

DESIGN IN THE AGE OF DISSIDENT CYBORGS

Xenofuturism as caring-curing practices

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Abstract. This paper synthesizes several years of research in the field of the theory of architecture and design, and its subsequent undergraduate and graduate teaching. Specifically, it is a work that reflects on how architecture and design should face the three most important paradigmatic phenomena of our present and near future. Paradigms as things we think with, rather than as things we think about (Agamben, 2008), or in other words, it matters what ideas we use to think of other ideas (Strathern, 1992). These phenomena refer to environmental, technological and anthropological aspects, and the strategies to cope with them, involving alternate design thinking and practice in which futurabilities and futurizations depart from the displacement generated by post-utopian visions based on dissidence and subalternity.

Keywords. Chthulucene; Cyborg Design; Dissident Futures; Futurization; Xenofuturism.

1. Diagnosis

From an environmental point of view, there is no longer any doubt that we live in a context of transformations on a planetary level and that these are a consequence of the impact of human activities on the earth. It is clear that if we do not change the ways in which we extract primary resources, produce and consume stuff and food, and manage waste, we will be heading towards mass extinction. Humanity is losing the ability to control the effects it is having. It is no longer enough to “stop” negative behavior or have a “sustainable” relationship with the environment. For this reason, to think about the future we chose to speak of Chthulucene instead of Anthropocene. Donna Haraway (2016) says that Anthropocene will be short. It is more of a border event than an epochal event, similar to the K/Pg limit (the massive extinction of the Cretaceous-Paleogene). And she wonders if it is possible that the brevity of this Anthropocene/Capitalocene/Plantationcene “border event” is due to the fact that multispecies entities, including human beings, forged in time powerful alliances with the generating powers of Chthulucene, to provoke

resurgence and partial healing in the face of irreversible loss, so that old and new world-makers could take root. In this sense, the earth of the current Chthulucene is simpoietic, not autopoietic, it does not close on itself, it is not complete. “Bounded (or neoliberal) individualism amended by autopoiesis is not good enough figurally or scientifically; it misleads us down deadly paths. Barad’s agential realism and intra-action become common sense, and perhaps a lifeline for Terran wayfarers.” (Haraway, 2016: 34). Following that, by refusing to reduce the urgency of the earth to an abstract system of causal destruction, Anna Tsing (2015) argues that precariousness (the failure of the lying promises of modern progress) characterizes the life and death of all earthly creatures in these times. She seeks contaminated and non-deterministic, inconclusive and continuous practices of living in ruins. She shows how it matters which stories tell stories as a practice of care and thought. “If a rush of troubled stories is the best way to tell contaminated diversity, then it’s time to make that rush part of our knowledge practices”.

From a technological point of view we were using the concept of postdigital, a concept inspired by a paper by Nicholas Negroponte (1998) where he states that “the digital revolution is over”. Postdigital is also a paradigm, but as in posthumanism, for example, the understanding of post-digital does not aim to describe a life after the digital, but tries to describe the opportunity to explore the consequences of the digital. While the computer age has improved human capacity with attractive and unusual prostheses, post-digital thinking can provide a framework with which it is possible to examine and understand this improvement. Following Negroponte, there is no doubt that we have been living in a digital age for a long time, to the extent that our culture, infrastructure and economy allow. But also that truly amazing changes will occur elsewhere, in our way of life and in the way we collectively manage ourselves on this planet. In addition to the broad scope of artistic discourse, the notion of postdigital describes the exploration of our relationship with the information age as the dominant paradigm in an age of global mixing, intertwined economies, demographic certainty and planetary boundaries, for example in Berry’s work (2014). In this sense, Mel Alexenberg (2011) defines “post-digital art” as works that address the humanization of art as a whole, postdigital technologies through the interaction between digital, biological, cultural and spiritual systems, between cyberspace and real space, between embodied media and mixed reality in social and physical communication, between high technology and high contact experiences, between visual, haptic, auditory, and kinesthetic media experiences, between virtual reality and augmented reality, between roots and globalization. Works of art created with alternative media through participation, interaction, and collaboration, in which the role of the artist (architect or designer) is redefined.

In continuity with the two previous points, from an anthropological point of view, we establish the need to think architecture and design in relation to a cyborg corporeality and subjectivity. A cyborg is simultaneously a cybernetic organism, a hybrid of machine and organism, a creature of lived social reality and a creature of fiction (Haraway, 1991). A cyborg, on the other hand, does not require a stable and essentialist identity. The physical attachments that humanity has with the most basic technologies have already turned us into cyborgs. In this sense,

Haraway's question that we must transfer to architecture and design is: when do changes in degree become changes in species, and what are the effects of the biocultural, biotechnological, biopolitical and historical situation of people (not man) in relation to the effects of assemblages of other species and other biotic/abiotic forces, and combined with them? Haraway's cyborg calls for a non-essentialised metaphor, semiotic, capable of uniting all political coalitions in planes of affinities. It calls for a reconstruction of identity, no longer dictated by naturalism and taxonomy, but by affinity, in which individuals can build their own groups by choice. In this way, groups could build a kind of postmodern identity from otherness, difference and specificity as a way of counteracting Western traditions of exclusive identification.

Finally, we add a fourth theme to take into account, which introduces social and geopolitical aspects into the above, from the reflection on how to think about future scenarios from Conjectural Design based on dissidence and subalternity from the crisis of certain cultural hegemonies. That is what we have called Dissident Futurities. Following, we develop these aspects from a theoretical approach, specifically in the field of architecture and design, although using pedagogical and design experiences that we have carried out in the last years.

2. Therapeutic

According to paleoanthropology, the possibility of making tools, that possibility that we would call design today, was a feature that originally characterized the hominids of the species *Homo Erectus* and that *Homo Sapiens* have assumed singularly thanks to our ability to project uses, functionalities and applications. In this line of thought, archaeologist André Leroi-Gorhan (1993) stated that already in that original manufacture two supposed and intended purposes converged: the expected of the tool once finished and the expected of the action that the tool should perform. The tool would be, thus understood, the end of an action, that of its manufacture and the means of another, that of its use. Continuing with this reasoning, it can be stated that what is expected of the tool is at the core of the production of the tool itself. In this sense, to produce also requires a thought of the effects, those desired and/or possible, in terms of a desire to make-make. This is what we mean when we speak about design.

Recognizing the importance of planning and imagination when designing something was also among the interests of Karl Marx, who in Volume I of *Capital* stated that "what distinguishes the worst architect from the best of bees is this, that the architect raises his structure in imagination before he erects it in reality" (1977: 344). However, almost two centuries later, according to Franco Berardi (2017), the current social and productive conditions that mark contemporary capitalism are precisely the separation between planning and imagination regarding socially assigned and differentiated productive functions. Berardi finds in the current specificities of this separation not only a decisive dilemma of our contemporary context, but also a strength point that can reopen the possible of design, its factual power. Emphasizing the type of productive act rather than the subject that carries it out, Berardi understands that it is key to overcoming the fragmentation of cognitive work if we want to make viable a bet for a creative society without exploitation,

extraction, or private appropriation of what is socially produced.

In this critique of contemporary separation, which can be traced back to Marx's 1844 Manuscripts, the inclusion of design is significant. Indeed, we live in a world deeply conditioned by design knowledge: Information and transport systems, flow governance, logistics, agronomy and rural exploitation, genetics, finance, urbanism, and algorithms are the backbone of a design and planning matrix that in the last half-century has expanded its exploration towards information processes and systems, from large entities to the atomic and molecular. It could be said that this is not a common form of design to present itself, but it does underlie in this definition a possible creative torsion, even artistic, of itself. In this sense, it is worth highlighting the use of the expression "virtualities" that Latour uses because it allows us to think that there is a virtuality in the materials that participate and configure the extended virtualities, those of potential uses, those of futurities. Because, as Etienne Souriau wrote, "if this table is physically made by the carpenter, it is still to be done as far as the philosopher or the artist is concerned". They discover what is missing, in a process that recognizes milestones and openings. When Umberto Eco (2011) spoke of unsurpassable objects (such as the spoon or the book) he referred exclusively to the conscious functionality of these objects; when Otl Aicher spoke of the difficulty of architects in understanding that the concept of building must include use and not only construction and completion he referred to the functional definition of things (1991: 269). Almost supplementing these openings, Souriau allows to extend that panorama to incorporate heterodox uses, interpretations, reconfigurations in so much possibility always there, always available. They are not exhausted because they belong to heterogeneous dimensions, to "other modes of existence".

In these pages, futurity is understood as that figuration that seeks to overcome the notion of future from its exclusively teleological dimension. Here it is worth following Souriau, who first of all seeks to distance the future from an enigmatic condition but also from its consideration in terms of final cause. It is not something that can be, in terms of a potential act, but something that is in a certain way, that way is the futurity, that is: "the virtual consummation that completes the movement of this present inclined towards the future, of that future falling into the present" (1943:179). Futurity is a power that is never fulfilled or completed and that allows acts to be fulfilled and completed. Futurity is the possibility just before it emerges; it is the virtuality of that consummation. "The event to come is called and captured, then released and referred to the past by that constant form, by that "and after", by that "and then", whose essence is to be located, not in the instant, but between two (think of this expression: the intermission, the interval, the interim), in the inter-world, between the instant that departs and the one that comes" (1943:180). Futurity is that interval that is born of the encounter between two forces, a way of naming the fact of the possibility that there are supports, propensities, precipitations, landings. It is the way in which conditions, projects, possibilities exist as a virtuality of events. Continuing with this reasoning, futurization and futurability refer to the ways in which we link with futurity. If the first is defined by planning, in terms of an act in the future; the second is understood through transitions and journeys, a power that does not close its definition.

Perhaps the aforementioned ways of approaching the world and invention are a valid way to renew our ideas about futurizations, futurabilities and virtualities. In this way design appears, “the point of articulation between the artistic and the engineering” (Berardi, 2017). It emerges as a field of problematization and exploration of contemporary links between projects and discoveries. Materials and knowledge, the futurizations of which they participate, the improvisations they propitiate, become a decisive zone in the social production of open links with futurities. A field to explore inventiveness.

Let us start then from an affirmation of Arturo Escobar, “design generates the structures of human possibility” (2017:58), to rethink its way of linking up with futurities as a redefinition of the conditions of the possible. Design thus becomes a methodological input or, in the words of Bruno Latour: “There is neither a manufacturer, nor an owner, nor a creator that can be said to have mastered the materials; or, at least, a new uncertainty is introduced regarding what is going to be built, as well as who is responsible for the emergence of the virtualities of the materials that are handled” (2005: 8). Social relations, institutional forms, political economies, infrastructures and design objects are literally emptying the planet of futurity through their incalculable social and ecological impacts and it is worth asking ourselves if designers have been able to deeply understand the disaster caused by the economy of hyperconsumption. As we see it, part of the apocalyptic risk that today flies over the planet, part of a link with futurity capable of making futurity itself impossible, corresponds to design.

According to Escobar, “design is ontological because each object, tool, service or even narrative in which it is involved creates particular ways of being, knowing and doing” (2017:47). Design is a way of linking with the virtuality of events that, while provoking them, seeks to explore and inscribe them. Can we, as the Spanish philosopher Amador Fernández Savater proposes, “hack into” the codes that hegemonically organize things, their uses, their circulations, their modifications? (Savater, 2016). What trends would we find where infrastructures beat? What would happen if we followed the advice of the coinners of the concept of Critical Design, Anthony Dunne and Fiona Raby, for whom the role of design can be “to facilitate visions and not so much to define them, to be a catalyst rather than a source”? (2013: 9). To elaborate questions that link materialities, fabrications, uses, ethics, is to discuss a design policy as the sensitive nucleus of our links with futurities.

If we assume that the goal of design is to fabricate not only the object (the service, the idea) but its world around it and that “every object, tool, service or even narrative in which design is involved creates particular ways of being, knowing and doing” (Escobar, 2017: 47), it is possible to think that, through the invention of objects, infrastructures and practices, design modulates time. It is a protagonist in the production of social semantics that include and propitiate, exclude and make impossible, links with futurities. In our terms, design is a component of futurizations and a vector of futurabilities. A practice in which futurabilities and futurizations do not disable each other, and which can articulate a dialectic between project and path. Because if to design is to maintain “a conversation about possibilities” (Escobar, 2017: 203), the open game of the feasible is a strategy that

reveals the decision and its contingency, as well as the productive multiplicity of the world.

As Escobar (2017: 120) states, in the last decade “important trends have emerged in the world of design that seek to reorient its practice from traditional meaning, tied to the production of objects, technological change, the individual and the market, seen and led by professionals at the height of their expertise, to a way of seeing design as user-centred, situated, interactive, collaborative, participatory and focused on experience and the production of life itself”. Something similar is indicated by Dunne and Raby when they refer to the emergence of “critical design” (2013: 34). Diverse groups, collectives and organizations of all kinds are oriented towards collaborative forms of design and designed forms of collaboration, propitiating a panorama of rearticulation of creations, knowledge, imagination and life that does not submit to the project of monetary valorization; even, more generally, that seeks not to submit to utopia as a project to be fulfilled. The challenge is to create links of post-utopian justice with futurities through the “creation of systematic domains in which definitions and rules can be redefined to make interdependencies and commitments (or their absence) visible” (Escobar, 2017: 212). This attests the shift from a design centered on futurization to one centered on futurabilization, a displacement that invites to produce sensible changes regarding figures of social and cultural transformation, and to open the ways in which these creative practices position themselves regarding becoming and build bonds of futurization. There is no final design, no final figure. In this sense, design practices can assume a logic of change and attention to what is effective, which utopian policies did not consider.

Taking into consideration these post-utopian potentialities of design, its ability to open new horizons, to counteract the advance of a hegemonic narrative to leave room for an imagination of differences, we wanted to design an exercise for the implementation of a thought towards futurabilization. The exercise was presented in different academic contexts within the framework of the public teaching of architecture in Buenos Aires. First the participants were invited to choose a space for dissident thought according to their own experiences, where by dissidence we recovered more the meaning of dissenting over disagreeing in the construction of diverse relationships. In other words, each participant had the freedom to choose the field of futurability of their design according to the construction of diverse relations of imagination and projection, whether from the point of view of class, gender, race, age, etc. From the understanding of this dissident space, the participants were asked to detect a commonplace that relates to the chosen dissidence and then to fictionalize this commonplace in a possible future, from the dissidence. The interweaving of the commonplace with the fictional proposal reveals a certain kinship with predicative operations, operations that emerge from a bond of similarity, to pass from a “being like” to a “being”, a performative bond with which to imagine new futurities, new semantic, material, and sensitive paths.



Figure 1. The Walking Ombú. Acosta, Vega, Careno, Petkovsek. UNLaM, San Justo, Buenos Aires, Argentina. 2018.

3. Design as caring-curing toward xenofuturism

From this epochal diagnosis referring to the context of Anthropocene/Capitalocene/Plantationocene and Chuthulucene, to the post-digital circumstance and to our cyborg condition, we propose design strategies that become new con-figurations where design is a component of futurizations and a vector of futurabilities. We take as paradigmatic and exemplary case of these strategies the project “The Walking Ombú” (Figure 1) developed by students of Architecture of the National University of La Matanza. The case reflects the post-utopian approach that we are unfolding in this article in counterpoint with Archigram’s utopian Walking City (1964). The ombú (*Phytolacca dioica*) is a centenary vernacular tree whose roots have an extended reticular system and whose classification escapes botanical taxonomies. The project is based on the evocation of two huge urban ombus recently cut down and connects their presence-absence with the collective memories of local multi-species. Thus, students detected invisible networks of experiences related to each ombú and made them visible in terms of vectors of futurability.

These design strategies for futurization function as a therapy (from the Greek *therapeia*: care) that seeks to care-cure. From the proposal of a tentacular thinking (Haraway, 2016) we continue towards a radical thinking (in the most

etymological sense, from the Latin radix) that cares-cure as holobiotic-semiotic connectivity between-species and between stories. In this sense, “The Walking Ombú” takes care of the collective memory of the place as holobiont (Margulis, 1990), as an entity formed by the association of different species that give rise to semio-ecological units. The proposal of a design as a care-cure opposes that of a design that makes/unmakes worlds and opens up the possibility of collectively growing a xenofuturism, as a theoretical construction that makes it possible to elaborate a framework not only for the future of design but above all for the design of futures.

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