter of a simple delay,

30   See my contributions in Mihye An and Ludger Hovestadt, eds., *Architecture and Naturing Affairs* (Basel: Birkhäuser, 2020). The image of the human—or, as Michel Serres calls it, of an *hominescence*—is, therefore, one which finds in infancy its *prima perfectione* and in the human its last: "It is in the concept of infancy that the irreparable delay between man and knowledge—which elsewhere appears as a simple temporal or accidental postponement of the human condition with respect to wisdom—arrives at the consistency of a *nature*: in fact, the infant is the one who is *naturally* outside of thought and language, even though he has a relationship with them." Coccia, *La Trasparenza delle immagini*, 65.

31   Coccia, 69.

of a linear process that awaits completion: "Men are infants not so much because they do not think *yet*, but because the being of thought is given to each of them in the form of an absolute potency, capable of becoming any thought in action, without actually being any."[32] This non-linearity implies that the imaginal or the material intellect cannot be referenced through the fact of being bound to a specific code or to be "free" from it; there, images exist prior to such possibility of bounding and cannot, therefore, be addressed or classified in terms of entropy, neither positive nor negative. The imaginal is not just what stands beyond the "tropic line," the horizon of possible combinations of a particular code. It is the realm that can host, in potency, any "sphere" upon which such horizons are projected, and for this reason, it *exceeds* any specific "tropicality"—

32 Coccia, 69. "Homo learns more slowly than other animals, and with greater difficulty. He never stops being born, and retains physical traces of his prenatal existence. As for his ethogram, it doesn't appear so clearly defined as that of primates closely related to him. This irrepressible initial *delay*, with its consequence of prolonged defenselessness, is the precondition for a learning process that, having once gradually and belatedly begun, can, by way of compensation, develop in countless directions. If Homo had not possessed a radical indeterminacy, he could not have developed his enormous capacities of imitation. The delay in development increases the capacity for development." Roberto Calasso, *The Celestial Hunter*, trans. Richard Dixon (London: Allen Lane, 2020), 103. See also: Michel Serres, *Hominescence*, trans. Randolph Burks (London: Bloomsbury Academic, 2019). Serres's notions of *incandescence* and *hominescence* profoundly resonate with what is exposed in this chapter.

and it is thus *ek-tropic*.[33] The "excessive," absolute nature of this ektropic intellect does not imply an exclusion *tout court* from specific thoughts or images, but one that is *in potentia*. It is not, therefore, within the thought *in actu*—as a thought by someone or of something—that the imaginal or the material intellect can be contemplated. It can be instead contemplated in their absence and suspension, as a *hiatus*: "Averroism teaches that it is the cessation of thought and its absence, not its continued and unfailing activity that shows its truest nature."[34]

Far from romanticizing infancy as a condition of innocence lost once and for all, Coccia presents it, within the frame of Averroes's separate intellect, as a paradigm for study: "It is in the study that man actively produces her infancy."[35] To learn and, more precisely, to study implies a form of voiding from prejudices and preconceptions so that the subject of knowing can receive the object of the study and

33   On the relation between positive and negative entropy and code, see Vera Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres* (London: Bloomsbury Academic, 2020). On the notion of "ektropy," see Massimo Cacciari, *Icone della Legge* (Milan: Adelphi, 2002), and *L'Angelo necessario* (Milan: Adelphi, 1992).

34 Coccia, *La Trasparenza delle immagini*, 65. Also: "Philosophy becomes the reflection on the fact that thought first and foremost does not exist in act, and is given in the form of an interruption of non-thought rather than in that of a continuous operation." Coccia, 66.

35   "That is why it is not reason but study—the esoteric name for what tradition calls philosophy—that is the power that distinguishes man from all other living beings capable of experience." Coccia, 75.

contemplate it to the fullest of its possibilities. "For something like study to be possible, knowing must be able to turn into a potency and possibility that are unrelated to and separate from the existence of the individual subject, and not as its possession or pertinence nor as an already possessed knowledge."[36] Study would then coincide with some process of alienation from knowledge, almost like dispossession. What such dispossession leaves is a sort of negative "cast" or "scaffold" that can, in potency, welcome positive knowledge—what Averroes addresses as disposition. One of the analogies through which such disposition is illustrated is the one of a wax tablet waiting to be written upon: the material intellect can be called as such precisely in virtue of the fact that its *disposition*—its ability to be "materially" written in potency—is what constitutes its very substance.[37]

Within the study, some exchange occurs: the *appropriation* of wisdom must be paralleled by *dispossession*. It is, nevertheless, not a matter of a mere economic exchange or of a positivistic *do ut des*. Instead, the exchange happens in terms of some

36 Coccia, 75.
37 "One can compare the material intellect to a tablet without writing (and not to the simple disposition of receptivity to writing): just as the tablet, without any change, is capable of receiving and accommodating a figure, in the same way the material intellect, without any change or transformation is capable of being affected and accommodating all possible forms and knowledge." Coccia, 89.

hospitality: within the study, a certain alienation of the self is required to make room to welcome the unknown—a dispossession of the self is required to be "possessed" by the other—and in such a way, make it knowable. The study is, in this sense, properly a *mathesis*, a "mathematical" way of learning in which mathematics must not be reduced to calculus but rather as an indeterminate "credit" through which determinate knowledge can be "acquired."[38] If, in the words of Heidegger, mathematics is "that which man knows in advance in his observation of whatever is and in his intercourse with things,"[39] it is precisely such an "in advance" that constitutes the credit and the dispossession able to welcome observation and knowledge. The study is, therefore, a way to access the imaginal domain as a source of "free credit"—of knowability as potential knowledge—and open up this exchange. Science and knowledge correspond here indeed with a "loss

38 "If thought has nothing human about it, if it exists indifferently from the individual, the genesis of individual thought will coincide with a movement of appropriation: the individual will have to *acquire* intelligibility in progressively greater degrees and appropriate it rather than produce it and draw it from his own experience. And the thinking man, the *animal* that has become *rationale*, will no longer be a datum of ontology but a result of the exercise of the imagination: it is not a real entity but a state of composition or aggregation of intelligibility with individual phantasms." Coccia, 81.
39 Heidegger, "The Age of the World Picture," 118. "Τά μαθήματα bedeutet für die Griechen dasjenige, was der Mensch im Betrachten des Seienden und im Umgang mit den Dingen im voraus kennt." *Holzwege*, 78.

of images," a *Bildverlust*, a loss which is rather an expenditure, and that as such requires a prior "investment" (the dispossession constituted by study) that cannot happen but through images and within the imaginal domain. The particular form of receptivity offered by this domain—the one of *passio sine transformatione*—prevents it from corrupting and thus from being a domain of finite resources; the mathematical credit of the imaginal is hence one of endless public wealth. To invest in this domain means to offer what is already gratuitous; to study means to spend a credit that can only be spent but never purchased since nobody properly owns it. The publicness of this credit (that is *mathematical* before being *calculable*) cannot be thought of nor accessed if not in combination with an act of sacrifice (that is *imaginal* before being *symbolic*), of spending without any assurance of a certain return.[40] The sacrifice corresponds here to an act of libation, the pouring of a precious liquid offered to the gods,

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[40] The link between study and sacrifice—and, in particular, the role of scripture in striking such a link—is sketched by Calasso in relationship to the passage from one to the other in the context of the Jewish-Christian tradition: "To substitute sacrifice with study: a bold enterprise that began, after the second destruction of the Temple [...] The heir of the Temple was not the synagogue, but the yeshiva, the house of study." Roberto Calasso, *The Book of All Books*, trans. Tim Parks (London: Allen Lane, 2021), 348.

as an act that precedes or accompanies the one of sacrifice and celebrates the irreversible.[41]

41 "The libation celebrates the irreversible. No other gesture could demonstrate it so clearly. Apart from the sacrificial killing, concentrated into an instant. But which does not represent flux, a sign of the irreversible. Even before formulating a desire, the celebrant recognizes the dominion of impermanence, therefore of death. If a sacrifice has necessarily to be accompanied and preceded by the libation, this is because the desire, in order to reach the gods, must be preceded by an act of acceptance that is directed to the totality of that which exists. [...] The libation is not just the sign of the irreversible—and therefore of disappearance—but of superabundance. In the theology of the Vedic seers the 'waters', *āpas*, have a privilege in comparison with everything else: they are the only 'all-pervasive' element. Every rite must therefore start off from contact with water. Only that which Nietzsche would call *Überfluss*, 'overflowing superabundance', makes ordinary life possible. Excess lies at the origin." Calasso, *The Celestial Hunter*, 355–357. "*Spondé, spondaí*: this means 'treaty,' 'agreement,' but it also mean 'libation.'" 392.

VII
Iconostasis

Determination of Thought

The material intellect is what can receive images as autonomous entities, for the intellect itself is separate from individual minds. Such receptivity—the one of a *passio sine transformatione*—is utterly devoid of any *actual* form since only the *potency* of being informed constitutes its very substance. However, how does such potency actualize? How can such a domain of absolute indeterminacy assume a form and thus a determination? "As an absolute power, the intellect is rather sterile," notes Coccia.[1] An "absolute medium," the separate

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1   Coccia, *La Trasparenza delle immagini*, 147.

intellect "has no content or actual determination: it is by definition that which is without form." It is what transforms all forms into an "actual knowability," but such forms must be collected *outside* of it. As something substantially undetermined, it can only welcome determinations that are external to it.[2] Only in connection to an individual mind—i.e., with any entity capable of thinking—can the material intellect turn into what Averroes defines as a "speculative" or "theoretical intellect"—*intellectus speculativus*, or *nous theoretikos*. "The theoretical intellect is not another substance with respect to the single mind," writes Coccia, "but the state, form, or perfection that it assumes when it is in the act of thinking."[3] The speculative intellect is, therefore,

2 "Thought and knowledge do not need a substrate to make them real and current, but something that allows them to determine themselves, to give themselves a form. And it is in the image that it finds this respect. It will be said that the image is what allows reason to find an object (it is what for human perception is the world of the objects of experience) and to pass from the stage of generic and purely potential actuality to that of concrete knowability in action. / In man, thought finds an objective determination and not its own 'I think'. If in the relationship that binds it to a human subject (in the phantasm) it finds its own object, the single intellect becomes the thought *of someone* at the same time and in the same respect in which it becomes the thought *of something*: that is, it is impossible to separate and distinguish the objective determination from the subjective one in thought. That is to say, thought is not thought of something without, in the same movement, becoming thought of someone and vice versa." Coccia, 160.

3 "... possible intellect and speculative intellect are not two different substances but two states or modes of existence of thought." Coccia, 145.

the determinate form that the indeterminacy of the material intellect acquires once its agency is disentangled from the actuality of its absolute potency, a "cut" that happens whenever the intellect encounters something external to itself. Within such encounter, the intellect that, up until now, has always been considered *unica mens*, a "single mind," acquires then a duplicitous determination: the external element is a "respect" by which the intellect becomes both the thought *of something* as well as the thinking *of someone.*[4] The image, says Coccia, following Averroes, is the "operator of individualization" of the intellect: if thoughts and images exist separately from subjects and objects, and prior to them, it is only thanks to them—and to their "transparency"—that both subjects and objects can be determined and individuated.[5]

4 "It will therefore be said that at this stage the single mind does not lose its nature, but acquires a further determination: it acquires a respect by which it becomes both knowability of a certain singular object and the ongoing activity of thought of this or that individual." Coccia,145.

5 "It is the image, Averroes would explain, the operator of individualisation of the intellect and the place where the absolute transparency of thought becomes knowability of something." Coccia, 146. "It is in contact with the phantasm that the realisation of what can be thought coincides with a double determination: the intellect in fact determines itself simultaneously with respect to an object (it becomes thought in act of a certain object, that is, it acquires a form) and with respect to a subject (it becomes thought in conjunction with a man). In the phantasm, the intellect becomes thought and knowability *of something* and not simply abstract and indeterminate knowledge; and it is only in this relationship that it acquires a real actuality

The Quaternity of Sensible and Intelligible

The image fills the asynchrony for which what is sensible is not necessarily intelligible, and what is intelligible is not necessarily sensible: it is possible to think what has not been perceived yet and perceive what has not been thought.[6] "[I]mages," Averroes writes, "are certain sensibles for the intellect and exist for it *in place* of sensibles during the absence of sensibles."[7] Through the image, the speculative intellect opens a vicarious emplacement, a locus where the sensible and the intelligible can communicate. There is what Coccia calls an "isomorphism" between the processes of sensing and the one of intellection: as Averroes states, to think through the intellect, *formare per intellectum*,

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for *this man*, so much so that it can be said to be not only knowability of something but knowledge acquired by this or that individual. The phantasm represents the principle of objective and subjective determination of thought: the respect by which a thought becomes thought of something and thought of someone. Precisely because the material nature of thought is nothing other than that of an absolute power devoid of any indeterminate form, not only objectively but also subjectively determined, it is only in the bosom of this *relation* that it can acquire such determinations." Coccia, 150.

6   These two directions correspond to history and science as fields of scientific research in Heidegger: "Nature and history become the objects of a representing that explains. Such representing counts on nature and takes account of history." Heidegger, *The Question Concerning Technology*, 127.

7   *Long Commentary*, 405. Emphasis added. "Ymagines enim sunt aliqua sensibilia intellectui, et sunt ei loco sensibilium apud absentiam sensibilium; sed sunt sensibilia non materialia." *Commentarium Magnum*, 506.

is like to perceive through the senses, *comprehendere per sensum*.[8] But how is such a communication between sensible and intelligible realized? How does the image, as a substitute for something missing in place, convert one into the other? The isomorphism between sensible and intelligible, Averroes explains, always requires two couples of *subiecta*:

> One subject in virtue of which the sense is verified (this is the thing sensed outside of the soul) and the other subject in virtue of which the sense is an existing form (this is the first actuality of the sense organ). Hence, the intelligibles in act must also have two subjects, that of the subject in virtue of which they are true, namely, the forms which are true images, and the other in virtue of which the intelligibles are among the beings in the world, and this latter is the material intellect. For there is no difference regarding this between sense and intellect except that the subject of the sense in virtue of which it is true is outside the soul, and the subject of the intellect in virtue of which it is true is inside the soul.[9]

8 *Commentarium Magnum*, 400. Coccia speaks of "isomorphism" in *La Trasparenza delle immagini*, 148 and 170. The image is the place in which the rational can become the real, and vice-versa—it is the locus of their "equipollency," to paraphrase Michel Serres. See: Serres, *Natural Contract*, 24; and Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres*, 55.

9 *Long Commentary*, 316, translation altered. "Quoniam, quia formare per intellectum sicut dicit Aristoteles, est sicut comprehendere per sensum, comprehendere autem per sensum perficitur per duo subiecta, quorum unum est subiectum per quod sensus fit verus (et est

The main difference between the two couples, as Averroes himself stresses, is that while the verification of the sensible lays *outside* of the soul (*extra animam*), the one of the intelligible is *within* (*intra animam*). Therefore, truth is not univocal; there are two different orders: a sensible one, external to the soul, and an intelligible one, that is internal. The first is "efficient" and mutable; it is the one by which sense *becomes* true (*sensus fit verus*), and the latter is "ontological" and immutable since, according to it, thoughts *are* true (*intellecta sunt vera*).[10] Coccia notes

sensatum extra animam), aliud autem est subiectum per quod sensus est forma existens (et est prima perfectio sentientis), necesse est etiam ut intellecta in actu habeant duo subiecta, quorum unum est subiectum per quod sunt vera, scilicet forme que sunt ymagines vere, secundum autem est illud per quod intellecta sunt unum entium in mundo, et istud est intellectus materialis. Nulla enim differentia est in hoc inter sensum et intellectum, nisi quia subiectum sensus per quod est verus est extra animam, et subiectum intellectus per quod est verus est intra animam." *Commentarium Magnum*, 400.

10   "If 'for the intellectual soul, phantasms are like sensible things' and 'the relation of the images present in the fantasy to the intellect is identical to the relation that exists between sensible things and sense', then truth in thought can no longer be defined in terms of an *adaequatio rei et intellectus*. Or rather, the *res* to which the intellect will have to adapt will always be an image. Thought and experience have the same structure but do not divide the same subject or object." Coccia, *La Trasparenza delle immagini*, 170. Internal quotes are from Averroes's *Long and Medium Commentary*. "Modernity is accustomed to thinking of the 'possibility' of science and knowledge as being in immediate relation to the being of things: for science to be generated, reason must be confronted with things themselves. This is the secret dogma that is expressed in the experimental character of modern science. Averroism allows us to correct such an opinion: reason is in perennial relation to human imagination, and what things are to experience—the cause of their genesis and at the same time their very

that such a fourfold can be directly experienced through the mirror, a surface on which "form is not just doubled, but quadruplicated." In the mirror:

> [w]e exist in four different ways at once: we are in fact the body-object that will be reflected in the mirror (it is the form that informs our body), the thinking subject in our soul, the sensible that exists in the mirror and finally the sensible that is perceived by the thinking subject.[11]

The mirror questions the univocal possibility of ontological determination: the same being—*auto*, the self—exists as *subject-of* and *subjective* determination, as *object-of* and *objective* determination.[12]

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form—images are to speculation. The only *empiria* to which reason can measure itself is that of human imagination. Only by contemplating human phantasms does the single mind [*unica mente*] arrive at its true experience." Coccia, 171.

11 "La forme n'est pas simplement redoublée, elle est quadruplée. Nous existons à la fois de quatre façons différentes: nous sommes en effet le corps-objet qui va se réfléchir dans le miroir (c'est la forme qui informe notre corps), le sujet qui pense dans notre âme, le sensible qui existe dans le miroir et enfin le sensible qui est perçu par le sujet qui pense. Il semblerait que l'existence du sensible prouve l'inefficacité de tout rasoir ontologique: le sensible, c'est la multiplication de l'être." Emanuele Coccia, "Physique Du Sensible: Penser l'image Au Moyen Age," in *Penser l'image*, ed. Emmanuel Alloa (Dijon: Les Presses du Réel, 2010), 111.

12 This "self" is what Merleau-Ponty defines as the *body*: "The enigma derives from the fact that my body is simultaneously seeing and visible. [...] Since things and my body are made of the same stuff, it is necessary that my body's vision be made somehow in the things, or yet that their manifest visibility doubles itself in my body with a secret visibility." Merleau-Ponty, "The Eye and the Mind," 354–355.

Within such double duplication, the Platonic divide between sensible and intelligible, the "sharp cut" that separates *eidos* from *eidōlon*, seems to find an unexpected connection in the image. However, in Plato, a similar fourfold can be found in the one sketched by Averroes. A few lines before the famous allegory of the cave, in which Plato seems to postulate an unbridgeable divide between the sensible and the intelligible, the Athenian philosopher introduces another gnoseological model known as the analogy of the divided line.[13] In the dialogue, the character of the Stranger invites his listener to think of a line divided into two sections, in which one would correspond to the visible (*oraton*, literally "what is seen") and the other to the intelligible (*noēton*, literally "what is thought"). Each section would then be cut into two smaller fragments, following the same proportion of the main cut. One section of the visible part—the "lowest" of all the four—corresponds to what Plato calls *eikasia*, literally a "likeness" of something: shadows and reflections. The other segment of the visible, called *pistis*, "belief," "faith," or "trust," i.e., what makes the likeness trustworthy, *likely.* For the intelligible part, one segment is dedicated to *dianoia*, literally a "crossing-through" or an "oblique mode of thought:" a geometric kind of understanding,

13 Plato, *Republic*, 509d–511e.

one that proceeds, so to say, per figure of thoughts. The line's fourth and "highest" segment would correspond to *noēsis*, intellection and understanding.

If, on the one hand, this division strengthens the hierarchic interpretation of images as lesser beings, on the other, it tempers the substantial cut between the truth of ideas and the falsehood of images that the walls of the cave seemed to suggest. Most renderings of this line feature sensible images, with the lowest part as the smallest and intelligible ideas and the highest part as the biggest. However, Plato does not indicate their ratio, and even whether these sections should be equal or unequal is an object of a longstanding dispute.[14] What is important here is not the specific ratios as much as the fact that these ratios are always functional to an *analogia*, to a proportion: for the visible to make sense, the intelligible is necessary, but also the other way around. Truth is not placed in one or the other but can only be *sourced* and *withheld* (Averroes's "eduction") as an invariant proportionality, i.e., as what is preserved through the indeterminate variation of determinate ratios.[15] Plato's divided line should be

14 The question of which segment should be the widest—and even whether they should be unequal (ἄνισα) or equal (ἀν' ἴσα)—has longly been debated. See Plutarch, *Morals* (Boston: Little, Brown, and Company; Cambridge: Press of John Wilson and Son, 1874), 5.

15 "Greek man must gather (*legein*) and save (*sōzein*), catch up and preserve, what opens itself in its openness, and he must remain exposed (*alētheuein*) to all its sundering confusions. Greek man *is* as the

thought of as placed around a circle or a sphere: not just standing by itself, vertically or horizontally, but diagonal or oblique, as a tangent on a circle.[16] This tangent casts what could be considered a "meridian line" on the sphere, and defines as well a horizon on it, a parallel: from the point of view of the visible, what is beyond this horizon, and is thus invisible, is the intelligible; from the point of view of the intelligible what is beyond, and is thus unthinkable, is the visible. Thanks to the mediation operated by the image—sensible or intelligible—the invisible can become visible (through the geometry of the figures of thought, *dianoia*), and the unthinkable can become thinkable (through likeness, *eikasia*). The image converts each pole into a sort of "credit" to be "paid" towards the other, a balance that rests upon a sphere of some non-knowledge, a residue that is in no way directly accountable for. The image expresses an ontological difference, of an irreducible and substantial discontinuity in the intellection of being.

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one who apprehends [*der Vernehmer*] that which is, and this is why in the age of the Greeks the world cannot become picture." Heidegger, *The Question Concerning Technology*, 131.

16   This thesis, hardly detectable in philosophical commentaries, has been suggested in Jiri Stavek, "On the Hidden Beauty of Trigonometric Functions," *Applied Physics Research* 9, No. 2 (March 2017): 57, https://doi.org/10.5539/apr.v9n2p57.

Syntropy of the Image

In its sensible *and* intelligible nature, the image allows the theoretical intellect to synchronize and bring two kinds of temporalities to com-presence: an immutable, eternal one and one made of cycles of generation and corruption. "Every thought in action," Coccia writes, "summarises and abbreviates two different temporalities: that of the eternity which does not tolerate change nor need to engender itself, and that for which it is subject to the rhythm of births and destructions."[17] It is not a matter of a one-way movement between a domain of immutable forms to the "historical" one of novelty and corruptibility or of decay from one to the other. "Rather than thinking of the *passage* from one order to the other—that is, thinking that the intellect passes from the order of the ever-equal (*aeternum*) to that of novelty and from that of unity to that of multiplicity—it is necessary to think of a twofold order of causes," Coccia writes.[18] It is as if the image is crossed by two movements: one branching a single, immutable *ens* into different species, the other integrating this differentiation into unity.

   One of the most potent examples of this double movement and this twofold order of causes and

17   Coccia, *La Trasparenza delle immagini*, 154.
18   Coccia, 148.

temporalities has perhaps been given by Pavel Florensky in an essay in which he investigates the role of the *icon* as the border between the visible and the invisible.[19] Amongst the most evident demonstrations of the "reality" of such a border is, according to Florensky, what happens in the dream and, more precisely, in the experience "of dreams induced by some external cause," i.e., of those dreams in which a noise or some other external stimulus forces the dream and the sleep to a conclusion. In these kinds of dreams, Florensky argues, time seems to run against its natural flow: the stimulus "Ω" that concludes the dream by being *external* to it overlaps, *inside* the dream, to an event "X" towards which all the previous events of the dream converge, and from which they are retroactively justified.[20] The final event, X, becomes the cause of what seems to have happened before it in the memory of the dream. This oneiric event remains nevertheless

19 Pavel Florensky, *Iconostasis*, trans. Donald Sheehan and Olga Andrejev (Crestwood, NY: St. Vladimir's Seminary Press, 1996).

20 "[A]s the dream unfolds for us, we see plainly how the whole chain of causation is leading toward some conclusive event, some *denouement* to the dream's entire system of cause-effect. Let us call this conclusive event X; and let us say, too, that X occurred because of some previous event T, which, in turn, was caused by S, whose cause was R, and so on: going from effect to cause, from latter to prior, from present to past, until we arrive at the dreams starting point, some usually quite insignificant, even meaningless event A: and it is this event A that is understood *in the dream* as the first cause of the entire system." Florensky, 36.

tied to the sensible, which belongs instead to an order for which causes precede ends.

Two consciousnesses perceive the same "real" event: daytime consciousness as Ω and nighttime as X.[21] The one of dreams is an *inverted time*, a "time that flows backward,"[22] in which an event does not result in different consequences but in which the branching happens counter-current, from different causes to a single *telos*, like a tree placed upside-down.[23] "Thus, time in the dream runs, and acceleratedly runs, towards the actual and *against* the movement of time in waking consciousness. Dream time is *turned inside out*, which means that all its concrete images are also turned inside out with it."[24] What in daytime looks like an end and a "death," in the time of the dream "is comprehended as living energy that shapes actuality

21 "[T]he same event is being differently seen by two consciousness: by waking consciousness, it is Ω, while by dream consciousness, it is X." Florensky, 37.

22 Florensky, 35.

23 The figure of the *arbor inversa*, of the capsized tree, is used by Florensky to describe the relationship between the imaginary and the real: "directly beneath the surface of the earth, foliage was growing but with its roots up, not down, so that the same green and succulent foliage and grass were there, just as in the cemetery—but even more green and succulent; and the same trees were there, and their great crowns grew down and their roots reached up, and the same birds sang in the same azure sky where the same sun shone—all of it more radiantly beautiful than in our world on this side." Florensky, 42.

24 "[T]hat means we have entered the domain of *imaginary space*." Florensky, 41.

as its creative form."[25] If, in the light of the day, the same event seems to be crossed by an *entropic* time, one in which a cause dissolves in irreversible effects, at night, the image of such an event is crossed by an inverse flow of what could be perhaps called a *syntropic* time—a time that not only flows in the opposite direction of the entropic one, but that can weave the dispersive transformation (*tropē*) of the first back into a unity (*syn*).[26] Entropy and syntropy are but two directions or two "currents" of time articulated by the two "verses" of the image:

> Once we understand this difference, we can easily distinguish the 'moment' of an artistic image: the descending image, even if incoherently motivated in the work, is abundantly teleological; hence, it is a crystal of time in imaginal space. The image of ascent, on the other hand, even if bursting with artistic coherence, is merely a mechanism con-

25 Florensky, 41.

26 *Syntropy* is a term coined by physicist Luigi Fantappiè in the 1940s to account for phenomena that seemed to run against the entropic flow of time, such as biological ones. According to Fantappiè, syntropy would have provided the ground for a "unitary theory of the universe" and a reconciliation between natural sciences and theology. The notion is contemporary and almost identical to Erwin Schrödinger's one of *negative entropy*; however, since both physicists were elaborating their theories in parallel during wartime, an exchange between them would have been quite unlikely. See: Luigi Fantappiè, *Che cos'è la sintropia: principi di una teoria unitaria del mondo fisico e biologico e conferenze scelte* (Rome: Di Renzo, 2011), and Erwin Schrödinger, *What Is Life? The Physical Aspect of the Living Cell* (Cambridge: Cambridge University Press, 1992).

structed in accordance with the moment of its psychic genesis.[27]

The temporality of the dream is nevertheless not a mere geometric mirroring of the daytime one: in the dream, Florensky notes, time runs at an *accelerated* speed since the whole cascade of converging events that happen in there cannot be dreamt but instantaneously, at the "infinite speed" of the time that unfolds within the instant of the external event Ω that "causes" and, at the same time, ends the dream. The coincidence between Ω and X—the fact that one is the *image* of the other—and the connection between the two orders of time that this coincidence holds is a way for Florensky to demonstrate the power of the icon to pierce and, at the same time, to preserve the border between sleep and wakefulness, day and night, consciousness and unconsciousness—and, ultimately, between the visible and the invisible. As an oneiric image, the memory of a dream seems to correspond to what Florensky defines as "an *instantaneous* transition from one domain of spiritual life to another,"[28] to

27 "When we pass from ordinary reality into the imaginal space, naturalism generates imaginary portrayals whose similarity to everyday life creates an empty image of the real. The opposite art—symbolism—born of the descent, incarnates in real images the experience of the highest realm; hence, this imagery—which is symbolic imagery—attains a *super-reality*." Florensky, *Iconostasis*, 45.

28 Florensky, 34. The translation has been edited following the Italian version, in which "instantaneous" (in italics also in the text) has

what he eventually names as the title of his essay, *iconostasis.*[29]

The term *stasis* evokes a sense of stability, and indeed the Greek term (στάσις) foremost indicates a placing, a "stating," both in the figurative sense as well as in the concrete, architectural sense of edifying.[30] The same term designates a party or a faction, and it can be used for what would seem to be its opposite meaning: sedition and discord. *Stasis* is not only a "stable" placing but also the com-presence of the fact that such a placing always happens upon the risk of a civil war, that every decision for a party carries with itself a "state" of fundamental undecidedness. Within the stasis, the icon is therefore not just a "passive image" of eternal truth—or, in the case of Florensky, of a divine being—but rather a door or a window to that,[31] not a *necessary*

been preferred to "immediate" and "spiritual life" to "psychic activity." The Italian *editio* results, in general, more accurately translated; the choice of the terms is here supported by Florensky's reading of the work of Karl du Prel, professor of philosophy at the University of Munich. See: Pavel Florenskij, *Le porte regali. Saggio sull'icona* (Milan: Adelphi, 2021). The instantaneous and inverse time corresponds to what Corbin defines as the *tempus discretum* of angelology and hierohistory.

29 "The wall that separates two worlds is an iconostasis. One might mean by the iconostasis the boards or the bricks or the stones. In actuality, the iconostasis is a boundary between the visible and invisible worlds." Florensky, *Iconostasis,* 62.

30 Henry George Liddell. Robert Scott. *A Greek-English Lexicon. Revised and augmented throughout by Sir Henry Stuart Jones with the assistance of Roderick McKenzie.* (Oxford: Clarendon Press. 1940).

31 "Destroy the material iconostasis and the altar itself will, as such,

representation, but a paradox in which a *non-contingency* is *contingently* brought to light.[32] If, as Aristotle writes, the difference between *epistēmē* and *technē* as ways in which the soul "achieves truth by affirmation or negation"[33] is one where the first is concerned with invariances and with what happens by necessity, and the latter with "what is allowed to have a different way,"[34] then the image is the border between one and the other.

Aggregatum

In its nature of border, the image cannot but appear compromised and misleading. "Existing in a different way from the one of objectivity, images lay the foundations, on the one hand, for what we call

wholly vanish from our consciousness as if covered over by an essentially impenetrable wall. But the material iconostasis does not, in itself, take the place of the living witnesses, existing *instead* of them; rather, it *points toward* them, concentrating the attention of those who pray upon them—a concentration of attention that is essential to the developing of spiritual sight. To speak figuratively, then, a temple without a material iconostasis erects a solid wall between altar and temple; the iconostasis opens windows in this wall." Florensky, *Iconostasis*, 63.

32 "If I have a dream in which there is a gunshot, and in the room next to mine there really was a gunshot, or a door slammed, can one doubt the *non-contingency* of that dream?" Florenskij, *Le porte regali*, 74. The English edition translates, "there is no doubt that the dream was accidental," conflating the notion of non-contingency into the one of accidentality. Florensky, *Iconostasis*, 37.

33 "ἀληθεύει ἡ ψυχὴ τῷ καταφάναι ἢ ἀποφάναι." Aristotle, *Nicomachean Ethics*, 1139b.

34 "τὰ δ᾽ἐνδεχόμενα ἄλλως." Aristotle, 1139b.

fiction, and on the other hand, for the possibility of error," as Coccia writes. "The error is possible because the image (the Being of knowledge) is transcendentally exterior to soul and things."[35] Therefore, the image's nature appears mixed, impure, if not even "morally corrupted." The image acts like a membrane that separates truth from error, being from non-being, and the proper from the improper. However, precisely by separating them, it also participates in both: to recall the words of Plato, the image stands in the impossible position—the *a-topia*—in which *to mē on*, "what is not," is intertwined with *tō onti*, with "what is." Moreover, if, with Aristotle, proper and improper are understood in terms of *oikeia*, of familiarity and domesticity, the image is then not only what is placed within the perimeter of the house and on its walls but, by extension, the fragile layer that separates intimacy from publicness.[36] Here, the image becomes clothing, habit,

35 Coccia, *Sensible Life*, 20.
36 "It is a movement that does not affect the being of the two elements but that of the relationship alone: neither a new man nor a new thought is generated, but the space between man and intellect is irreparably changed. The phantasm does not generate a new form of thought or a new act of thought: rather, it establishes a relation (*habitudo*) or a certain attitude (*aptitudo*) in us, thanks to which we can say that we are united with the unique intellect and this becomes the principle of our operations. [...] The phantasm becomes the place where the sensible and the intelligible, the individual and the intellect, come together in a relationship of habit, of intimacy." Coccia, *La trasparenza delle immagini*, 157.

custom, and ornament—but, at the same time, it can turn into prejudice, moralism, and tinsel. The image is *doxa*, understood in the full ambiguity of its meaning, as both "opinion" and "honor," "glory:" something deeply entangled with light but that nevertheless never really coincides with it.[37] It is not by chance that Corbin relates the imaginal with what the tradition of Islamic theosophy calls the *barzakh*, "an ideal separation between two neighboring things," such as "the boundary between the zone in the shadow and the one lit by the sun."[38]

Precisely through its impure nature of boundary, the image is what articulates an "economy of exchange" between subject and object, sensible

[37] "An icon is the same as this kind of heavenly vision; yet it is not the same, for the icon is the outline of a vision. A spiritual vision is not in itself an icon, for it possesses by itself full reality; an icon, however, because its outline coincides with a spiritual vision, is that vision within our consciousness; finally, therefore, the icon—apart from its spiritual vision—is not an icon at all but a board. Thus a window is a window because a region of light opens out beyond it; hence, the window giving us this light is not itself "like" the light, nor is it subjectively linked in our imagination with our ideas of light—but the window is that very light itself, in its ontological self-identity, that very light which, undivided-in-itself and thus inseparable from the sun, is streaming down from the heavens. But the window all by itself—i.e., apart from its relationship to the light, beyond its function as carrier of light— is no longer a window but dead wood and mere glass." Florensky, *Iconostasis*, 64–65.

[38] "Le *barzakh*, écrit Ibn'Arabî, est une séparation idéale entre deux choses voisines, qui jamais n'empiètent l'une sur l'autre; c'est, par exemple, la limite qui sépare la zone d'ombre et la zone éclairée par le soleil." Henry Corbin, *En Islam iranien*, Vol. IV (Paris: Editions Gallimard, 1991), 107.

and intelligible. This fourfold can be extended to "space" and "time." The image provides a "verse" through entropic and syntropic time; within the "face" of the image, both directions are simultaneously present: the image acts as a *fulcrum* or as a focal point to which time converges and from which it departs.[39] Simultaneously, it articulates a here and there, an outside and an inside, a closeness (*philia*) and a distance (*xenia*).[40] As a "thought in act," the image "is not the expression of a subjectivity but the reality of a *composition* with something *that one is not*."[41] The Averroistic tradition describes such a hybrid, spurious nature as a *compositum* or *aggregatum*:

39 It is why Fantappiè claims that some entropic phenomena can falsely appear as syntropic whenever they are calibrated to converge towards a particular end. It is the case of technics that, in the fulcrum of this convergence, appears indistinguishable from life. This point of convergence is both a fulcrum, as it balances the different phenomena, and a focal point since the balancing happens via the trajectory convergence given by the light-speed expansion of different spherical waves. The link between this temporal aspect of the image and the spatial one of distance can be grasped in the connection between Fantappiè's technics as an apparently syntropic temporality and Benjamin's technical reproducibility as what immanentizes distances (see following footnote).

40 The image is the place in which Benjamin's *aura* — "the unique appearance of a distance, however close it might be" — is lost to technical reproducibility, where irreproachable distance becomes approachable, where the cultic value decays to exhibition value. It is all of this, and, *at the same time*, it is the locus where technical reproducibility becomes 'auratic' again, where the exhibition value becomes cultic, and what is approachable becomes distant. Walter Benjamin, *Das Kunstwerk im Zeitalter seiner technischen Reproduzierbarkeit: drei Studien zur Kunstsoziologie* (Frankfurt am Main: Suhrkamp, 2003), 15.

41 Coccia, *La trasparenza delle immagini*, 156. Emphasis added.

the image is a composite, an aggregate, an "alloy" of different elements, whose peculiar composition corresponds to a disposition, an ability to catch and preserve something other than themselves, "as iron is prepared through luster [*tersitudinem*] to receive light and other colors and forms."[42] Concepts are, therefore, not something created *ex nihilo* but something engendered by this special reception— through that "metabolism" of possession through dispossession that characterizes *mathesis*.

42   Averroes, *Super libros de physico audito*, VIII, c. 20, (Apud Iuntas, Venetiis 1562), as quoted in Coccia, *La Trasparenza delle immagini*, 156–158. As *aggregatum*, the image comes here close to a *meteora alloy*: "photovoltaics is of the same scale but inverse to nuclear physics, in that it does not seek to master the concentration and maximization/minimization of energy, as the latter arguably is; its mastery is directed at learning to 'conserve' energy according to nature's given wealth in how forms of bodily organization conserve and metabolize what we can call *meteora alloys* of energy and information ('impure particles' of Serres's intra-material logicial, these mixtures of hardware and software)." Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres*, 175.

NOMOS OF THE GARDEN

VIII
Imaginal Contract

The Transcendental-Projectual

It should be more apparent by now how the image is not just a "representation" of something but how instead, its representativeness is crossed by a double movement and is the *complexio*—a true "theological paradox"—of two different orders of causes, two temporalities. This cross-movement is a mirroring in which no "original" versus a "copy" can be identified. What is perceived as real from one side is imaginary for the other, and vice-versa. From the point of view of the daytime, the time of the dream seems to accelerate to an infinite speed, to become imaginary and immaterial as light. Within the dream, though, this time unfolds as

if it were real, and it is instead the "actual" event to be instantaneous and thus "imaginary."[1] As an iconostasis, the image is the boundary between the visible and the invisible, the mutable and the immutable. However, these two positions—like the one of the subject and of the object—are not prior to the image. Instead, the image is the *principle* that articulates and "places" them, depending on the "verse" from which it is looked at. Such a priori of the image helps to grasp its *transcendental* measure:[2] a representation of something transcendent (a non-contingency) that nevertheless determines the (contingent) conditions of observability of it—and that is thus determined as much as determining. Its nature of border makes it so that, within the image, there is always a here and a beyond, an immanent and a transcendent, an approachable and an unapproachable, and yet this very division is *immanent* to the image itself. The image is, in other words,

1   "[T]hat means we have entered the domain of *imaginary space*. The very same event that is perceived from the area of actual space as actual is seen from the area of imaginary space as imaginary, i.e., as occurring before everything else in teleological time, as the goal or object of our purposiveness." Florensky, *Iconostasis*, 41. It can be translated in mere physical terms as a mental experiment: what would happen once an observer starts to travel at the speed of light? Would not all the "matter" she observes turn itself into light, and the light she reaches the speed of, into matter?

2   "But, taken in themselves, these dream images have a unique, incomparable time, a time that cannot be measured in the terms of the visible world, a 'transcendental' [measure of] time." Florensky, 34.

the operator of a unilateral synthesis: only *within* the immanence of the image can a division—and thus a connection—between the immanent and the transcendent be outlined.[3]

Such transcendental measure is an "objective" one insofar as it does not belong to the transcendental form of knowledge of a Kantian subject but is precisely autonomous from it. "Every image," writes Coccia in *Sensible Life*, "is the Being of knowledge that acts outside of the subject, a sort of *objective unconscious*."[4] Despite not holding immanently in itself any object—neither the consciousness of something other than itself (*Bewusstsein*) nor the consciousness of itself (*Selbstbewusstsein*)—it nevertheless holds in itself a potential object. It thus constitutes a transcendental form of its knowability. As it is prior to the division between subject and object, this knowability is also independent of subjective perception: "It is a form of *objective* unconscious because it does not represent a mode of subjectivity; despite defining the virtuality of

3   "This book proposes to reconsider architectural form in light of a unitary interpretation of architecture and the city. This unitary interpretation is put forward via the paradox of a unilateral synthesis: a unitary interpretation made from *within* projects on architectural form itself." Pier Vittorio Aureli, *The Possibility of an Absolute Architecture* (Cambridge, Massachusetts: The MIT Press, 2011). For Florensky, too, it is only in daytime consciousness that this image can be contemplated as a memory, and is then "transposed" according to "the temporal sequence of our visible world." Florensky, *Iconostasis*, 34.
4   Coccia, *Sensible Life*, 52.

every subjective perception, it is the actualization of a sensation that takes place *outside* the organ of perception."[5] Describing it as an "outside" implicitly reveals the "spatial" or "positional" character of objectivity. "Images," Coccia insists, "have nothing to do with psychology because they exist first and foremost outside of ourselves, outside our consciousness, in the clouds, the air, on the surface of mirrors, and only later do they enter into human life."[6] The objectivity of the image must therefore be understood not in a dualistic logic of object versus subject, but instead as a Heideggerian *Gegenständlichkeit*, as the outcome of a *Stellung*—a positioning—that is therefore implicitly "disposed" by an *Entwurf*.[7] The image here conditions objectivity as its transcendental measure: the image casts *in advance* the way the object is placed *before* the sub-

5 Coccia, 52.
6 Coccia, 52. "Yet, this supernumerary space remains the condition of possibility for every knowledge and every culture, in all forms. Psychology seems to find here the reversal that makes it true. It is not about denying that the image enters into every psychological experience, because it can exist in anima, within it. In penetrating, however, a foreign element is introduced that opens a nonpsychological, nonsubjective, and nonobjective space that will establish the basis for all intentional acts. The subject nourishes itself with images, and it is for this—exactly for this—that it is able to divorce from objects and from itself. Since the genesis of the sensible takes place outside of the soul, the origin of every psychological phenomenon does not have a psychological nature. At the foundation of every imaginative, cognitive, and psychological experience there is an element that has no psychic or mental nature: There is the image." Coccia, 53.
7 Martin Heidegger, "The Age of the World Picture," 120.

ject. Rather than objective (or subjective), the image is, therefore, *projectual.*

The "primacy" of the image is both positional and temporal: by casting in advance, by pro-jecting, the disposition that the image carries within itself assumes a temporal character; it becomes "historic."[8] If, in the "spatial" articulation of object and subject, the image is what stands before them, what faces it instead in a "temporal" one? What does the image *anticipate*? The project—as Cacciari stressed—appears as an "anticipation of chance:" it is chance "objectified," to be made *Gegenständlich* in the projectual character of the image. "Discounted," taken into account within the "meshes" of the image-project,[9] chance becomes here objective: it can be handled as a *case*, as something that, while "falling" (*casus* is literally "the fallen") stands there, independently from subjects. The image is, therefore, not only, as an icon, the boundary between the visible and the invisible, but also, in its projectual

8   This transition is analogous to the one between myth and history. Therefore, in this perspective, the image is "epic," as *epos* is that particular stage in which myths and legends begin to position themselves in a historical context. Is not the "word" itself—this is, in fact, the literal meaning of *epos*—the *aggregatum* of Name and language, what belongs to both domains?

9   "[I]l caso *anticipato* non sorprende più né irrompe, è a priori 'scontato' nelle maglie del progetto." Cacciari, *Progetto*, 94.

character, the locus in which what is unforeseeable becomes foreseeable.[10]

However, the image's "anticipation" does not lay claim to being exhaustive and totalizing as the one enacted by the techno-scientific project: by marking a boundary, a division between an "inside" (determinate, proper, *oikeia*—"whatever is the case," in Wittgenstein's language)[11] and an "outside" (indeterminate, improper, *ouk oikeia*, or "whatever is not the case"), its exactness is always set relative to the contingency of this division, its *ratio* is always to be understood as part of an analogy. The image does not operate a total conversion of the unforeseeable into the foreseeable. Instead, it establishes a front, a *verse*, an orientation through which chance can be filtered into cases.

Imago Templi

Orientation, locus (as a determination of a border), projectual and "constructive" relation to chance: it starts to appear how the primacy of the image is not a matter of phenomenology or epistemology, as much as one of *architecture*. An embodiment of

10 "And in a sense Art [τέχνη] deals with the same objects as chance [τύχη], as Agathon says: 'Chance is beloved of Art, and Art of Chance.'" Aristotle, *Nicomachean Ethics*, 1140a.

11 "Die Welt ist alles was der Fall ist." Ludwig Wittgenstein, *Logisch-philosophische Abhandlung: = Tractatus logico-philosophicus* (Frankfurt am Main: Suhrkamp, 2016), Proposition 1.

the architectonic nature of the image can be found right at the core of Corbin's *mundus imaginalis*. The imaginal cannot be conceived outside of what he calls the *Imago Templi*, the "Image of the Temple." This image occupies the same position as the one connecting speculative intellect and separate mind in Averroes:

> The case of the *Imago Templi* at 'the confluence of the two seas' implies a situation which is above all *speculative*, in the etymological sense of the word: two mirrors (*specula*) facing each other and reflecting, one within the other, the Image that they hold. The Image does not derive from empirical sources. It precedes and dominates such sources, and is thus the criterion by which they are verified and their meaning is put to the test.[12]

The "two mirrors" mentioned by Corbin are what he describes as the *Imago Animae* and the *Imago Terrae*, the "Image of the Soul" and the "Image of the Earth," and, in other points of the text, as the *Imago Caeli*, the "Image of the heavens" and *Imago Templi* itself.[13] Corbin's image seems to undergo a similar

12 Corbin, *Temple and Contemplation*, 267. Translation altered: "confluence" has been preferred over "meeting-place," as there seems no need to deviate from the French "confluent."
13 "I once had occasion, in relation to the Mazdean transfiguration of the Earth by the *imaginal* perception of the Light of Glory (the *Xvarnah*), to speak of an *Imago Terrae* as a mirror reflecting the *Imago Animae*." Corbin, 267. And further: "We were speaking earlier, with reference to the *Imago Templi*, of two mirrors which face each other

double duplication to the one described by Coccia: the "confluence of the two seas," in the words of Corbin, the locus in which the temple becomes the image of the heavens and where the heavens become the image of the temple, the place in which the earth becomes the image of the soul, and the soul of the earth.

Furthermore, the encounter and mixture—the "confluence"—between two different temporalities or order of causes typical of the image as iconostasis is also present here: within Corbin's *Imago*, the incorruptibility of the soul meets the mundanity of the earth, and the "descending," eternal order of the heavens meets the "ascending" and continuously renovated one of the Temple. Within the *Imago Templi*, history, or what comes to pass "in the continuous time of chronological causality," cannot be conceived but entangled with what Corbin defines as *hierohistory*, a "sacred history."[14] As the

and reflect within each other the same Image. It is one of these mirrors, the *Imago caeli*, that has been destroyed: nothing less than this, certainly, but also nothing more. But this destruction of the *Imago caeli*—of the Temple crypt—was made possible only by the shattering of the symmetry exhibited, first, by the triadic structure of the celestial temples (Intelligence, Soul, and subtle body of the Sphere), and, second, by the triadic structure of gnostic anthropology: spirit, soul and body." Corbin, 275–276.

14   "The only history we are concerned with here—sacred history or hierohistory or hierology—does not come to pass in the continuous time of chronological causality which is the time of secular history. Each manifestation of the *Imago* constitutes a unity in itself, without requiring a 'transfer of power'. It is itself its own time." Corbin, 268.

point of encounter of the two, the image withholds in itself a unity of "discontinuous time" (*tempus discretum*) that irrupts and "breaks" in historical time while connecting and rejoining it as well with an eternal dimension.[15] It is through these "ruptures" that history is liberated by a deterministic view and is opened up into what he defines as a "parabolic" dimension: instead of the "rectilinear perspective of secular history," in which a "horizontal dimension" is the mere expression of what is set by a "vertical" one, the time that the image actively casts puts these two dimensions in communication with each other, and that does so through a *curvature* (as

15 "The successive times of these manifestations are, rather, part of the *tempus discretum* of angelology, a discontinuous time. For this reason the link to be discerned between them is amenable neither to historical criticism nor to historical causality. On each occasion, what occurs is a *re-assumption* by the soul, a decision, a *reconquest*. These unities of discontinuous time are the times of the *Imago Templi*: they irrupt into our own time and confer the dimension of eternity upon the scissions they produce." Corbin, 268. The *Imago Templi* itself is presented as a (linguistic) invariance: "I use the term *Imago Templi*—Corbin explains—in order to typify and stabilize a specific intention in a Latin form *ne varietur*, thus avoiding the vicissitudes of translation." Corbin, 268. "Absolute knowledge—the exhausted actuality of all thoughts and ideas—does not in this case coincide with the form that reason takes in a particular epoch or at the end of history, but simply expresses the relationship in which it does not cease to maintain itself in relation to the whole of humanity. Tradition is nothing but the rhythm that the death of the subject imposes on thought: there is tradition only because there is potency in humanity, and humanity is nothing but the potency and inexhaustible possibility of infinite individuals." Coccia, *La trasparenza delle immagini*, 74. Translated from the Italian.

in the case of the analogical encounter of parallel and meridian).[16] The conflation of this architecture into dualism corresponds to the blinding of a whole *sensorium*; it leads to a vision of the world that is no longer guided by the architectonics of the *Imago* and in which the cosmos is no longer perceived but as "anything apart from immanent and purely mechanical laws."[17] In such a setup, the image is not

16   "It is through this rupturing of time that the truth of all history can finally shine forth; for through it history is liberated and transmuted into parable." Corbin, *Temple and Contemplation*, 268. "For the same reason, it is not enough to say that History has two dimensions—one vertical and one horizontal—in the sense that it must be interpreted not merely in terms of a 'final end' (*eschaton*) but also in terms of an 'up above'. Precisely here one must specify that a vision of History which acknowledges that the events that constitute it possess a celestial archetype, confers on this History a *parabolic* dimension, a dimension which elevates all events to the level of parables. Eschatology cannot simply be an event which one fine day ends the rectilinear perspective of secular history." Corbin, 296. It would be interesting to compare Arendt's distinction, in the context of politics, between goals, ends, and meaning: the *écart* between goals and ends could perhaps be compared to the one of a parabolic trajectory in a 'ballistic' understanding of the project—as a literal *pro-jectum*, throwing forward. Hannah Arendt, "Introduction *into* Politics," in *The Promise of Politics*, trans. Jerome Kohn (New York: Schocken Books, 2005), 193–194.
17   "From that moment on, the way lay open to a vision of the world which, being no longer a vision governed by the *Imago Templi*, was to end by no longer perceiving in the *cosmos* anything apart from immanent and purely mechanical laws. Thus man had lost his own soul as the heavens had lost theirs: there was no longer an active Imagination to secrete and reflect in the *sensorium* the metaphysical Images of intelligible realities, revealed to it on its own level. What remains is an imagination whose products are now declared to be merely *imaginary*, the fantastic productions of the *phantasia*—in short, unreal." Corbin, *Temple and Contemplation*, 276.

projectual anymore but merely *projective*. The representation of the world, its "model," or the picture that it produces, assumes a normative and self-legitimizing character. In such a picture, *sense* (as a "projection" of meaning) is taken as a given; for this reason, no sense-making and no orientation are possible. As Corbin affirms, "When the *Imago Templi* is destroyed, one is no longer even aware of being in the depths of a crypt. The world is 'disoriented': there is no longer an 'Orient.'"[18]

The architecture of the *Imago Templi* does not receive its stability from the outside, as something pre-determined to it. Instead, by articulating in itself the border between outside and inside, between mutable and immutable, it constitutes its stability—a character also exemplified by Corbin's choice of not translating the term but of placing it within his discourse as a *ne varietur*, as a linguistic invariance that receives its meaning from its surroundings while, at the same time, being able to "orient" them.[19] The *Imago Templi* can be translated into different languages, yet the invariance that its Latin form articulates is not a claim to an "original" form: after all, such invariance is expressed as the *Image* of the Temple and not as the Temple itself.

18 Corbin, 277.
19 "I use the term *Imago Templi* in order to typify and stabilize a specific intention in a Latin form *ne varietur*, thus avoiding the vicissitudes of translation." Corbin, 264.

Furthermore, the architectonic nature of Corbin's *Imago* lies in the fact that it is not just an image he is speaking of but that a temple is the "object" of such an image. Not only is the temple an architecture in itself—if not *the* architecture par excellence—but it is also an architecture that is profoundly linked with the notion of the image here put forward: way before being a "home for the gods," as it has often been described,[20] a temple is first and foremost an articulation of a field of vision. As Corbin writes at the end of his essay:

> It is significant that the Latin word *templum* originally meant a vast space, open on all sides, from which one could survey the whole surrounding landscape as far as the horizon. This is what it means to *contemplate*: to "set one's sights on" Heaven from the temple that defines the field of vision.[21]

Temple and contemplation: the connection between the two is not just one of etymologic order. The temple itself is an architecture of contemplation, and contemplation cannot happen but architectonically: temple and contemplation spring both from a *temenos*, "a piece of land" that could be

20   On the reception of the temple as a "home for the gods" see: Marco Biraghi, "Delle cose nascoste nell'architettura sin dalla sua fondazione", in *Il significato nascosto dell'architettura classica. Speculazioni sull'ornato architettonico da Vitruvio a Venturi*, eds. George Hersey (Turin: Bruno Mondadori, 2001), vii–xxxii.
21   Corbin, *Temple and Contemplation*, 386.

"cut off and assigned as an official domain" as well as "marked off from common uses and dedicated to a god."[22] The temple formalizes the connection between the piece of land as a sacred precinct and a corresponding "cut" of the celestial sphere; it is the locus in which the Earth (*Terra*) and the Heavens (*Caelum*) meet—in this sense, perhaps, the term "contemplation" can be understood as: the joining (*cum-*) between these two *temenoi*, these two precincts.

So understood, the temple is a locus which is here both architectural and architectonic: the Temple is an architectural "realization" of the *Imago*, and the image, in its Averroistic "disposition," articulates the temple's architectonics. The image uproots the Temple from its necessarily contingent position—from it being *one* Temple, impossible to be edified elsewhere or even to be rebuilt—and "elevates" it to the level of the imaginal, where it can still exist as the one Temple and yet be "accessed" anywhere and anytime. Corbin specifies that the *Imago Templi*'s *temenos* "exists at the level of the imaginal world."[23]

22 Henry George Liddell. Robert Scott, *A Greek-English Lexicon. Revised and augmented throughout by Sir Henry Stuart Jones. With the assistance of Roderick McKenzie* (Oxford: Clarendon Press, 1940). Both *temple* and *temenos* derive from *temnein*, "to cut," and the same etymological root can be found in *tempus*, that in Romance languages indicates both "time" and "weather," pointing hence at that *tempus discretum* of which Corbin speaks.
23 "In speaking of the *Imago Templi*, I intend to remain at the level

If the study is the activity through which the individual mind connects to the material intellect and elevates itself to the potency of the latter, the temple is the imaginal locus in which this can happen. After all, the temple is a place of sacrifices and libations: not only what hosts them as a "function" but, as George Hersey pointed out, the temple is their very *product*—a "troping ornament."[24] In it, the irreversible is celebrated as such and thus elevated to what from the outside appears as a "symbolic" order, something able to withhold—i.e., to resist but simultaneously to participate—irreversibility by giving it a "face."

Edification and Kenosis

The coincidence of the "Image of the Temple" with a *tempus discretum* points to the fact that it is not just a matter of two different temporalities or order of causes that "flow together" (*confluere*) within the image. Image and temple are undoubtedly a matter of time, yet the imaginal *temenos* from which this time flows is also—and predominantly—a matter

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of a phenomenology, a "temenology" if I may risk the word (from the Greek *temenos*, a sacred precinct), which exists at the level of the imaginal world (*'alam al-mithal*), the world in-between (*barzakh*), at 'the meeting-place of the two seas.'" Corbin, *Temple and Contemplation*, 267.
24   George Hersey, "Troping Ornament," in *The Lost Meaning of Classical Architecture. Speculations on Ornament from Vitruvius to Venturi* (Cambridge, Massachusetts: The MIT Press, 1988), 1–10.

of space. Space and time are, here, not dual opposites, and they are not a continuum either: in line with Kant's vulgate, they are indeed transcendental, and differently from it, they are not subjective forms but projectual ones. In its "temenological" nature, the *tempus discretum* of the image can be read as another articulation of crisis as an "entropic boundary," and the boundary of the temple, the *temenos*, is the "spatial" correspondent of the "temporal" boundary set by crisis.

In ancient Greek, *krisis* meant a separation, a distinction often associated with a politico-juridical order: *krisis* is a judgment in court or an election, the decision for a "head," either to promote or to punish. Only at the last position do we find the meaning of *krisis* listed as an "event," a sudden change for better or the worse. Today, *crisis* is mainly associated with a moment in time, an unforeseen event that marks a chronological boundary, a *critical* point.[25] Economy and ecology—disciplines that, through their reference to the household domain, tend to follow a *managerial* paradigm—are often associated with such words, for instance, when speaking of economic and ecological crises. Interestingly, in both cases, crisis represents a point of

25 κρίσις, in Henry George Liddell, *A Greek-English Lexicon. Revised and Augmented throughout by Sir Henry Stuart Jones with the assistance of Roderick McKenzie* (Oxford: Clarendon Press, 1940).

no return, that is to say, a limit after the crossing of which a *balance* of what has been *accounted for* (in this case, financial or environmental resources) is not possible anymore; in other words, crisis outlines here a closed boundary out of which no *rendering*—no "giving back," no *restoration* of debt—is now possible. However, inside this boundary set and "framed" by crisis, the balance is attainable: as we can *render* this balance, we can *picture* it. We see here the connection between crisis and world pictures; it is not surprising that one of the first to make use of the term, Max Weber, conceived of world images as something similar to a horizon of redemption (*Erlösung*), which is nothing less than a religious correspondent to the restoration of debts.[26] The "time" delimited by crisis is a space of

26   "Aber eine spezifische Bedeutung erlangte die Erlösung doch erst, wo sie Ausdruck eines systematisch-rationalisierten 'Weltbildes' und der Stellungnahme dazu war. Denn was sie ihrem Sinn und ihrer psychologischen Qualität nach bedeuten wollte und konnte, hing dann eben von jenem Weltbild und dieser Stellungnahme ab. Interessen (materielle und ideelle), nicht: Ideen, beherrschen unmittelbar das Handeln der Menschen. Aber: die 'Weltbilder', welche durch 'Ideen' geschaffen wurden, haben sehr oft als Weichensteller die Bahnen bestimmt, in denen die Dynamik der Interessen das Handeln fortbewegte. Nach dem Weltbild richtete es sich ja: 'wovon' und 'wozu' man 'erlöst' sein wollte und – nicht zu vergessen: – konnte." Max Weber, *Die Wirtschaftsethik der Weltreligionen: Schriften 1915–1920. Konfuzianismus und Taoismus*, ed. Helwig Schmidt-Glintzer and Petra Kolonko (Tübingen: J.C.B. Mohr (Paul Siebeck), 1989). See also: Dimitri D'Andrea, "Immaginazione, immagini del mondo e tarda modernità" (n.d.), URL: https://www.academia.edu/20062432/Immaginazione_immagini_del_mondo_e_tarda_modernità (23 Feb 2022).

possible *neutralization*, as balance and redemption can only be attained inside a horizon in which the contrasts of forces can be equalized to zero. Whatever cannot be *accounted* in this space or brought to such balance appears from its perspective as disorder, chaos, evil—an evil from which this space relieves, liberates, *ab-solves.* The connection between annihilation and absolution appears in its "full evidence" both in Christian theology and in the historical translation of Hegel's notion of *Aufhebung,* of a "sublation" that preserves what is being neutralized.[27] Nevertheless, in Corbin's account, it is not a god nor the Spirit of History to be sacrificed or sublated, but the Temple and its architecture. In the "focus" of the *Imago,* the Temple is simultaneously being destroyed and reconstructed: "The two images, of the destruction and the rebuilding of the Temple," Corbin notes, "are inseparable one from the other."[28] Indeed, the reconstruction here alludes to a process of restoration that, in this case, is not just worldly but *cosmic—apokatastasis pantōn,* a "universal restitution," as Leibniz once wrote[29]—and is, in this sense, not too far from the

27 Georg Wilhelm Friedrich Hegel, *The Science of Logic,* trans. George Di Giovanni (Cambridge; New York: Cambridge University Press, 2010), 81.

28 Corbin, *Temple and Contemplation,* 264.

29 Gottfried Wilhelm Leibniz, *De l'Horizon de la Doctrine Humaine:* Ἀποκατάστασις πάντων *(La Restitution Universelle),* ed. Michel Fichant (Paris: Librarie Philosophique J. Vrin, 1991), v.

ambition of universality of both Christianity and Hegel's philosophy.

Nevertheless, the architectural-and-architectonic image of the Temple allows for a hermeneutics of this notion that sets itself off from such a totalizing claim: the neutralization appears here as the algebraic correspondent to an architectonic *emptying*, to the constitution of a void the nothingness of which at the same time *makes room* inside this "chaos," it opens up an ordered space. At this point, the image of the Temple "touches" the one of the garden: the image of the new temple corresponds to the one of a "restored garden of Eden,"[30] in the words of Corbin. The garden is an architecture that acts upon nature without making *a tabula rasa* of it; it instead creates a "fence," a boundary out of which all entropy must be pushed. Like the one of the temple, this boundary is both spatial and temporal: weeds stand *outside* of its perimeter. They are also *cut away* whenever they appear inside, as the garden does not exist without the maintenance carried out by its gardeners. Like the *Imago Templi*, the "image" of the garden is, therefore, pre-specific to a spatial or "geometrical" understanding of vision and a "historic" conception of time.

30   Corbin, *Temple and Contemplation*, 300.

IX
Gestaltung der Umwelt

Landscape and Environment

In his inaugural lecture at the Collège de France, landscape architect Gilles Clément introduces the garden as a sort of *imago*, in a similar way to how Corbin described it: the garden is what appears in the double reflection of two images, the ones of "landscape" (*paysage*) and of "environment." *Landscape*, according to Clément, is "what lies under the expanse of our gaze" and thus "appears to be essentially *subjective*."[1] *Environment*, on the other hand, "is the exact opposite of landscape in as much as it attempts to give an *objective* interpretation of

[1] Gilles Clément, *Gardens, Landscape and Nature's Genius*, trans. Elzélina Van Melle (Aarhus: IKAROS Press, 2020), §7.

our surroundings."[2] Clément's articulation of a vision of nature through landscape and environment surprisingly echoes the double speculation of Corbin's two "mirrors": two poles that, whenever not "bridged" on the level of the imaginal, fall into a dualistic logic of an *objective* versus a *subjective* vision of nature.

Nevertheless, this is not the only opposition they stand for: in Clément's account, the landscape is, on the one hand, not only subjective but also *sensible*; on the other hand, the environment is not only objective but also *intelligible*. Landscape is a sort of quintessence of the sensible; it is, in Clément's words, "whatever remains after we have stopped looking; whatever stays in the mind once we have stopped using our senses within a space occupied by the body."[3] Environment is instead "the shareable side of the landscape." As such, it is an intelligible image: "a scientific interpretation provided by

2 "It is also the shareable side of landscape: a scientific interpretation provided by tools that anyone—regardless of culture—can understand and consider in the same way. The acidity or alkalinity of the soil (pH) is measured in the same way in Europe, Asia or Africa, with the same tools, and communicated in the same words. The sounds of a site, the radioactive emissions of a rock, the amount of carbon dioxide in the atmosphere, the pollution rate of a river etc, are all quantified in the same precise ways all over the planet, leading to a kind of 'technical Esperanto' that allows a scientific reading of our environment." Clément, §9.
3 "For the blind, it may be what is within the reach of all the other senses." Clément, §6.

instruments of analysis that anyone—regardless of culture—can understand and consider in a comparable way."[4] Sensible and subjective, intelligible and objective, these two images find their transcendental mediation in the "third" image of the garden:

> The garden escapes cultural divides. *Garden* refers to the *environment* only to establish in it the good rules of gardening and to *landscape* only as it never stops engendering it.[5]

Not only the garden transcends the duality of environment and landscape: similarly to the image, it disentangles them from a rigid opposition and articulates them in a double articulation—it enacts the double duplication proper of the speculative image. In it, the sensible nature of landscape is not just subjective but also objective, as it is "engendered" by the garden; at the same time, the intelligible character of environment opens its unquestionable objectivity—the one of a "stern,

4 Clément, 24. Translation altered: "instruments of analysis" instead of "tools" and "comparable" instead of "same," in accordance with the original French version: "une lecture scientifique fournie par les instruments d'analyse que chacun, quelle que soit sa culture, peut entendre et apprécier de façon comparable." See: Gilles Clément, *Jardins, paysage et génie naturel: Leçon inaugurale prononcée le jeudi 1er décembre 2011* (s.l.: Collège de France, 2012) §9.
5 Here directly translated from French: "Le jardin échappe aux divisions culturelles. *Jardin* ne se réfère à l'*environnement* que pour y établir les règles heureuses du jardinage, et au *paysage* pour les seules raisons qu'il ne cesse d'en créer." Clément, §14.

smooth account"[6]—to an establishment of rules that, as such, implies what could be understood as a subjective involvement. Like the image, the garden has a *dispositional* character: it is the locus in which reception and transformation, syntropy and entropy are placed in relation to each other, where they "touch."

The "meridian" of the garden casts a horizon—a *Gesichtkreis*—that separates and joins together environment and landscape: for the first, such a horizon is, similarly to the one of crisis, one of accountability, of possible renderings. Something unintelligible and "elusive" can be presented within this circle "as a stern, smooth account in which the active elements, stripped of all sensitivity, are interpreted as debits and credits."[7] The horizon of the environment delimits a space within which the living (*le vivant*) is "commodified."[8] The one of environment is a domain of *translation*; its "language" of debits and credits is what Clément calls a "technical Esperanto." Landscape instead is the

6 Clément, *Gardens, Landscape and Nature's Genius*, §11.
7 "[...] enabling us to calculate, invest and speculate. The environment is reduced to the apparently controllable accountancy of biology, which is complex and hard to understand and master." Clément, §11.
8 "While life keeps inventing, moving from the unpredictable to the predictable, calibrated and estimated environmental data can give way to something that nature's own data never has: the commercialisation of living matter [*la marchandisation du vivant*]." Clément, §11.

image of what is *beyond* this horizon, what is not (yet) translated and can hence only be *transcribed*: as a "feeling," landscape can be transcribed, for example, in a painting.[9] Landscape and environment seem to share a similar difference to the one between Name and language.[10]

Primacy of the Garden

In the "optics" of the garden, environment and landscape are not opposed but "perpendicular" to each other—their difference is thus categorical. They belong to domains of determination that are principally *alternative* to each other, and, from an analytical point of view, they seem to be subjected to a sort of indeterminacy principle. One is a matter of *resolution*: landscape has no scale and cannot be universally defined, according to Clément. "In theory, there are as many landscapes about a site as there are people to interpret it."[11] The other is a matter of *position*: Clément exploits the ambiguity

9   "Landscape appears to be essentially subjective because it is a transcription of a feeling, as for example in a painting (the first landscapers were painters, not planners)." Clément, §7.
10   See Book III of the present work, "Troping Line."
11   "There is no scale to landscape; it may be vast or tiny, made of all kinds of material—alive or inert—and located anywhere, without limits or horizons. [...] These facts make landscape impossible to define universally. Thus, theoretically, for one given site there are as many landscapes as there are individuals to interpret it." Clément, *Gardens, Landscape and Nature's Genius*, §6-8.

between *environment*, "that which is at a distance from us," and *milieu ambiant*, a term that "suggests a state of immersion rather than distance" in order to show how the horizon of accountability of environment could be looked at from two antinomic positions, two different world-views: one of "supremacy" with the world—the point of view of an observer that looks at it while pretending to leave it unaffected by the observation—and one of "equality" with it, in which object and subject, world and human find themselves in a *common* picture.[12] Like the image, the garden mediates between an organic and realistic perspective; it establishes what Jacques Lacan would have called a relation between an *Innenwelt* and an *Umwelt*.[13] This absolute alterity

12   "These two terms are intended to give us the most scientific and objective interpretation of nature, and obviously lead to two distinct attitudes, two outlooks on life, two ways of understanding ecology. We will have an opportunity to return to this, but all the same, we can note that terms supposed to imply notions that are shared worldwide in fact express different ways of apprehending the world. Taking this as our starting point, it would be interesting to ask the question metaphorically: which language do we want to speak? The language of supremacy, or of equality with nature?" Clément, §13. Michel Foucault described the *milieu* as a notion "needed to account for action at a distance of one body on another." The milieu is, at the same time, "the medium of an action and the element in which it circulates." Michel Foucault, *Security, Territory, Population: Lectures at the Collège de France 1977-78* (New York: Palgrave Macmillan, 2009) 35–36.

13   "The function of the mirror stage thus turns out, in my view, to be a particular case of the function of imagos, which is to establish a relationship between an organism and its reality—or, as they say, between the *Innenwelt* and the *Umwelt*." Lacan is here speaking of the "*imago* of one's own body," an image that the garden would extend

between the "positional" nature of environment and the "resolutional" one of landscape is articulated within the garden. It is the imaginal locus in which these different worlds "touch," and as such, it is pre-specific to them: there is, to paraphrase Coccia, a "primacy of the garden."

The environment's ambiguity between "supremacy" and "equality," between a position that is uninvolved in the affairs of the milieu and one in the midst of it, is what the garden addresses by making room for it. Therefore, it is not surprising that the garden stands between the private and the public, between a domestic realm that articulates itself in supremacy and enslavement and a public one here understood as a realm of commonality. In their *Concise History of Gardens*, Pier Vittorio Aureli and Maria Shéhérazade Giudici write that the garden "is a far more complex artifact," one able to "confuse" (and perhaps even to reorient) "the existing juridical categories."[14] The garden is thus what they call a "common ground," something not really public but not even fully private. Gardening constitutes the first act of domestication and, consequently, a way to mark private property within a non-pri-

beyond mere psychoanalytical concerns. Jacques Lacan, *Écrits*, trans. Bruce Fink (New York: Norton, 1996), 77–78. See also: Coccia, *Sensible Life*, 58.

14   Pier Vittorio Aureli and Maria Shéhérazade Giudici, "A Concise History of Gardens," *Accattone*, October 2019, 222.

vate realm.[15] At the same time—Aureli and Giudici stress—the garden can establish an open, public dimension within a non-public realm. "The garden could be a way to *profane* the idea of private property,"[16] they conclude. If profanation could be understood as a way to pierce a "sacred" boundary in order to subtract what could have potentially turned into public matter and to "privatize" it, the same process appears here inverted: it still pierces that boundary but in the other direction. The garden turns some part of the environment into a "property"; it establishes a boundary and, simultaneously, a communication between what is "improper," *ouk oikeia*, and what is "proper," *oikeia*.[17]

15   "The history of gardens thus coincides with one of the most controversial processes of human history: the domestication of society. Early sedentary communities did not just build homes, but started to define their own territory by domesticating forests, building boundaries and enclosing spaces. Gardens therefore embody the original ambivalence of the domestic space as both a way to give stability and orientation to life and as instruments to mark land property." Aureli and Giudici, "A Concise History of Gardens," 216.
16   Aureli and Giudici, 222. Emphasis added. Quite paradigmatic is the case of the Roman domus, in which the garden—the *peristylium*—constituted the most 'private' and, at the same time, the most public space of the house: "Hidden at the most private end of the domus, the peristylium was meant to celebrate the pastoral ideal of the house as a space of retreat; yet its monumentality also addressed an ostensible public dimension as it was the place where the homeowner entertained guests." Aureli and Giudici, "A Concise History of Gardens," 218.
17   Gardening can be understood "as the way in which humans domesticate the environment by giving it a form," it "can be considered a way to make a 'world' endowed with a sense of familiarity and ori-

The "Natural" Project

Therefore, the garden's properness is not limited to a matter of land: it is nature itself—as an "elusive whole"—to be "housed" in its perimeter. Even the weather, perhaps the most unpredictable of all natural things, is given place and form in the garden: the *impluvium*, a monumental pool collecting rainwater at the center of the Roman house, being perhaps the most paradigmatic example. Both weather and time—both chronological and meteorological *tempora*—are suspended and rearranged in the garden. In what architect and urbanist Ludwig Hilberseimer would have called a *Gestaltung der Umwelt*,[18] environment is here turned into landscape, and this "engendering," as Clément calls it, cannot happen but by establishing some "good rules" within the environment, hence by continuously crossing and thus redefining the border between supremacy and equality. If, on the one hand, the garden "incorporates" the unpredictability of the weather,

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entation." Aureli and Giudici, "A Concise History of Gardens," 216. In this sense, the garden is never *generic*: its space "can cater to a large number of people and be very inclusive, generous, open places, but not generic spaces that should fit 'anyone.'" Aureli and Giudici, "A Concise History of Gardens," 222.

18 Ludwig Hilberseimer, *Metropolisarchitecture and Selected Essays*, ed. Richard Anderson (New York: GSAPP Books, 2012). I developed this specific topic more in-depth in "The Umwelt as a Project. Designs of the Urban Milieu in the Age of Bio-Power," *OASE Journal for Architecture*, No. 104 (2019): 103–12.

on the other, the very making of the garden is an act that cannot happen but *in time* since, as Aureli and Giudici stress, "it does not happen all at once but is constantly performed as the garden evolves across years and seasons."[19] The garden cannot be considered in a logic of mere production since it does not develop into a process with an outcome. In this sense, "gardening is more about maintenance than execution."[20] The garden is a space made of time; it "contains" time and is "contained" by it.

In *The Life of Plants*, Emanuele Coccia describes the environment of the vegetable kingdom precisely in terms of a relation between these two categories: "In all climates, the relation between the container and the contained is constantly reversible: what is place becomes content, what is content becomes place."[21] Such a relation is what is actively articulated within the garden, in terms of interiority and exteriority, an articulation that has a *cosmic* significance: if, as Coccia writes, "the world is the space of a universal mixture in which each thing contains and is contained by all other things," interiority as the fact of being contained

19 Aureli and Giudici, "A Concise History of Gardens," 223.
20 Aureli and Giudici, 223. "[T]he making of a garden blurs the traditional distinction between design and construction that since the Renaissance has ruled the discipline." 216.
21 Emanuele Coccia, *The Life of Plants: A Metaphysics of Mixture* (Medford, Massachusetts: Polity, 2018), 27.

by something, "is the relation that ties each thing to all other things, the relation that defines the being of worldly things."[22] The definition of this interiority allows for a distinction between animate and inanimate that is not a priori but somewhat always relative to the architectonic articulation—the orientation—of that transcendental perimeter. Plants, Coccia writes:

> demonstrate that life is a rupture in the asymmetry between container and contained. When there is life, the container is located in the contained (and is thus contained by it), and vice versa. The paradigm of this mutual overlap is what the ancients called "breath" (*pneuma*). To blow, to breathe—means to have this experience: what contains us, the air becomes contained in us; and, conversely, what was contained in us becomes what contains us.[23]

The garden embodies at an architectural scale such rupture of asymmetry between container and contained, articulating a "breath," a *pneuma*, whose "body" is not just an individual one. This breath "percolates" through the garden and is articulated by it: this implies that, within the garden, time

22 Coccia, 67. The garden articulates the cosmic significance as an act of *cosmesis*, and the relation between the *cosmos* and *cosmesis* is not just etymological but architectonic. On this topic, see Ananda K. Coomaraswamy, "Ornament," *The Art Bulletin* 21, No. 4 (December 1939): 375–82.
23 Coccia, *The Life of Plants*, 10.

"passes massively,"[24] as the garden establishes a sort of filter through which an absolute otherness—one that is not tied to any particular subject—is there accommodated and reified. "Throughout its history," Aureli and Giudici write, "the garden has always been a laboratory for forms of otherness."[25] The garden would not only welcome and accommodate otherness but also invent its form, objectifying the apparent immateriality of the *pneuma*. As Coccia stressed in the *Sensible Life*:

> It is a mistake to define man and life *tout court* on the basis of their capacity to spiritualize the object. Life is also the ability to reify the spirit, to objectify it, to alienate it. And the first form of alienation and realization of the spirit is the image.[26]

24 The concepts of "percolation" and of a time that "passes massively" are borrowed from: "Chronopedia I: Counting Time" in Vera Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres* (London: Bloomsbury Academic, 2020).

25 Aureli and Giudici, "A Concise History of Gardens," 223.

26 "The sensible is not only the place of abstraction of forms from their matter (consciousness in its first stage), but it is also and above all the process of reification (*Verdinglichung*), of alienation, of *transforming* the spirit and the Subjective *into sensation.* [...] What lives [*vivente*], in this sense, is not only those who know how to carry the things of the world within itself, transforming the forms of objects into intentions, images of the mind, immanent and 'personal' objects, but they are—above all—those capable of giving sensible existence to what lives within them." Coccia, *Sensible Life*, 50–51. On a similar note, Michel Serres writes: "No human collectivity exists without things; human relations go through things, our relations to things go through men: this is the slightly more stable space described by laws." Michel Serres, *The Natural Contract* (Ann Arbor: University of Michigan Press, 1995), 45

The image "reifies and objectifies" the spirit, like plants are the "demonstration" of the *pneuma*. It is not just a matter of demonstration as much as of ideation: rather than phenomenology, it is a matter of what Coccia calls a "phenomenotechnique." In the garden, like in the image, the world is not sensible but *made* sensible.[27] In revealing while shaping a particular spirit, garden and image could perhaps come close to the notion of artwork, except that, differently from the latter, both garden and image do not just *take* but also *make* room.[28] Such an architectural translation of spirit resonates with the work of many vital figures of the Modern Movement in architecture, from Le Corbusier's *Esprit Nouveau* to Hilberseimer's conception of metropo-

27   "Strictly speaking, there is no phenomenology: there is only a 'phenomenotechnique.' The things of the world, in fact, *must* be made sensible: the must be transformed into images." Coccia, *Sensible Life*, 35. Lars Spuybroeck later developed a similar notion under "phenotechnology." See Lars Spuybroek, *Grace and Gravity: Architectures of the Figure* (London: Bloomsbury, 2020).

28   Heidegger's reflections on the "origin of the work of art" meet here Schmitt's reflections on *nomos* and *Raum*. See Martin Heidegger, "The Origin of the Work of Art," in *Off the Beaten Track*, ed. Julian Young and Kenneth Haynes (Cambridge: Cambridge University Press, 2002), 1–56; Martin Heidegger, "The Provenance of Art and the Destination of Thought (1967)," *Journal of the British Society for Phenomenology* 44, No. 2 (2 May 2013): 119–28. Carl Schmitt, 'Nomos – Nähme –Name', in *Staat, Großraum, Nomos: Arbeiten aus den Jahren 1916–1969*, ed. Günther Maschke (Berlin: Duncker & Humblot, 1995), 573–91; Carl Schmitt, "Raum und Rom – Zur Phonetik des Wortes Raum," in *Staat, Großraum, Nomos: Arbeiten aus den Jahren 1916–1969*, ed. Günther Maschke (Berlin: Duncker & Humblot, 1995), 491–95.

lises as "intersections of human activity, economics and spirit."[29] At the same time, Mies van der Rohe and Frank Lloyd Wright articulated in their buildings the breaking of asymmetry between container and contained—an operation described by the latter as "the destruction of the box."[30]

As a border between properness (and property) and improperness, of Aristotelian *oikeia* and *ouk oikeia*, the garden is indeed a matter of domestication as much as of inhabitation: it establishes a "habit," and it does so not just arbitrarily, but by confronting itself with a substantial otherness. "Natural genius" is the name that Clément gives to such otherness: as a *genius*, nature acquires an intellectual potency—it becomes both object and subject. The garden is, therefore, not just a place for the rearrangement *of* nature, but *with* nature—it is the place of what Michel Serres called a "natural contract," in the sense of a contract with nature. The garden is the locus of a peace treaty with nature, of a *foedus naturae*. Such a formulation might

29 Hilberseimer, *Metropolisarchitecture*, 84. This specific aspect of the Modern Movement was also developed in "The Umwelt as a Project. Designs of the Urban Milieu in the Age of Bio-Power," 103–12.
30 "You have established a natural use of glass according to this new freedom of space. Space may now go out or come in where life is being lived, space as a component of it. So organic architecture is architecture in which you may feel and see all this happen as a third dimension." Frank Lloyd Wright, "The Destruction of the Box," in *An American Architecture*, ed. Kaufmann Edgar (New York, NY: Horizon Press, 1955).

nevertheless lead to the misunderstanding that this "contract" or this "pact" is what always comes after and upon a prior and underlying state of war. However, this is not so: it is up to the contract to establish the terms both of peace and war—to *name* them. No war (nor peace) is there "before" the contract. Like in Averroes the image would articulate itself in prime and ultimate perfection, so the natural contract establishes a balance in maxima and minima: *au minimum, la guerre; à l'optimum, la paix.*[31] Likewise, the garden is not a place of order upon a prior disorder; it is instead what *profiles* one against the other. Its tidiness is not opposed to the wildness of the forest; it is instead an "instance" of it: it is only by embracing the wildness, collecting, cultivating, and carefully selecting its species that the garden can happen—but this means that many other orders can be "hidden" and "encrypted" in the wildness, like incomprehensible tongues waiting to be heard.

In its "contractual" character, the garden here rises as the image of a *natural project*: as an image that is not entirely alienated from the "reality" of nature and therefore "un-determined," just like a caprice or a phantasy, but rather as the opening up

31 Michel Serres, *Le contrat naturel* (Paris: Éditions François Bourin, 1990), 41. "This is the state, the balanced account, of our relations with the world [...] At the very least, war; ideally, peace." *The Natural Contract*, 20.

of a room of "free" determination in the context of a pre-determined space. As Clément states, the garden "appears as the sole and unique meeting ground of humankind and nature, where dreaming is allowed":[32] actuality and potency, "real" time and "dream" time, light and matter are here weaved in together.

32   Clément, *Gardens, Landscape and Nature's Genius*, §15. "[T]he garden is also a space of experimentation where nature was reinvented and manipulated—in turn, a blueprint for the organization of the world outside its walls, or a deliberately idiosyncratic alternative that radically opposed the surrounding reality. Even if the garden can host production, it is not necessarily a productive space: it is a projection of a life ambition that, in history, has gone well beyond mere work to aim at pleasure, meditation, agonism, debate, hedonism, love, spiritual retreat, play, art, friendship and many more aspects of human experience that are often devalued today, when the economy is the ruling paradigm of our existences. From this point of view, gardens are idle, almost useless in the contemporary city—and can therefore represent a challenge to the status quo. To reimagine a garden also means to rethink what we believe makes life worth living." Aureli and Giudici, "A Concise History of Gardens," 216. "The garden symbolizes, allegorizes and often sublimates power conditions that define the territory at large within the microcosm of a finite form. It is, at the same time, a blueprint of things to come and an alternative to the reality of the surrounding reality; while it can have a pragmatic purpose, such as the provision of foodstuffs, it is never purely pragmatic device but, rather, an attempt to construct a model, a form of life that is not (yet) possible outside its walls." Aureli and Giudici, "A Concise History of Gardens," 217.

THE ARCHITECT
AS DEMIURGE

X
Metaphysics of the Negligible

Heisenberg's Anschaulichkeit

In 1927, Werner Heisenberg published an article entitled *Über den anschaulichen Inhalt der quantentheoretischen Kinematik und Mechanik,* in which he introduced the first draft of what would then become known as the "uncertainty principle."[1] From the title, it is evident that the article discusses the "content of quantum-theoretical kinematics and mechanics;" what is less obvious is nevertheless the adjective of such "content," described by Heisenberg as *anschaulich*. In the philology of the ar-

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1 Werner Heisenberg: *Über den anschaulichen Inhalt der quantentheoretischen Kinematik und Mechanik.* In: *Zeitschrift für Physik.* Vol. 43, No. 3, (Berlin: Springer, 1927), p. 172–198.

ticle's translation, this word has been translated in a variety of ways: "physical," "perceptible," and "perceptual," for instance. But *anschaulich* can also mean "intelligible," "intuitive," and "descriptive."[2] Kant adopts a similar term in the first part of the *Critique of Pure Reason*, that dedicated to transcendental aesthetics: *Anschauung* (literally "view" or "vision") is the object of a theory in which space and time are the conditions of possibility of knowledge as transcendental forms of perception.[3] To pick up a term with such a longstanding tradition, reintroducing it to the realm of physics, was initially Erwin Schrödinger in the formulation of a theory meant precisely to solve an open issue left by Heisenberg's previous article: Heisenberg's matrix mechanics correctly managed to calculate the position of atomic particles, but it did so by refusing to account or to "picture" what would happen in-between those positions, during the so-called

[2] Hilgevoord, Jan and Jos Uffink, "The Uncertainty Principle," *The Stanford Encyclopedia of Philosophy* (Winter 2016 edition), Edward N. Zalta (ed.), URL: https://plato.stanford.edu/archives/win2016/entries/qt-uncertainty/ (23 Feb 2022).

[3] Immanuel Kant, *Kritik der reinen Vernunft* (Hamburg: Felix Meiner, 1956). Besides Kant, the notion of *Anschauung* and of *Anschaulichkeit* has a longstanding tradition in the philosophical discourse. For further reference, see: Pirmin Stekeler-Weithofer, *Formen der Anschauung: Eine Philosophie der Mathematik* (Berlin: De Gruyter, 2008); and Klaus Thomas Volkert, *Die Krise der Anschauung: Eine Studie zu formalen und heuristischen Verfahren in der Mathematik seit 1850* (Göttingen: Vandenhoeck & Ruprecht, 1986).

quantum leaps. Matrix mechanics would therefore assume the discrete observable value as *particles*, as values that could not be harmonized in a continuous model. Schrödinger's theory of wave mechanics proposed instead a way to reconcile the discreteness of these observations with the continuity of a wave function. *Anschaulichkeit* was, for him, the advantage of this theory: the mathematical model of the wave function was proven in its validity by the fact that it could be matched by observable — the German *anschauliche* — data. By picking up the same term for his later article, Heisenberg redefined its meaning: if, for Schrödinger, *Anschaulichkeit* stood as an *ex-post* proof of the overall validity of his theory, for Heisenberg it was instead an *a priori* condition to the understanding of the theory itself, and thus a limiting one.[4] The fact that *Anschaulichkeit* was not a validation of his theory but a condition of understanding was not just demonstrated

4   Whereas Schrödinger's *Anschaulichkeit* has to be understood in the analytic frame of his wave function (and pertains, therefore, to a calculus), Heisenberg's take on it is more algebraic than analytical. At the very beginning of his article, Heisenberg writes: "We believe we understand a physical theory in an intelligible way [*anschaulich zu verstehen*] if, in all simple cases, we can grasp the experimental consequences qualitatively and see that the theory does not lead to any contradictions." Heisenberg, *Über den anschaulichen*, 172. A precious reconstruction of Heisenberg and Schrödinger's diatribe can be found in Carlo Rovelli *Helgoland: Making Sense of the Quantum Revolution*, trans. Erica Segre and Simon Carnell (New York: Riverhead Books, 2021).

by Heisenberg by levering on the interpretation of the word itself, but especially by the very content of the paper: in its embryonic form, the principle of uncertainty stated that the more precisely one tries to measure the position of a particle, the less complete this picture would be.[5] In other words, it stated that, to a quantum-theoretical understanding, observation *matters*.

Even if from different sides, both Heisenberg and Schrödinger converged on the importance of observation. However, Heisenberg added that the object of his theory seemed to be ascertained only within the very limits of observability or, in other words, *only within the exchange* it entertains with its observer. What happened beyond this exchange could not be objectified and had to be neglected. This neglect, which appeared at first to be a failure of Heisenberg's theory, was assumed by it as the very operative principle. The uncertainty principle establishes an unavoidable relation, within the observation, between the acquisition of precise meas-

5 "At the instant of time when the position is determined, that is, at the instant when the photon is scattered by the electron, the electron undergoes a discontinuous change in momentum. This change is the greater, the smaller the wavelength of the light employed, i.e., the more exact the determination of the position. At the instant at which the position of the electron is known, its momentum, therefore, can be known only up to magnitudes that correspond to that discontinuous change; thus, the more precisely the position is determined, the less precisely the momentum is known, and conversely." Heisenberg, *Über den anschaulichen*, 174–175.

urement and its irreversible loss. Such irreversibility implies that this relation is accountable in economic terms only contingently: its economy can never be considered total but must always account for what exceeds it (as a loss, an expenditure, a *Verlust*). These contingent economies allow for the exchange between observed and observer, "creditor" and "debtor," but only upon an unaccountable reserve—one similar to Blumenberg's *Vorbehalt*—of what stands *beyond* observation and measurement. Such a "beyond" is not quantifiable, but can only be *quantized*, addressed in proportional terms—as a quantum, not as a "how many" but an "as much." Therefore, the relation is not only between observer and observed but also between observable and *un*observable. The quantum-physical observation comes, thus, close to that double duplication enacted by the image, and observation can be described as a kind of balance or equilibrium that rests upon a circle of some "non-knowledge," a residue of intellection that is in no way directly accountable.[6]

6   The notion of non-knowledge might instead find an interesting theological development in a classic of the 14th Century, such as *The Cloud of Unknowing*. More recently, Carlo Rovelli provided a quantum-physical account of entropy in terms of *blur*. "Boltzmann has shown that entropy exists because we describe the world in a blurred fashion. He has demonstrated that entropy is precisely the quantity that counts *how many* configurations our blurred vision cannot distinguish. Heat, entropy, and the lower entropy of the past are notions that belong to an approximate, statistical description of nature. [...] But something further is also true: the blurring itself determines a

The image can be seen, under these terms, as the expression of an ontological difference, of an irreducible and substantial discontinuity between the *ontic* realm of being and the one of *ontological* intellection, in a way in which none of the two comes before the other since both are co-ordinated and co-constituted by the image as their transcendental projectual.[7] Intellection rises in the form of analogy, of an architectonic proportion: as an image—a "bridge"—upon the negligible, as acutely recognized by Simone Weil:

> Essential contradiction in our conception of science: the fiction of the closed vessel (the foundation of every experimental science) is contrary to the scientific conception of the world. Two experiences should never give identical results. We overcome it through the notion of the negligible. But the negligible is the world…

particular variable—time." Carlo Rovelli, *The Order of Time* (London: Penguin Books, 2019). In this perspective, the things of the world are not ontologically set, but they "emerge" from time as a blur: they are *categorically* addressable, rather than ontologically. A similar "fertility" is described by Elias Zafiris in his relation between a quantum spin-foam to the notion of information as *anadyomene*—an epithet of Aphrodite, meaning "emerging from the foam." See: "Circumventing Complexity: Motif of Information as Anadyomene," in Elias Zafiris, *Natural Communication: The Obstacle-Embracing Art of Abstract Gnomonics* (Basel: Birkhäuser, 2020).

7 See also Chapter 7.2. Rereading Heidegger's ontological difference precisely in such mathematical terms would be interesting. See: Martin Heidegger, "Die Grundprobleme der Phänomenologie," in *Gesamtausgabe. II. Abteilung: Vorlesungen 1923-1944* (Frankfurt am Main: Vittorio Klostermann, 1989).

So it is with the simplest technique. It is *chosen* as a model.

The notion of the analogy of identical ratios is central for the Greeks. A bridge between the finite and the infinite.[8]

Currency

Today, such an "economic" understanding of the image and observation has found a precise formulation in the notion of information. In his 1956 book *Science and Information Theory*, Leon Brillouin describes information in terms of entropy and negentropy:

> Every physical system is incompletely defined. We only know the values of some macroscopic variables, and we are unable to specify the exact positions and velocities of all the molecules contained in a system. [...] Entropy measures the lack of information; it gives us the total amount of missing information on the ultramicroscopic structure

8 Here translated from the French: "Contradiction essentielle dans notre conception de la science : la fiction du vase clos (fondement de toute science expérimentale) est contraire à la conception scientifique du monde. Deux expériences ne devraient jamais donner de résultats identiques. On s'en tire par la notion de négligeable. Or le négligeable, c'est le monde... / Il en est ainsi de la plus simple technique. On la *choisit* pour modèle. / La notion d'analogie, de rapports identiques, est centrale chez les Grecs. Pont entre le fini et l'infini." Simone Weil, *Cahiers*, in *Œuvres complètes* VI, Vol. II, (Paris: Gallimard, 1997), 547.

of the system. [...] any observation or experiment made on a physical system automatically results in an increase of the entropy of the laboratory. It is then possible to compare the loss of negentropy (increase of entropy) with the amount of information obtained.[9]

Building upon Leo Szilard's and Claude Shannon's work, Brillouin starts from the constitutive discreteness of Heisenberg's *Anschaulichkeit* and borrows the thermodynamic notion of entropy to account for the exchange of information. In his theory, a *gain* of information corresponds to a *loss* of negentropy, and such an exchange happens on the basis of the understanding of entropy as the measure for the *lack* of information. Despite borrowing the concepts from life sciences, according to which negentropy signaled the possibility of defining the living in precise scientific terms, Brillouin's phrasing—lack, obtainment, loss—paves the way for a relatively economical and quite "materialist" understanding of information. In these terms, entropy can be considered a "debt" that becomes constitutive for an economy where the exchanges are accounted for through negentropy.[10] Gains

9   Léon Brillouin, *Science and Information Theory* (Mineola, NY: Dover Publications, Inc, 2013), xii.
10   On the constitutive role of debt for the establishment of an economy of exchange, see: David Graeber, *Debt: The First 5,000 Years* (Brooklyn, NY: Melville House, 2011).

and losses arise here in the "negotiation" between observer and observed, in which information is converted into energy and vice-versa. Even if still implicitly, Brillouin prepared the ground for the introduction of a "third" element that, like the image, would allow for this conversion and, consequently, for such an economy of exchange—something that would "step in" the gaps left by Heisenberg's particles, without falling into the trap of Schrödinger's calculus. Even if discussed by him still in terms of "life," this third element could already be borrowed as something more autonomous and "intelligent" than a vitalist understanding might have suggested. Discussing Brillouin's notion of negentropy, Vera Bühlmann identifies this element as *code*:

> Brillouin foregrounded the role of 'code' in such 'intelligent' computation: he thereby applied a *double* notion of negentropy and entropy—one to energy, one to information. Entropy applied to *energy* follows a physicalist view (universal nature), negentropy applied to *energy* follows a biologist view (pluralist natures, fragile balances of import/export relations in metabolisms); entropy applied to *information* follows a biologist view (attends now to specific balances of pluralist natures, whereby local balances are being 'generalized' into global 'ontologies'), negentropy applied to *information* follows a physicalist view (universal nature, can now attend to that nature's 'givenness' in greatest local

diversity ('givenness' as 'datedness'). The fourfold energy and information orders assume that both are linked and convertible to each other by code.[11]

Energy and information, universality, and pluralism "touch" in the notion of code, as *unica mens* and individual minds touched in the image. Code and image unfold in such double duplication: light can be converted into mass, photons into electrons, potency into act, and vice versa. The distinction between a "physicalist" and a "biologist view" could be compared to the two positions outlined by Clément concerning the environment as something towards which both "equality" and "superiority" are possible stances. If the Averroistic notion of the image stood for what Coccia described as a "physics of the sensible," the notion of code in information theory could perhaps be described as a *metaphysics of the negligible*.[12] Averroes's material intellect and the medieval "speculations" on the statute of the image come quite close to the form of mediality that is experienced with the digital: the coextensiveness of matter (of hardware) and agency (of software); the multiplication of images as a set of indeterminate exact copies; their reduction to a "punctual" and

11 Vera Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres* (London: Bloomsbury Academic, 2020), 39.
12 Emanuele Coccia, "Physique du sensible. Penser l'image au Moyen Age," in *Penser l'image*, ed. Emmanuel Alloa (Dijon: Les Presses du Réel, 2010).

intensive form that does not take any "physical" room; and, ultimately, the consequent understanding of the intellect not as a transcendent "supreme entity," but immanently as "the thinnest of all matters"[13]—as some "intra-material software" (*logiciel intra-materiel*), to use the words of Michel Serres.[14]

What Brillouin's theory introduces additionally is that the negligible becomes here an explicitly operative principle: the exchange between energy and information would not be there without the asymmetry of entropy, without thus what Brillouin calls a "lack of information."[15] This asymmetry becomes a *currency*—and, in this case, information—only if accepted as such, as a constitutive "grain" of reality: this implies that the observer *must* relinquish the expectation of gaining information on the microscopic states of the system, on the "infinitely small" (and thus operationally negligible). "[T]he measurement of extremely small distances is physically

13   Coccia, *La Trasparenza delle immagini*, 115.
14   "On peut dire du gnomon : 'il connaît' comme on dit qu'il pleut. Le gnomon a l'air d'un style, mais nul ne le tient en main. Des choses du monde se donnent à voir à un objet qui les montre : entièrement objective, la théorie se passe de sujet. Une chose, le gnomon, intervient dans le monde et celui-ci lit sur soi l'écriture qu'il trace. Ce type de logiciel intramatériel conditionne nos performances cognitives, comme une sorte de transcendantal objectif." Michel Serres, *L'Incandescent* (Paris: Le Pommier, 2003), 58. See also: "A Logos Genuine to the World: 'Le logiciél intra-matériel,'" in Bühlmann, *Mathematics and Information in the Philosophy of Michel Serres*, 66–72.
15   Brillouin, xii.

impossible," Brillouin writes. "The mathematician," he continues, "defines the infinitely small, but the physicist is absolutely unable to measure it, and it represents a pure abstraction with no physical meaning:"[16] such "ultramicroscopic" structures can only be conceived as abstractions in the exchange between the mathematical and the physical as the image rises within the exchange between the intelligible and the sensible. As a currency established through code, information itself must utterly abstract from the "value" of what it deals with; it must therefore relinquish any claim to understand its meaning. Code and information act here similarly to Name and language: the sign only works after the "possession" and the "absorption" of the alterity of the Name and its consequent release of an "allegoric space." Brillouin's theory works only upon the "elimination" from it of what he calls "the human element."[17] Code and image are the *loci* where this

16 "An interesting outcome of this discussion is the conclusion that the measurement of extremely small distances is physically impossible. The mathematician defines the infinitely small, but the physicist is absolutely unable to measure it, and it represents a pure abstraction with no physical meaning. If we adopt the operational viewpoint, we should decide to eliminate the infinitely small from physical theories, but, unfortunately, we have no idea how to achieve such a program." Brillouin, *Science and Information Theory*, xii.

17 "The methods of this theory can be successfully applied to all technical problems concerning information: coding, telecommunication, mechanical computers, etc. In all of these problems, we are actually processing information or transmitting it from one place to another, and the present theory is extremely useful in setting up

elimination occurs, a place of projectual detachment from the "presupposed." The introduction of code renders this elimination not necessary but contingent: the "human element" is no longer something fixed from which to depart, but rather an image from which one can depart as much as that can be reached—the image of a "hominescence" rather than a *humanismus*.[18]

If the image could be considered as the expression of this asymmetry as an ontological difference, with information, such expression is symbolized, encased, and turned into a general equivalence. The image, the likeness of something, can be quantized via code and information theory to act as a currency: it turns into a copy only of itself and, at the same time, of nothing in particular. This is possible thanks to the probabilistic nature of information theory and thus to the transformation of *likeness* into *likelihood* (or of *quanta* into *quantities*). It proceeds by modeling an initial "inertial" condition in which "no special information" is possessed

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rules and stating exact limits for what can and cannot be done. But we are in no position to investigate the process of thought, and we cannot, for the moment, introduce into our theory any element involving the human value of the information. This elimination of the human element is a very serious limitation, but this is the price we have so far had to pay for being able to set up this body of scientific knowledge." Brillouin, *Science and Information Theory*, x.

18 Michel Serres, *Hominescence*, trans. Randolph Burks (Bloomsbury: Bloomsbury Academic, 2019).

about the system in consideration,[19] a condition that corresponds to a situation in which a number of different possibilities might happen. Still, these other possibilities—these "cases"—are set *a priori* all as *equally probable.* Such an a priori condition of uncertainty determines the maximum uncertainty of the problem related to the context and, thus, the maximum amount of information required to make a selection.[20] Setting such an equivalence, and thus modeling this as a subsequent "inertial" condition, is an act of coding that transcribes the indeterminacy of chance into determinate cases.

However, it would be a mistake to consider coding merely as a *descriptive* act. Taken seriously, *Anschaulichkeit* implies that the negligible is not simply what cannot be "passively" accounted for; it is what has to be *actively* neglected. Furthermore, the probabilistic set-up developed by Brillouin (and by James Maxwell and Claude Shannon before him), which develops one of Heisenberg's on a more abstract level, makes it clear that the coding

19   "Concerning the basic law of motion, the law of inertia, the question arises whether this law is not to be subordinated under a more general one, i.e., the law of the conservation of energy which is now determined in accordance with its expenditure and consumption, as work-names for new basic representations which now enter into the study of nature and betray a notable accord with economics, with the 'calculation' of success." Martin Heidegger, "Modern Science, Metaphysics, and Mathematics," in *Basic Writings*, ed. D. F. Krell (London: Routledge & Kegan Paul, 1978), 270.
20   Brillouin, *Science and Information Theory*, 1.

happens *a priori* and is thus closer to an artificial construct than a natural constant. As Emanuele Severino pointed out, probability theory is introduced by Daniel Bernoulli as the *Ars conjectandi*, an art of predicting "events that, like those occurring in games of chance, do not allow themselves to be reached by the *epistéme* and whose prediction is, therefore, the work of an *ars*, that is, of an activity guided by rules that are not intended to be valid as incontrovertible truths."[21] The probabilistic view seems to be transversal to the one of the project: the prediction is here not a throwing-forward, but a "throwing-with." Conjecture, from *cum-jacio*, implies "being provided with an equipment that allows one to reach what is ahead."[22] This does not mean that the coding of information is entirely arbitrary and subjective but that it deals with chance in terms that are not univocally set.

Both quantum physics and information theory seem to converge towards a notion of the image that is *autonomous* both from the subject as well

[21] "Nel suo titolo stesso, l'*Ars conjectandi* di Bernoulli si propone esplicitamente come previsione (*conjectura*, da *cum-jacio*, getto innanzi essendo provvisto di un'attrezzatura che consente di raggiungere ciò che sta innanzi): come previsione di eventi che, come quelli verificantisi nei giochi d'azzardo, non si lasciano raggiungere dall'*epistéme* e la cui previsione è quindi opera di un'*ars*, cioè di un'attività guidata da regole che non intendono valere come verità incontrovertibili." Emanuele Severino, *Legge e caso* (Milan: Adelphi, 2002), § XIV. Translated from the Italian.
[22] Severino, § XIV.

as from the object: on the one hand, it removes itself from the "human element" and the attribution of values and meanings; on the other, it is not "naturalistic," it does not stand as a depiction of an implicit truth—it is not a verisimilitude (epistemological) but a likeness (architectonic), it is what art historian Ananda Coomarswamy describes as "an image akin (*sungenēs*) and 'equal' (*isos*) to its model; in other words, a natural and 'adequate' symbol of its referent."[23] Model and image do not exclude each other but rather establish a virtuous cycle through which knowledge can be accessed in an architectonic matter.

23 "The imitation or 're-presentation' of a model (even a 'presented' model) involves, indeed, a likeness (*homoia*, Latin *similitudo*, Skr. *sādṛśya*), but hardly what we usually mean by 'verisimilitude' (*homoiotēs*). What is traditionally meant by 'likeness' is not a copy but an image akin (*sungenēs*) and 'equal' (*isos*) to its model; in other words, a natural and 'adequate' symbol of its referent." Ananda K. Coomaraswamy, "A Figure of Speech, or a Figure of Thought?," in *Figures of Speech or Figures of Thought? The Traditional View of Art*, ed. William Wroth (Bloomington, Ind: World Wisdom, 2007), 9. Aristotle's writings seem to play, in one way or the other, a crucial role in this distinction within the history of Western thought. Whereas Averroes's Commentary on his writings seems useful to reintroduce an architectonic understanding, Karl Popper previously identified Aristotle as the fore-bringer of epistemology at large. See: Karl R. Popper, "Introduction: Aristotle's Invention of Induction and the Eclipse of Presocratic Cosmology," in *The World of Parmenides: Essays on the Presocratic Enlightenment*, ed. Arne F. Petersen (London, New York: Routledge, 1992), 1–6.

Nomothesis

These considerations are all tied to the postulation of an autonomous statute of images. In informational terms, this autonomy corresponds to the treatment of natural invariances through the mediacy of code on the one side and the "elimination of the human element," i.e., to the evacuation of any claim over meaning on the other. Such autonomy outlines what could be referred to as the *theological-political* character of the image: as a medium with a domain of its own, the image is not quite just a representation of something; its "existence" is not univocally linked to the one of an external reference. The representation process is, therefore, in the case of the informational image, an intransitive one, so to speak: rather than a representation (of something), the image has to be understood as *a representative* in itself—and for this reason, the one of the images is a *statute* and not a *state*, as it is not to be epistemologically or analytically legitimized. Like in the case of the image, the notion of representativeness is particularly evasive to a logical understanding because it exceeds contradiction and can thus appear as a paradox. The representative moves *within* antitheses and articulates them; it is molded as what Schmitt defined as a *complexio oppositorum*: not a coincidence (*ad infinitum*) of the

opposites (as in Cusa's *coincidental*) but their imma-
nent "folding together" (*cum-plexio*).²⁴ The political
character resides precisely in the fact that these an-
tinomies do not annihilate each other but instead
find a possibility of mutual confrontation in the
representative. The dialectic play of contradictions
is here organized into a "space" or a "domain—and
is, therefore, the outcome of an architectonic ability
rather than a logical one.

But how does this sort of translation from the
logic and the dialectic to the architectonic and the
"spatial" occur? And how do they relate to the polit-

24   The relation between logics and representativeness is perhaps
best grasped in Schmitt's discussion of the statute of rhetorics in the
modern age: "The lack of understanding of the significance of rheto-
ric is but one manifestation of the polar dualism of the age, expressed
here, on the one side, by a rapturously overpowering music; on the
other, by a mute practicality. It seeks to make 'true' art into some-
thing Romantic, excessively musical and irrational. It is well-known,
largely owing to Taine's gifted discernment and depiction, that there
is a close relation between rhetoric and the *esprit Classique*. But Taine
destroyed the living idea of classicism by making it the antithesis of
Romanticism. Without actually believing it himself, he endeavored to
identify the classical with the rhetorical and thereby with artificiality,
empty symmetry, and fabricated lifelessness. A whole assortment of
antitheses to play with! In this comparison of rationalism and some-
thing 'irrational,' the classical is allotted to the rational, the Romantic,
to the irrational. Rhetoric comes under the heading of the classical
and rational. Most decisive, however, is rhetoric in the sense of what
one might call representative discourse rather than discussion and
debate. It moves in antitheses. But these are not contradictions; they
are the various and sundry elements molded into a *complexio* and thus
give life to discourse." Carl Schmitt and G. L. Ulmen, *Roman Cathol-
icism and Political Form* (Westport, Connecticut: Greenwood Press,
1996), 23.

ical? In the *Nicomachean Ethics*, Aristotle describes the political precisely as *arkhitektonikē*, an "architectonic science or faculty."²⁵ Both the political and architectonics are by him related to *phronēsis*, "prudence," a form of practical wisdom able to confront the natural unpredictability of chance and its particular cases. If, on the one hand, the exercise of politics is concerned with deliberation over specific occurrences, and the ones who practice it are compared by Aristotle to "manual workers" (*kheirotekhnai*), on the other hand, the architectonic faculty instead consists in what he defines as a "legislative" activity—*nomothetikē*.²⁶ He appears here to discuss what today is referred to as the principle of the separation of powers: the executive, legislative, and judiciary. But whereas in the modern state, the

25 "Now it would seem that this supreme End must be the object of the most authoritative of the sciences or faculties [*epistēmōn ē dunameōn*]—some science or faculty which is pre-eminently a master-craft [*arkhitektonikēs*]. But such is manifestly the science of Politics." Aristotle, *The Nicomachean Ethics*, trans. H. Rackham, 1094a 1–25.
26 "Prudence [*phronēsis*] is indeed the same quality of mind as Political Science [*hē politikē*], though their essence is different. Of Prudence, as regards the state, one kind, as supreme and directive [*arkhitektonikē*], is called Legislative Science [*nomothetikē*]; the other, dealing with particular occurrences, has the name Political Science [*politikē*], that really belongs to both kinds. The latter is concerned with action and deliberation (for a parliamentary enactment is a thing to be done, being the last step in a deliberative process), and this is why it is only those persons who deal with particular facts that are spoken of as 'taking part in politics,' because it is only they who perform actions, like the workmen in an industry." Aristotle, *Nicomachean Ethics*, 1141b, 8–29.

legislative power is political insofar as it is *within* politics (and often overlaps with the executive), in Aristotle's configuration, the legislative is *beside* it.[27] The architectonic character of politics is, in fact, not quite legislative but *nomothetical*: it is not a matter of "law-making" but of the "placing" of a *nomos*.

Differently from the law, the *nomos* is not something deliberated in the political arena; Hannah Arendt notes that the *nomothetes*, the "law-giver," could even be a foreigner, engaged "much like a sculptor or architect commissioned to supply what the city required."[28] But the most concise and precise definition of *nomos* has been given by Schmitt, who in his work long indulged on such a notion: according to him, *nomos* is the word "best suited to describe the fundamental process involved in the relation between order [*Ordnung*] and orientation [*Ortung*]."[29] The nomos weaves together two domains: the geometrical one of order and the

27   "Prudence also is commonly understood to mean especially that kind of wisdom which is concerned with oneself, the individual; and this is given the name, Prudence, which really belongs to all the kinds, while the others are distinguished as Domestic Economy [*oikonomia*], Legislature [*nomothesia*], and Political Science [*politikē*], the latter being subdivided into Deliberative Science [*bouleutikē*] and Judicial Science [*dikastikē*]." Aristotle, 1141b, 29–32.

28   Hannah Arendt, "Introduction *into* Politics," in *The Promise of Politics*, trans. Jerome Kohn (New York: Schocken Books, 2005), 179.

29   Carl Schmitt, *The Nomos of the Earth in the International Law of the Jus Publicum Europaeum*, trans. G. L. Ulmen (Candor, NY: Telos Press, 2006), 67.

angular one of orientation. Schmitt then defines law (*Recht*) as "the *unity* of order and orientation:"[30] What in the *nomos* is a pre-specific relation, the law assumes as a *unity*; if the law is *one code*, nomos is the "coding" itself.

Heisenberg's matrixes could be read precisely in these terms: as an account of discrete geometric values (an order) that is inextricable from a determinate angular momentum (an orientation). But the terms of this relation are not given, this is why the relation is *Unschärfe*, "un-sharp," as Heisenberg himself called it, and it can be valid as *a principle*—it defines what in juridical terms is a "state of law," a *Rechtstaat*, and in physical ones a mechanics—only through its "quantization" into a unity. It is precisely this quantization that the object of the architectonic faculty and, conversely, its architectonic nature resides in the fact that, as a quantum, the unity cannot be determined in a univocal manner. In other words, it cannot be the object of Newtonian mechanics. The nomos binds the polis, the city as a place of the many, as a *politeia*. Unity is here always yet to be achieved and never properly "sealed," not yet "quantized"; the polis is always on the verge of *stasis*, of civil war. The nomos allows us to conceive of a unity without forgetting its "unstable" and "indeterminate" nature as quantum; it preserves the

30 Schmitt, *The Nomos of the Earth*, 42.

negligible by not claiming to speak in its name. As Arendt highlights, the nomos "is not valid outside the polis," and its "binding power applies only to the space that it encloses and delimits."[31] The coding that the nomos enact is similar to an *Entwurf*, a "project" in which, recalling Cacciari, one still "feels the pull of the throw."[32]

Once the relation resolves in unity, the nomos leaves the stage to law, to a *Rechtstaat*. Its order is not just oriented but directional: it has a *sense*, it is guided. It operates within a "logic" process, able to "linearly" solve contradictions: a contract whose validity stands in time rather than in space and is "tied to proposals and counterproposals,"[33] hence unthinkable without the infrastructural role of language and speech, of a *logos*. In this context, the representative character of the image cannot but

31 Arendt, "Introduction *into* Politics," 181.
32 "If we analyze, for example, the German term *Entwurf*, then the root of the project reemerges with force. In the *ent-*, the anticipation, the before (*Avanti*) do not resound; what resounds, rather, is the way-from, the separation-from, the departing—not so much the constructive-productive in its advance, as much as the destructive or the overcoming. In *Entwurf*, one perceives the 'pull' (*strappo*)of the 'throw' (*lancio*), not its eventual prefiguring, predictive force. Thus, in terms such as *Entwicklung* or *Entfaltung*, the *techné* of unfolding, of unwinding, of developing is portrayed with its eyes turned backward: to the 'already developed' that must be newly unfolded, to the refolded, to the 'congealed' that must be disentangled, unraveled, analyzed." Massimo Cacciari, "Project," in *The Unpolitical: On the Radical Critique of Political Reason*, ed. Alessandro Carrera (New York: Fordham University Press, 2009), 123.
33 Arendt, "Introduction *into* Politics," 179.

appear as absurd: the image cannot be but *a representation* of something; it is reduced to an epistemological "meanwhile," to being a mere logical explication of its idea, as much as a line is the "evolution of a point." The *Entwurf* becomes here fully *projected*, something "thrown in front," in which the "pull of the throw" is not to be felt anymore. And yet, as a "mere meanwhile"—as a *frattempo*, a time in-between time itself—the image can be understood as the point in which the "thinnest of all matters" becomes the "thinnest of all times," i.e., as the point of conversion between matter and time.

The image somehow counters the arrow of time: as Brillouin stated, entropy—the only equation of state in which, according to thermodynamics, time flows irreversibly—in informational physics is always to be set relative to a negentropy. And yet, in the image, this countering does not happen just linearly, as a play of positive and negative, but rather "spatially," architectonically—*nomothetically*: as the relation between order and orientation, two domains that can indeed be quantized on a line, but in which the quantization must be "remembered" in its metaphysical neglect. The one offered by the image is not just a "counter-arrow" to the flowing of time: this would correspond to a *tragic* immobility, a total symmetry. The relation between order and orientation implies that time cannot be stopped

but that it can assume an "angle," a momentum—it can be materialized as a "declination," as a case—beyond its apparently inevitable direction (conversely, matter can have different orders, it can be organized through different "tenses"). The time of the image is neither entropic nor negentropic, but *ek-tropic*: it exceeds the "programmatic" accounting of entropy and negentropy and articulates the two as that fourfold economy of exchange; credit and debit of energy and information. If entropy constitutes a "lack of information" implicit in any system, as Brillouin wrote, ektropy is the turning of this lack and this constitutive debt into a gratuitous credit and of lack into abundance. The ektropic coincides here with the political, as something that "[b]y claiming to be something more than the economic [...] is obliged to base itself on categories other than production and consumption."[34] *Anschaulichkeit* becomes, through the image, "a matter of *compossible* interpretations, of *orders* of interpretation."[35] To be "encoded" in the image is

34 Schmitt, *Roman Catholicism and Political Form*, 17.
35 "What seemed to be an absolutely inexorable law becomes a principle that can only be interpreted statistically; from Necessity it is transformed into a possible order. *Which* entropy is increasing? Which system does it quantitatively characterize as the 'degradation' of our system? But how can we say that it lives in isolation? How can we extrapolate from the fact of the increase in the measure of entropy within it, if considered in isolation, to the 'death of the sun'? Isolated systems present an irreversibility of fact, moving from conditions of lower entropy towards conditions of maximum entropy but

not just chance: even the past is un-secured: the one of the "ek-tropic instant," as Cacciari calls it, is a time in which "an 'eternal' image of the past, an image of the past as a perfect state, does not appear conceivable."[36] The past is a "state" (a has-been) only

not a nomological one. No Nomos states that things can only go like this. We can imagine cases in which entropy decreases or does not change. On the basis of the 'normal' situation, and only on the basis of this situation, we can establish the fundamental asymmetry of time, the distinction between a before and an after, but this will not indicate its *direction*. Nothing informs us that time *flows* ('irreversibly') from a before to a present to an after. We can simply define different measures of entropy, distinguish the *two* directions of time, not its flowing in *one* sense. It seems that the idea of a direction of time is closely related to a communicative model, in which it is implied that the answer *must* follow the question or that we ask questions *only because* we expect answers containing more information. But, even apart from the extraordinary 'naivety' of this idea (the whole of Kafka, for example, is a refutation of it), it does not imply any irreversibility. The communicative model could 'logically' be combined with any image of renewal; its duration does not in itself express any idea of consumption or death. There is no necessary sequence here, as there was in the entropic model. It is a matter of *compossible* interpretations, of *orders* of interpretation. But order can also be, then, the ek-tropic possibility (not mechanical, not constrained in the system of 'mechanical reversibility') revealed by the mundus imaginalis, the 'Dionysian' moment of the perfect simultaneity of the directions of time; the folding of its arrow; the 'question' that the color of the icon can address to its Gold, precisely because this is always given, before any 'question' (just as, in the dream, time seems to 'flow' towards its present, towards its 'origin' or 'cause,' towards what is already an answer to its questioning)." Massimo Cacciari, *Icone della legge* (Milan: Adelphi, 2002), 207–208. Translated from the Italian.

36   "In the Angel's name, the *idea* that it is possible to make this 'argument' 'leap,' to squirt out of the homogeneous and empty time of the continuum, to give life to days that stand, to *Fest-stage*, capable of stopping the flow and recreating it at a time, becomes self-transparent. To entropy, to irreversible consumption, his name opposes the *ek-tropic* instant. In this time, an 'eternal' image of the past, an image

as a *project*, i.e., as an *Entwurf* in which the "static" insecurity and uncertainty of its pull have been forgotten (and the project, Cacciari writes, is always a *project of State*). It stops being a "dimension" of time. It acquires instead a *depth*, as described by Merleau-Ponty concerning the pictorial gaze, as "the experience of the reversibility of dimensions, of a global 'locality' in which everything is at the same time."[37] This uncertainty of the past and the status quo can perhaps already be grasped in the fact that, when digital, the image is always also *digitable*:[38] Besides its exact, indeterminate reproduc-

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of the past as a perfect state, does not appear conceivable. The past itself is still *insecure; it* can glow with hope, and it can demand *justice*. Never, in this time, is the past *defeated*; never is the present merely the field of the victors, from which, as Simone Weil repeated, justice is always forced to flee." Massimo Cacciari, *L'Angelo Necessario* (Milan: Adelphi, 2008), 86-87. Translated from the Italian.

37 "Once depth is understood in this way, we can no longer call it a third dimension. In the first place, if it were a dimension, it would be the first one; there are forms and definite planes only if it is stipulated how far from me their different parts are. But a first dimension and one that contains all the others is no longer a dimension, at least in the ordinary sense of a *certain relationship* according to which we make measurements. Depth thus understood is, rather, the experience of the reversibility of dimensions, of a global 'locality' in which everything is at the same time, a locality from which height, width, and distance are abstracted, the experience of a voluminosity we express in a word when we say that a thing is there." Maurice Merleau-Ponty, "The Eye and the Mind," 369.

38 "An enormous mental upheaval, which no one would be able to contain, was caused—and continues to be caused—by the confluence of *digital* and *digitable*. Knowledge assumes the form of a single encyclopedia in perpetual proliferation and, generally speaking, digitable. An encyclopedia that juxtaposes impeccably reliable in-

tion, it contains within itself the possibility of its indeterminate alteration, even up to the point of turning into its contingent opposite—a veritable realization of the *complexio oppositorum*. Through its entropy, the image becomes constitutive of a space of *liberal arbitrium*, of free will.

Architect sive Demiurge

This freedom is not absolute but always deals with an "other" which is undetermined and therefore open to a plenitude of potential determinations. The image is what can potentially make sense of it: make it *anschaulich*, sensible and intelligible, and physically so. But this act of sensing or sense-mak-

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formation with baseless information, equally accessible and on the same level. What is digitable belongs to what is familiar and can so be used with fond indifference. Knowledge loses prestige and appears as though made up of items—in the sense of headings in an encyclopedia and incontrollable, drifting rumors or *boats*, as they say in Portuguese. The most fascinating—and potentially fruitful—aspect of this total encyclopedia is the *algorithmic chaos*, so that once the most probable connections have been reached, they become increasingly arbitrary and misleading, as is supposed to happen in a neural network." Roberto Calasso, *The Unnamable Present*, trans. Richard Dixon (London: Penguin, 2020), 70. As digitable, the digital could be compared to what Agamben describes as a "writing of potency." "The writing of potency—writes Agamben in the introduction to Coccia's book on the transparency of the images—is, in this sense, an absolute and generalized form of compilation, in which pure receptivity and pure writability coincide and in which thought, the *magnus compilator* plunders and compiles itself, endlessly adding alienity to alienity." Giorgio Agamben, "Introduzione," in *La Trasparenza delle immagini: Averroè e l'averroismo* (Turin: Bruno Mondadori, 2005), xi.

ing exceeds a physical understanding—for which it is instead *meta*-physical, something that any "physical" *Anschaulichkeit* must actively neglect. Such neglect is the product of an "architectonic ability;" as Aristotle called it, it casts a bridge between a physics of the sensible and a metaphysics of the negligible.

As previously pointed out, this architectonic understanding of the image implies at the same time its operative character: the image is not just a representation of something but is intransitively representative, and in being so, it must actively dispose the intelligible upon the negligible or, in informational terms, negentropy upon entropy. If, at its dawn, entropy has been understood as a measure for energy unable to produce work—as a kind of "resistance" to work, as a form of energetic friction—then negentropy could conversely be paraphrased as a form of intellectual work.[39] A separation and, simultaneously, a connection with something absolutely other—an *esse extraneous*—the "work" that the image "performs" opens a field

39   This would be consistent with what was suggested in Chapter III (footnote 3), i.e., to see quantum physics as a "physics of (self-) determination," as a point of conjunction between information theory and "natural will." On the development of such a notion at the border between a materialist-thermodynamic notion of work and a "new materialist" and informational one, a crucial contribution has been given by Tafuri in his seminal essay on intellectual work and capitalist development. See: Manfredo Tafuri, "Lavoro intellettuale e sviluppo capitalistico," *Contropiano*, No. 2 (1970): 241–81.

of communication—a *templum*—with such otherness. Doing so, the architectonic ability of the image opens a door (or a window) towards it (and it is perhaps in the necessary presence of a wall as what instead forecloses that the role of the negligible can be better understood), a threshold that constitutes an opening as much as a lieu of commonality. In this sense, perhaps, we can appreciate the architectonic character of the image as something "demiurgic": the work that the image performs as a public *ergon*, both *öffentlich* and common.

Architecture and architecture theory can help reshape the understanding and the role of the image in the age of information. "Age" is here not a historically determined matter: like the image, it is instead a "key" that is determined as much as determining, historical as much as historiographical—the encounter between contingency and non-contingency.[40] At the same time, this understanding of the image can help reshape the role of architecture and the architect in a broader sense beyond a mere *Baukunst*.[41] Despite the contemporary mis-

40 According to such an understanding, every age is "axial"—to quote a term coined by Karl Jaspers and recently discussed by Michel Serres—since, as a way to understand and categorize time, every age establishes an axis (a key) around which a horizon of events unfold. See: Karl Jaspers, "Vom Ursprung und Ziel der Geschichte," in *Gesamtausgabe: I. Werke*, Vol. 1, 10 vols. (Basel: Schwabe, 2017); and Michel Serres, *Relire le relié* (Paris: Le Pommier, 2019).

41 Roberto Bottazzi recently suggested that architecture was born

trust towards this association, the architect can be adequately conceived as a demiurge—not only in terms of public work, as already discussed, but even as far as a world ideator: not a transcendent-immanent *Deus sive Natura*, but a caster of transcendental forms that immanently articulate such a divide.

almost as the opposite of *Baukunst*. If the latter would deal with the "materiality" of the practice, architecture is instead concerned with coding upon it. In the scope of the present work, this must nevertheless be understood not just as a separation *but also* as a connection with what it separates from. See Roberto Bottazzi, "Omnia per Omnia: Anything by Anything" (Essays on the Architectonic Body, School of Materialist Research, 15 February 2022).

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