

## ALTERNATIVE THREE: SCIENCE FICTION IN THE EXPANDED FIELD<sup>1</sup>

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*The abstraction of the 'real' by way of the genres of fictional and scientific discourse, and its return in the contested, perturbative interval affected between them – one which, at the same time, threatens to envelope and subsume them both – acquires a particular historical focus at that moment when History itself is declared to be at an end. The liminal arrangement of these terms has, from its beginning, been orientated in the anticipation, projection and transcendence of precisely such ends. Radically anachronistic, recursive and polysemic, 'science fiction' in its broadest ramification inaugurates – despite (or indeed, because of) its culturally diminished stature – a deconstruction of teleology, of instrumentalist reason, of techno-mysticism, of the ideology of mimēsis and of the metaphysics of presence. In its most incisive forms, it demands a thorough critique of those philosophies of the 'virtual' which had flourished at the close of the twentieth century, and of the 'return of the real' in those discourses of the Anthropocene that have dominated the twenty-first.*

No one has ever lived in the past... and no one will live in the future...

Jean-Luc Godard, *Alphaville*

On 20 July 1969, when Apollo 11 commander Neil Armstrong stepped off the Lunar Module's ladder and onto the surface of the Moon, 53 million people

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worldwide watched the event transmitted in hazy black-and-white, live on TV. Allowing, that is, for a 1.3 second delay between the moon and the Parkes radio telescope in Australia that received the original signal, and an additional 0.3 second delay between Sydney and Houston: comparable to a long-distance telephone call at that time, negligible in fact, almost like being there. Armstrong described it as a performance “in front of the largest audience in history.” It was an event that promised to transform what it meant to be human, while bringing for the very first time other worlds within ‘our’ grasp: a triumph of ingenuity and determination, of scientific rationalism, of the sentimental delusion of a global ‘social media’ *avant la lettre*. A bogus solidarity, in other words, of the industrially privileged, as belied in Gil Scott Heron’s “Whitey On The Moon”:

You know, the man just upped my rent last night  
Cause whitey’s on the moon  
No hot water, no toilets, no light  
But whitey’s on the moon...<sup>2</sup>

Mankind’s giant leap towards this final frontier was never less ideological than it was technical. And while the collective romanticism of exploration and discovery – of landing a “man on the moon” – paled against the massive political, engineering, economic and evolutionary effort to put “him” there (with 400,000 mostly faceless workers keeping the whole project functional), the fact remains that in accomplishing itself the proclaimed ambition of speaking in the first person plural of all humanity, of “the world,” has perhaps become more virtual than ever. This was only to be expected, considering the equally vast ideological logistics of this most accomplished of simulacra.

The largest single logistical undertaking since the D-Day landings – culminating in a total of just two-and-a-half hours of footprints-and-flag activity on the lunar surface – was watched on TV by an unprecedented number of viewers, yet in a profound sense was *witnessed by no-one*.<sup>3</sup> With the return to Earth of Apollo 17 and the cancellation of the lunar programme in December 1972, the “great leap for mankind” beyond low Earth orbit – so far unrepeated

<sup>2</sup> Gil Scott Heron, *A New Black Poet – Small Talk at 125th and Lenox* (New York: Flying Dutchman Records, 1970).

<sup>3</sup> Other than Armstrong, Aldrin and Collins themselves – and even then, the question is moot – though now we have Damien Chazelle’s Armstrong biopic, *First Man* (2018), as a lens through which to witness the fictional re-enactment of this ‘spectacle of witness’ itself.

since – emphatically *did not* pave the way for a mass excursion to follow in those pioneering footsteps, like homesteaders to a new western frontier: at least not within the generational timeframe by which modernity has become accustomed to gauging such recent historical movements. As Baudrillard might easily have said, the Apollo moon-landing ostensibly *did not take place*.<sup>4</sup> It represents, in its recoil to a ubiquitous present tense, the simulacrum of a “new frontier” existing ostensibly as remote televised images and audio transmissions – what commentators on Earth have long referred to in the singular as a media event: an ideological ripple in the fabric of Realpolitik (whose orphaned *logos* has already crossed interstellar space, more alien than ever).

Tom Wolfe, writing on the 40<sup>th</sup> anniversary of mankind’s “giant leap,” could declare: “the American space programme, the grandest, most Promethean [...] quest in the history of the world, died in infancy at 10:56 p.m. New York time on July 20, 1969, the moment the foot of *Apollo 11*’s Commander Armstrong touched the surface of the Moon.”<sup>5</sup> The mystifications of this new Prometheus were never likely to survive the first moments of this ideal consummation: in an instant, the entire course of Western culture was undone. It was not, as the chauvinists said, that the great goddess was reduced to a whore, or merely a lump of rock no more magical than any other – like Roquentin’s pebble on the beach – but that the myth of culture itself, the very possibility of the dream, had been turned to travesty. The moon had become just another repository for ideological trash: an expired commodity.

## Unrealism

As quickly as it had emerged from it, the future of manned space exploration receded into the ‘dream factory’ of a kind of cinema. As a residue of TV images and moon-rock paraphernalia, Apollo presented – in front of the entire world – a *dissolution of the real* into science fiction, and thus *the dissolution of History* into genre. In doing so, Apollo readmitted the phantasmatic into the realm of scientific rationalism: the phantasm of disillusionment. It effected a *suspension of disbelief* in what, until then, had represented itself as a purely instrumental domain of veracity and verification. It inscribed ‘humanity’ within a new technological metaphysic: one which, by foreclosing upon an idea of futurity, evoked a *futurism* capable of incorporating (like the neoliberal, post-Fordist

<sup>4</sup> Jean Baudrillard, *La Guerre du Golfe n’a pas eu lieu* (Paris: Galilée, 1991).

<sup>5</sup> Tom Wolfe, “One Giant Leap Nowhere,” *New York Times*, 18 July 2009.

economics it coincided with) the most fantastically 'excluded' elements of the industrial imaginary, from Ballardianism to Afrofuturism, *in place of the real*.

The apparition of this paradox was not only a consequence of, but was in a sense necessitated by, the act of setting foot on the moon – like some spectre of a future doomed to repeat itself in the register of a science-fiction that itself *has already ceased to exist as fiction*: not by virtue of its historical 'realisation,' but because the major determination of that 'real' *which will have taken its place* is revealed as *nothing more* than a repetition automation. (This 'real' as that which recurs in the place we expect to find it: no *thing*, but the pure technicity of recurrence itself.) Which in turn marks the limit and horizon of those conceptions of a future bounded by cybernetic interfaces (data prostheses) – analogues of a symbolic order that, in becoming *purely mimetic*, is 'restored' to a metaphysical array. For example, this rhapsodic episode from Virilio:

We might even imagine that one day, having donned a suit of interactive data – the DATA SUIT – our internaut will launch himself into a new kind of adventure tourism, discovering the ancient world with the assistance of positioning and surveillance satellites overflying him without letup.

As though playing a pinball machine, our explorer could then touch the summit of Everest or the slopes of Kilimanjaro with one single gesture... Sweep his hand over the shores of the Pacific, caress the wetness of the seas that lurk there... And who knows? Maybe some day in the near future or soon after, he will TOUCH THE MOON, feel the aridity of the Sea of Tranquillity, searching somewhat gropingly for the tools dumped up there, in 1969, by the men of the Apollo 11 mission.<sup>6</sup>

Baudrillard will have insisted that "There is no real and no imaginary *except at a certain distance*,"<sup>7</sup> yet this (prosthetic) distance is nothing if not the very measure of a temporal precession in which 'the future' isn't a reflection-effect *but the possibility of a reflection itself* occurring at the limits of foreclosure. In other words, of *différance*.

In the larger scheme of things, there is no other condition than this. And it is precisely at its most simulacral of moments, in its progress towards self-

<sup>6</sup> Paul Virilio, *City of Panic*, trans. Julie Rose (Oxford: Berg, 2007) 141-42.

<sup>7</sup> Jean Baudrillard, "Two Essays," trans. Arthur B. Evans, *Science Fiction Studies*, 18.55 (November 1991), [www.depauw.edu/sfs/backissues/55/ baudrillard55art.htm](http://www.depauw.edu/sfs/backissues/55/ baudrillard55art.htm), accessed 19 December 2019.

supersession, that humanity is given to perceive its future – or ‘no future’ – in the most tentative and fraught of narcissistic fantasies: six million years of evolution condensed into the image of a man in a spacesuit with a life-support system strapped to his back, on a piece of rock half-a-million kilometres from the only known breathable atmosphere, drifting at the edge of a cinematic vastness in which the probability of survival is statistically zero. By a singular act of ‘transcendence,’ the *contingency of human existence upon technology* – or rather the *technological condition* of humanity itself – is brought clearly into view, such that the future perpetuation of the species is now seen (without the slightest trace of paradox) as *belonging to the realm of the science fictional*. And if cinema represents ‘our’ collective dream, then this future of humanity – divorced from any other possible ‘realism’ – would be experienced, if nothing else, as a dream of cinema.

### Simulacra and Science Fiction

In a short text published in 1991 under the sway of Philip K. Dick’s 1964 novel,<sup>8</sup> *The Simulacra*, there is a reformulation by Baudrillard of a schema developed over the prior two decades, in which a residual idea of truth features as the pretext of a general simulationism. Here, the corresponding “orders” of the *real* and the *fictional* (“there is no more fiction”) collapse into a universal field of simulacra:

There are three orders of simulacra:

(1) natural, naturalistic simulacra: based on image, imitation, and counterfeiting. They are harmonious, optimistic, and aim at the reconstitution, or the ideal institution, of a nature in God’s image.

(2) productive, productionist simulacra: based on energy and force, materialized by the machine and the entire system of production. Their aim is Promethean: world-wide application, continuous expansion, liberation of indeterminate energy (desire is part of the utopias belonging to this order of simulacra).

(3) simulation simulacra: based on information, the model, cybernetic play. Their aim is maximum operationality, hyperreality, total control.

<sup>8</sup> See Philip K. Dick, *The Simulacra* (New York: Ace Books, 1964).

To the first order corresponds the imaginary of the utopia. To the second, SF [science fiction] in the strict sense. To the third... is there yet an imaginary domain which corresponds to this order?<sup>9</sup>

If the Fukuyamaesque domain of the End of History and the birth of the “virtual” that Baudrillard traces in its emergence out of the neoliberal/postmodernist nexus corresponds today with what is called the Anthropocene, it does so only insofar as this ‘epoch’ announces not the transcendence of primitivist, industrialist or cybernetic *posthumanism*, but rather the ‘truth’ of a return of Humanism in its most apocalyptic formulation. Such an apocalypticism would in no way break with the “classical (and even cybernetic) viewpoint” in which, Baudrillard reminds us, “technology is an extension of the body” as “the evolved capacity of a human organism which allows it both to rival Nature and to triumphantly remould it in its own image.”<sup>10</sup> In other words, the apocalyptic view of the Anthropocene remains one of pure instrumentality, whether as a discourse of mitigation or of transcendence, repair or redundancy, sustainability or exit. Nothing will have escaped recuperation to the human idea, even its own supersession. Here the dialectical character of Baudrillard’s schema comes into view *as the real teleology of the simulacral as such* (from the world in “God’s image” to the image as god) – a movement uncannily retraced in the more recent (de)anthropic turn of François Laruelle’s “general science fiction.”

“Science fiction,” Laruelle argues, “is a minor genre of literature entrusted to an arbitrary imaginary [...] but it is possible to refound it [...] as a non-philosophical genre, on strictly generic bases, ones that are consolidated by another use of the quantic, as model rather than as furnishing of the Universe.”<sup>11</sup> This re-founding of science fiction, as a strategic re-founding of philosophy, assumes the form of an inverted Platonism, and like Baudrillard’s schema adopts a predictably tripartite form:

- 1) “the introduction of contemporary science in the form of the quantic as model into the heart [of science fiction]”;
- 2) “its object or outcome is the destiny of humanity in transit between the Earth, the World, and the Universe”;

<sup>9</sup> Baudrillard n.p.

<sup>10</sup> Baudrillard n.p.

<sup>11</sup> François Laruelle, *Tétralogos* (Paris: Le Cerf, 2019) 112. Extracts translated by Terence Blake.

3) “the ‘World’ as Bad-world or history is only an unplanned and unfortunate halting point on this voyage which leads it to the Just-world.”<sup>12</sup>

In this, too, we are challenged with the need to de-schematize the concept of “simulacrum” as that of an anthropo-teleology which would recuperate science fiction’s “cognitive estrangement”<sup>13</sup> for a *genre* of dialectical reason (even one posed in the guise of non-philosophy). It is necessary, nonetheless, to identify the seemingly counter-intuitive forms in which this logic reconstitutes itself, whether under the constellation of a metaphysics or of a technologism.

Between Baudrillard and Laruelle, the precession of simulacra and the ascent/descent of the anthropic<sup>14</sup> describes the topology of a certain “truth” that doubles the movement of Reason itself. Conceived by Lacan as the inscription of the analytic scene *par excellence*, this movement narrates itself as the very object it seeks to discover. Just as “the unconscious is structured like a language,”<sup>15</sup> Lacan is able to propose that “truth declares itself in the structure of fiction.”<sup>16</sup> If science (as “quantic model”) binds truth within a system of prediction or predication (in which, for Lacan, *its signifier always reaches its destination*), this is only to the extent that the system of science itself *stands in place of truth*. This identification of the one with the other nevertheless turns upon an irreducible “cognitive estrangement,” since – in and of “itself” – truth can never be subsumed into a mere coincidence with any scientific system or systematicity in general.

The art of revelation (of truth) that here supposedly belong to science remains indelibly that of a fiction, of the possibility of fiction, which would include the fictionality of *representation as such*. For it is at precisely this point of revelation (the consciousness of simulacra; the subsumption into utopia) that a “quantic” truth elides with *mimēsis*. It is a measure of even the most ‘materialist’

<sup>12</sup> Terrence Blake, “Laruelle and Radical Science Fiction” (October 2019), [https://www.researchgate.net/publication/336304335\\_LARUELLE\\_AND\\_RADICAL\\_SCIENCE\\_FICTION](https://www.researchgate.net/publication/336304335_LARUELLE_AND_RADICAL_SCIENCE_FICTION), accessed 19 December 2019.

<sup>13</sup> Darko Suvin sought to define science fiction as a “literary genre whose necessary and sufficient conditions are the presence and interaction of estrangement and cognition, and whose main formal device is an imaginative framework alternative to the author's empirical environment.” See *The Encyclopaedia of Science Fiction* (“Darko Suvin”), [http://www.sf-encyclopedia.com/entry/suvin\\_darko](http://www.sf-encyclopedia.com/entry/suvin_darko), accessed 19 December 2019.

<sup>14</sup> Blake n.p.: “One could summarise Laruelle’s complete formula for science fiction: hard science, space opera, human destiny from dystopia to utopia.”

<sup>15</sup> Jacques Lacan, “The Subversion of the Subject and the Dialectic of Desire in the Freudian Unconscious,” *Écrits*, trans. Bruce Fink (New York: Norton, 2006) 671ff.

<sup>16</sup> Jacques Lacan, “Seminar on ‘The Purloined Letter,’” *Écrits* 7.

(of such discussions remains bound to what amounts to a teleological/instrumentalist conception of both temporality and technology, by way of an equally teleological/instrumentalist conception of knowledge and information. It would be easy to cite further examples, more or less at random, to demonstrate this point, but one more should be sufficient. Thus:

Science fiction works to extrapolate elements of the present, push actually existing conditions all the way to the most extreme consequences. That is to say, science fiction is not about the actual future, rather it's about futurity, if I can use that as an abstract noun... Science fiction grasps and brings to visibility what the philosopher Gilles Deleuze calls the virtual, or what Karl Marx sometimes called tendential processes. Tendential things or tendencies are not things that have to happen but there's a movement towards their happening. Science fiction picks at certain implicit trends that are embedded in our actual social technological situation. These are elements of a futurity which exist in the present, they aren't really present because they're not really happening but they represent a kind of futurity, whether or not they actually turn out to happen in the future.<sup>17</sup>

Tendential processes, like algorithmic processes, are entroped: they are *turned* towards the production of 'possible' futures. Which is to say, they represent means of production of possibility *as such*: one via the amplification of emergence, the other through foreclosure. The zone in which these complementary functions appear to intersect is, however, not a representation in prototype, nor a predictive model, but a simulacrum of instrumental reason itself, as the spectral hauntology of that which is always *yet-to-come*.

### **Future (as) Cinema**

Even if its 'image' is literally that of a kind of cinematograph, a certain technical evolution – from Méliès' *Le Voyage dans la lune* (1902) to Kubrick's *2001: A Space Odyssey* (1968) and beyond – has predisposed the discourse of instrumental reason to a dominant mode of *realism* – even of the fantastic, of the *impossible*. Its aesthetic logic – on the pretence of being internally verifiable – has tended, since

<sup>17</sup> Steven Shaviro, *No Speed Limit: Three Essays on Accelerationism* (London: Continuum, 2015) <https://manifold.umn.edu/read/no-speed-limit/section/1b09b41b-002e-4b2d-ade0-b7ee76e5e9cc>, accessed 19 December 2019



its inception, towards the foregone conclusion, the self-fulfilling-prophecy, the *fait accompli*. This teleological faculty is deeply rooted in the structure of the image itself, in its reflection effect, and in that projective Reason whose temporal difference nevertheless appears to resolve the very paradox of manifold Time itself, by inscribing cinema *as history* (as Godard has said) within a *future* that is already the truth of cinema. No longer would it be to necessarily speak of the future as a dream of the unrepresentable – of the *fantasy of the real* or of an *immanence* beyond presentiment – but as the necessity and impossibility of *representation as such*.

Here stands the crux of the dispute between science and fiction. Before the question of verity is even able to pose itself, it must contemplate this vista and will ultimately stake everything upon it. For, like fiction, it belongs to a radically determinate universe, in which it is nevertheless unable to envisage its own end. Confronted with a proliferation of singularities, it evokes a crisis of universal laws: physics itself breaks down. And like institutionalised psychoses, these singularities have nowhere to go *unless it is to reconstitute the universal elsewhere, under other regimes (of the law) (of Reason)* – in some parallel dimension, perhaps. But are we not forever in some *parallel dimension*? The dimension of *signifiante*? The “End of History” did not require the Apollo moon-landing to bring it into view – other than in the realm of a certain political conspiranoia – just as it did not require Auschwitz or Darwinian evolution. Wherever the insurmountable has been evoked, depicted, or instrumentalised, it has only ever served to instigate a countermovement, tending quasi-dialectically to the production of historical prostheses: a technology of indefinite extension, renewal, reproduction.

Even if the very premise of such a thing as evolution demands a corresponding thought of the *finitude of ‘man,’* of an idea of humanity bound to supersession, it also advances a mechanism for the transcendence, not only the contingencies of worldly existence, but of *evolution itself*. And here lies the seeming paradox of the so-called ‘present condition’: humanity – that collective phantasm – has either to exist in the *real futures* of its technological dreaming, or cease to be. Which is to say, it must confront that fact of its having *already* ceased to be. To rephrase Marx, a spectre is haunting Reason; the spectre of humanity. And if Landian hyperstitionality can be understood in Mark Fisher’s terms as the dialectical counterpart of a *hauntology of lost futures*<sup>18</sup> – being the driving impetus of every posthumanism – this too demands an understanding of what amounts to a *ressentiment* in the instrumentalised fiction of the End-of-History. To evolve

<sup>18</sup> Mark Fisher, *Ghosts of My Life: Writings on Depression, Hauntology and Lost Futures* (Winchester: Zero Books, 2014).

beyond its Earthly condition, like the “talents” (mutants) of Dick’s novels, or seek to conserve itself in a metaphorical iron lung, cryogenically immersed for untold millennia in a ‘virtual reality’ from which there can, in fact, be no exit (no *other reality*), the idea of humanity becomes the adversary of the world.

It’s as if, overwhelmed by the creeping pessimism of a revealed certainty, an untold resourcefulness contained in the words ‘science fiction’ finally becomes apparent, not as a smoke-and-mirrors distraction from the so-called real world, but *as* the ‘real world.’ Quotidian experience has become saturated with the technological legacies of Apollo: the pervasively simulacral access to experience defined by the World Wide Web, cloud computing, algorithmic social media, dronology and the proliferation of data-harvesting. Humanity has indeed already become a hostile figment of its global self, a malevolent spectral presence in the expanded field of a spectacularised present that no longer acts as if to mask the provisional fictionality of any given future (those former ‘manifest destinies’) but to mask the fact of humanity’s ‘real absence’ from a future that can *only* exist on those terms. (Such has been theorised at length by Guy Debord in *The Society of the Spectacle* [1967] and explored cinematically in such films as Chris Markers *La Jetée* [1962] and Rainer Werner Fassbinder’s 1973 telemovie *Welt am Draht*.)

Having apparently become the god-like agents of technological evolution in the Anthropocene, humanity is confronted with an unbearable scenario – in which the world-to-come is no longer provisional upon human agency, but the contrary, as what Artaud called a *subjectile*, produced by space-time algorithms of stochastic feedback. And this in turn requires a particular sanguine view of things, if what passes for a critical and cultural consciousness is not to regress into a neo-Humanistic sentimentality – which may be said, in light of the cybernetic revolution that followed from it, to account for a certain *existential turn* in post-Apollo science-fictional *real-ism*. Yet this would not be the same thing as Baudrillard’s insistence that

the SF of this era of cybernetics and hyperreality will only be able to attempt to ‘artificially’ resurrect the ‘historical’ worlds of the past, trying to reconstruct *in vitro* and down to its tiniest details the various episodes of bygone days: events, persons, defunct ideologies – all now empty of meaning and of their original essence, but hypnotic with retrospective truth. [...] like a gigantic hologram in three dimensions, where fiction will never again be a mirror held to the future, but rather a desperate rehallucinating of the past.<sup>19</sup>

<sup>19</sup> Baudrillard n.p.

A past which is *always already* a work, a texture or fabric or web, of hallucinations. That is to say, of what Lacan calls “the fundamental fantasy.”<sup>20</sup>

### The Truth in Fiction

“It is truth [...]” Lacan notes (in his seminar on Edgar Allan Poe’s “The Purloined Letter”), “that makes the very existence of fiction possible.”<sup>21</sup> And while a certain appeal to common sense might seek to define science as that domain of “systematic and formulated knowledge” (OED), and therefore of “truth,” from which fiction must necessarily be *excluded*, such a “common sense” is contradicted by an integral relationship between fiction and truth that lies at the heart of a body of philosophical thought encompassing the work of Plato (dialogues), Descartes (*Meditations*), Leibniz (the doctrine of infinitesimal magnitudes) and Kant (*das Ding-an-sich*), among others. Terms such as ‘conjecture,’ ‘hypothesis,’ ‘model,’ ‘theorem,’ ‘experiment’ anchor scientific discourse. One speaks of a ‘calculus of probability,’ of an ‘uncertainty principle,’ of ‘complexity’ and ‘indeterminacy.’ Yet while such terms remain distinguished from speculation of the merely ‘imaginary’ kind, within any scientific description we inevitably encounter propositions that are in some regard provisional, analogical, or metaphoric – in short, a whole *poetics*. In so doing, we find ourselves in a zone of ambivalence between ‘science,’ as it is commonly understood, and rhetoric, philosophy, literature, art, cinematography, etc.

It has always been a feature of science that its capacity to know is ultimately determined by its capacity to formulate representations of the unknown. Ordinarily, this takes the form of testable hypotheses. An hypothesis, as Henri Poincaré once remarked, is first and foremost a type of generalisation: it provides an overall framework upon which to structure a local or worldview. Such hypotheses nevertheless also present science with a dilemma, since until they are proven they are potentially false – indeed, in this *provisional state*, they are no more than elaborately constructed *as ifs*. In other words, species of fiction. And yet hypothesis is necessary for science to proceed, *in anticipation of* experimental proofs or observable facts.<sup>22</sup>

<sup>20</sup> Jacques Lacan, *Le séminaire VIII: Le transfert, 1960-61*, ed. Jacques-Alain Miller (Paris: Seuil, 1991) 127.

<sup>21</sup> Lacan, “Seminar on ‘The Purloined Letter’” 7.

<sup>22</sup> The question of the epistemological status of fiction has evoked a great deal of debate. Strong positions have been taken especially against supposed forms of cultural relativism, in which the differences between science and the arts are allowed to become obscured in the name of a generalised discourse of ‘alternative facts.’ Against this

During the late eighteenth century, Jeremy Bentham formulated a “theory of fictions” in which fiction was regarded positively as an unavoidable and indeed indispensable product of *all discourse* – as distinct from Francis Bacon’s view of fiction as a superstitious “idol.” Bentham recognised the *necessary* similarities between the conjectural form of scientific method and so-called literary language. Developing this line of thought from the late nineteenth century, Hans Vaihinger, in his *Philosophy of As If: A System of the Theoretical, Practical and Religious Fictions of Mankind* (published 1911), specified an array of instances in which “fictive” thinking – or the “fictive activity of the logical function” – lends impetus to such practical and theoretical domains as biology, mathematics, physics, philosophy, psychology, and jurisprudence. Although Vaihinger made distinctions between different kinds of fiction, all of them were reducible to the sequence of thought encapsulated by the “as if.” Additionally, Vaihinger argued that science – as a set of experimental epistemologies – is necessarily speculative, since it can never really “know” (or directly experience) the underlying reality of the world. Rather, it constructs simulations and acts “as if” these correspond to a directly objectifiable reality that, in ideal circumstances, *could* be known or experienced.

### **Irrational Counterparts**

The worldview presented by scientific reason is, for Vaihinger, thus constructed *upon a fictional foundation*, albeit a highly coherent and functional one (a system of representations that *works*; an *economimesis* inherently productive of a critique of the spontaneity of so-called unmediated experience, of *presentation*).<sup>23</sup> This view reflects the practical reliance of science upon hypothesis, but also a dependence upon technically-mediated forms of verification (everything from high-speed photography, to x-ray and infrared, to the Large Hadron Collider). From the industrial revolution onwards, it has been increasingly the case that science is concerned with what, for human observers, remains fundamentally

relativistic standpoint it is argued that the use of fiction and hypothesis obey strict rules from the point of view of finality and justification, which forbid us to consider fiction and hypothesis as equivalent. We may see, however, that a so-called ‘equivalence of fictions’ is not the same as recognising an equivalence of discursive structures. (To rephrase Wittgenstein, there is no ‘scientific language,’ there is only language as such; for a proposition to be possible at all, it must be possible across discourse, *without exception*. It is for precisely this reason that an environment of ‘alternative facts’ is able to operate at all.)

<sup>23</sup> Jacques Derrida, “Economimesis,” trans. R. Klein, *Diacritics*, 11.2 (Summer 1981): 2-25.

unknowable or *unpresentable* – if by *knowable* we also mean *directly available to experience* rather than as an *artefact* of a calculus or system of thought or methodology.

Vaihinger's theory of fictions likewise attempted to address questions of subjectivity and the preponderance of individuals to employ psychological fictions to mediate their experience of 'irrational' social realities.<sup>24</sup> The forms of simulacra encountered in paranoia and hysteria, for example, point towards a functional equivalence of reality and fiction at certain crucial junctures (for example, in the experience of what Philippe Pinel, in his 1802 *Traité médico-philosophique sur l'aliénation mentale ou la manie*, termed "mental alienation"): an equivalence that comes to haunt not only the methodological dependency of scientific positivism upon the "as if," but also the status of this "as if" as *foundational for scientific method as such* (because foundational for reason). It poses, in short, the question of a 'fictional rationality,' which has potentially far-reaching consequences for the epistemological privileges attendant upon the *forms* of rationality – principle among them being the discourse of realism (which it is, incidentally, the 'task' of science, as it was once the 'task' of philosophy, to distinguish from fiction: the valorisation, we might say, of techno-scientific *capital*).

Where the philosophy of Vaihinger bears most incisively upon the question of "science fiction," though, is with regards to the domain of the *unverifiable*. Just as a 'literature of the possible' must necessarily evoke the limits of the *impossible*, so too the generalised form of hypothesis must also evoke a type of *irrational counterpart*. Vaihinger argued that fiction forms a class of hypothesis *not* subject to ordinary criteria of verification: not merely because such fictions are patently false, but because *certain hypotheses concern problems for which there are no 'rational' solutions*. It's here that such later developments as set theory, general relativity, quantum, chaos, etc. are confirmed in their suspicion of the existence of seemingly 'irrational' logics that violate, contradict or negate what amount to *ideological assumptions* in the framing of universal laws.

In an attempt to establish general criteria for scientific discourse, Karl Popper famously invoked the term "falsifiability."<sup>25</sup> Any statement that can be demonstrated to be true, can be falsified – and it is the possibility for falsification that distinguishes science from 'mere' fiction, since in the realm of fiction there are formal criteria of verifiability. Indeed, fiction – as Vaihinger earlier argued –

<sup>24</sup> Ideas which echo those of Charcot, Breuer and Freud concerning hysteria – in which psychosomatic illness is recognised as indistinguishable from 'conventional' illness.

<sup>25</sup> Karl Popper, *The Logic of Scientific Discovery* (London and New York: Routledge, 1992) 18, 66, 95ff, 129-30.

represents precisely what is *un-verifiable*. And since it is not verifiable, neither is it falsifiable. This dualistic view, however, exposes itself to a number of important ambiguities, and it is from this core of ambiguity that “science fiction” presents a kind of quasi-dialectical “alternative three.”

### Superior Realism

When *Amazing Stories* editor Hugo Gernsback coined the term “scientifiction” (in “Baron Münchhausen’s New Scientific Adventures: Thought Transmission on Mars,” in the January 1916 issue of *Electrical Experimenter*)<sup>26</sup> – ten years before John Logie Baird demonstrated a viable television broadcast system – it anticipated an emerging new wave of popular techno-consumerism that would reach its height in 1950s America, at precisely the time when former Nazi rocket scientist, Wernher von Braun – the man largely responsible for the V2 – was teaming up with Walt Disney on the production of a series of TV advertorials (based on von Braun’s 1948 “novel” *Das Marsprojekt* and a series of articles later published in *Colliers* entitled “Man Will Conquer Space Soon”) to promote the seemingly fantastic idea of putting a man on the moon.<sup>27</sup> By the time von Braun was heading NASA’s Marshall Space Flight Center, tasked with developing the Saturn V rocket, space travel had moved from the realm of fantasy to that of plausible science (or what Gernsback called “science faction”<sup>28</sup>), and its popular

<sup>26</sup> Hugo Gernsback, “Baron Münchhausen’s New Scientific Adventures: Thought Transmission on Mars,” *Electrical Experimenter*, 3.9 (January 1916): 475.

<sup>27</sup> In the twentieth century, with the increased prevalence of new information and communication technologies, and of mass mechanised warfare, many writers no longer viewed “science fiction” as representing a domain of literary utopianism, but rather a *state of affairs* reflecting a technocratised reality. We might think of George Orwell’s *1984*; Karel Čapek’s *R.U.R. (Rossum’s Universal Robots)*; or even Fred M. Wilcox’s 1956 film *Forbidden Planet* in which Shakespeare’s Caliban reappears in the form of a robotic “id monster” (Reason’s nemesis). During the 1920s and ‘30s, the rise of fascism exploited a wide-spread form of technological irrationalism and utopianism, sustained by a massive project of pseudo-scientific propaganda. In reaction, during the period following WW2 we encounter increasingly radical elements in ‘science fictional’ writing – including the work of novelists like Anthony Burgess (*A Clockwork Orange*) and behavioural scientists like José Delgado (*Towards a Psychocivilised Society*). These works respond in conflicting ways to the belief that social ills, including the abuse of science represented by the Nazi holocaust, may be remedied by means of *new* forms of ethics, education and social engineering.

<sup>28</sup> Hugo Gernsback, “Science Fiction versus Science Faction,” *Wonder Stories Quarterly*, 2.1 (Autumn 1930): 5.

depiction in film evolved accordingly: from George Pal's *Destination Moon* (1950) – which borrowed von Braun's moonrocket design and incorporated plot elements that would uncannily recur in Alfons Cuarón's *Gravity* (2013) – to Kubrick's *2001*, which famously employed a team of NASA engineers and cyberneticists, including Marvin Minsky, as production consultants.

In the period between the wars, science entered into everyday life in entirely unprecedented ways. By the time terms like “science fiction” and “sci-fi” appeared in the 1930s and 1940s, the popular awareness of science had been transformed. This continued a trend from the late nineteenth century, when the term “scientific romance” was used in Britain to describe work by writers such as H.G. Wells and Jules Verne. And we can trace the evolution of science fiction as a literary genre through the various stages of the Industrial Revolution, linked to the popularisation of scientific discovery from the early eighteenth century onwards. Of course, it can and has been argued that science fiction emerged when ‘science’ itself did.

Between the appearance of Aristotle's *To Organon* in the 4<sup>th</sup> century B.C. and Bacon's *Novum Organum* in 1620, there was no strict disunity between what, today, we call science and what we broadly call fiction. It was Bacon – regarded by Voltaire as the father of experimental philosophy – who insisted upon the *dissolution of myths* and the substitution of facts for ‘fancy.’ *The sovereignty of man*, he argued, *lieth in knowledge*. Yet, as Derrida has argued, if “scientific knowledge is a power; art is what it does not suffice to know.”<sup>29</sup> The dichotomy of science/fiction not only establishes the terms of an antagonism but, in a dialectical movement in which the hegemony of knowledge asserts and ramifies itself, inscribes a *detour of truth through fiction* – a movement dilated within what Derrida, in a critique of Lacan's seminar on Edgar Allan Poe, calls “the time of an algorithm.”<sup>30</sup> In a later seminar on Gide (1958), Lacan similarly advances the observation that “there is so little opposition between this *Dichtung* and *Wahrheit* in its nakedness that the fact of the poetic operation rather should give us pause before the characteristic which is forgotten in all truth, that it declares itself in the structure of fiction.”<sup>31</sup> From which Derrida draws the following conclusion:

Truth governs the fictional element of its manifestation, which permits it to be or to become what it is, to declare itself. Truth governs this element

<sup>29</sup> Derrida, “Economimesis” 5.

<sup>30</sup> Jacques Derrida, “Le facteur de la vérité,” *The Post Card: From Socrates to Freud and Beyond*, trans. Alan Bass (Chicago: Chicago University Press, 1987) 436.

<sup>31</sup> Jacques Lacan, “The Youth of Gide, or the Letter and Desire,” *Écrits* 625 – translation modified: see Derrida, “Le facteur de la vérité” 467.

from its origin or its telos, which finally co-ordinates this concept of literary fiction with a highly classical interpretation of *mimēsis*: a detour toward the truth, more truth in the fictive representation than in reality, increased fictionality, “superior realism.”<sup>32</sup>

### Another End-of-History Is Possible

A critical-satirical turn in modern science fiction can be traced back to such works as Mary Shelley’s *Frankenstein* and the earlier writings of Voltaire and Jonathan Swift. *Frankenstein* presents the dilemma of “artificial life” as the spectre haunting instrumentalist Reason, while both *Micromégas* and *Gulliver’s Travels* are reflections upon ideas previously expressed in Bacon’s *Novum Organum* – in which the concept of *una scientia universalis* explicitly links knowledge and political power. But where science fiction is generally viewed as continuing a long tradition of utopian and speculative literature, here the transparently mimetic character of this projection is subverted by way of a sceptical reflexivity, brought to bear *as discourse*. The broad ramification of this critical-satirical turn encompasses the entire epistemological and speculative orientation of the genre, extending to every aspect of its realism. At the same time, this turn is mirrored in a consciousness of science fiction having become, as J.G. Ballard argues, *the only possible realism*. “Everything,” Ballard writes,

is becoming science fiction. From the margins of an almost invisible literature has sprung the intact reality of the twentieth century. [...] In essence, science fiction is a response to science and technology as perceived by the inhabitants of the consumer goods society, and recognizes that the role of the writer today has totally changed – he is now merely one of a huge army of people filling the environment with fictions of every kind. To survive, he must become far more analytic, approaching his subject matter like a scientist or engineer. If he is to produce fiction at all, he must out-imagine everyone else, scream louder, whisper more quietly. For the first time in the history of narrative fiction, it will require more than talent to become a writer.<sup>33</sup>

<sup>32</sup> Derrida, “Le facteur de la vérité,” 467-68.

<sup>33</sup> J.G. Ballard, “Fictions of All Kinds,” #Accelerate#: *The Accelerationist Reader*, ed. Robin Mackay and Armen Avanessian (Falmouth: Urbanomic, 2014) 237-38.



This *only possible realism* is the very subversion of every realism. "Above all," Ballard suggests, "science fiction is likely to be the only form of literature which will cross the gap between the dying narrative fiction of the present and the cassette and videotape fictions of the near future."<sup>34</sup>

But how does this distinguish science fiction from a trivialising 'reality' of technical artefacts? Artefacts that are supposedly *of their time* by somehow nevertheless *being before it*?

Intuiting this recurrent mode of anachronism in the formulation of *what science fiction is*, Nabokov once observed that if the strict definition of a literary genre were to be applied, it would be necessary to begin with Shakespeare's *The Tempest*.<sup>35</sup> Irrespective of how the term "strict" is defined, Nabokov is right in intuiting *The Tempest's* situation at a critical juncture in the relationship between *history, knowledge* and *art*, and the discourse of power and *realpolitik*. There is also the fact that Shakespeare's text represents something of a preview of the crisis in the 'real' inaugurated by the capitalist system of value-production in the following century, the subsequent 'autonomy' of the commodity fetish, the post-industrial "society of the spectacle" and the more-or-less current 'cybernetic revolution.' That is to say, of a quasi-automated socio-political apparatus of control, computed and operated by an epistemic system whose proxies threaten – beyond any 'purely' mimetic function – to become independent and overwhelm their master. This revolutionary threat is averted by a strategic manoeuvre of self-supersession, which in fact relinquishes nothing. Power *lives on*, as it were, in the figure of a sentimentalised 'emancipative' Reason. In this, Shakespeare's text seems to intuit the coming 'technological singularity' – wherein an all-too-human tyranny engineers its succession under the guise of a 'posthuman future' – is brought into view as the true meaning of this History-annihilating tempest.

Borrowing its title from a line in Shakespeare's play, Aldous Huxley's *Brave New World* (a 1932 re-versioning of perhaps the very first sci-fi 'novel,' Plato's *Republic*), offered precisely such a futuristic vision of technological utopia and social engineering; a vision which Bertrand Russell (whose *The Scientific Outlook* appeared a year earlier), lamented "is all too likely to come true."<sup>36</sup> Like *The Tempest*, *Brave New World* treats the relationship between knowledge, illusion

<sup>34</sup> Ballard, "Fictions of All Kinds" 237.

<sup>35</sup> And, presumably, Ariosto's *Orlando Furioso* and Cyrano de Bergerac's *Voyage de la Terre à la Lune*, among others. See Vladimir Nabokov, *Strong Opinions* (New York: Vintage, 1973) 87.

<sup>36</sup> See Bertrand Russell, "We Don't Want to be Happy," *The New Leader*, 11 March 1932.

and the power of reason. Unlike Shakespeare's play, however, Huxley's novel is a *savage critique* of the idea of benevolent science and bio-technological progress. In this "brave new world" the perfectibility of man has given way to the abolition of the human, where man's existence becomes a 'consensual' enslavement to technocratic rationalism, eugenics, social Darwinism and the soporific spectacle of progress.<sup>37</sup>

### Techno-Primitivism

The *pantographic exuberance*<sup>38</sup> of Huxley's nightmare of universal happiness exposes the contradictions of utopian thought linked to the emancipation of man from the so-called irrationalism of nature (capitalism, by any other name). We are confronted with the terrible realisation that utopias are not merely political fictions but always *threaten to become real*. "Life," as Huxley's epigraph announces, "marches towards utopias," and it is the task of humanity to discover the means to avoid their definitive realisation. Here, art and fiction are not only the guiding imagination of a *science of truth*, but its homeostatic regulator, guarding against *scientific excess* (including what Gide calls a realism of "petty and contingent facts"<sup>39</sup>), reminding us that scientific "progress" ultimately serves its own ends and that these ends are not always compatible with the idea of humanity.

In *The Tempest*, Shakespeare, borrowing from Montaigne, also reflects upon the possibility of an *ideal* society governed by reason. The microcosm of Prospero's island is a working hypothesis of such a pseudo-utopia, organised around the singular idea of a real accession to power via a certain *truth* of the principle of *scripta manent*. It represents a dictatorship of 'pure reason,' with its systematic vanities, its narcissism, its overweening ambition to universality. The illusionism vested in a *scientia universalis* is relinquished only at the point at which Prospero abandons (flees?) his island and returns, from exile in the realm of 'phantasy,' to that of 'real' political power. The authoritarianism of Prospero's 'science' exposes itself in its hidden counterpart, hinted at in the alien/ated

<sup>37</sup> It is in this respect that Ballard argues, however contentiously, of "The compassion, imagination, lucidity and vision of H.G. Wells and his successors [e.g., Huxley], and above all their grasp of the real identity of the twentieth century, dwarf the alienated and introverted fantasies of James Joyce, Eliot and the writers of the so-called Modern Movement, a nineteenth-century offshoot of bourgeois rejection." Ballard, "Fictions of All Kinds" 237.

<sup>38</sup> Baudrillard n.p.

<sup>39</sup> Quoted in Derrida, "Le facteur de la vérité" 467.

(colonised, enslaved, subproletarian, denaturalised) figure of Caliban, representing a completely *other* kind of 'utopia' from the one promised – but never realised – by Prospero's invocation of *scientia universalis*. It is a utopia, as Montaigne says (in reply to Plato), which "hath [...] no knowledge of letters, no intelligence of numbers, no name of magistrate, nor of politike superioritie."<sup>40</sup> Prospero's techno-primitivist 'science' is here vested in the art (the *stratagem*) of a concealing-unconcealment, in which the organic veils of truth appear in the operations of a fiction that has been 'rationalised' into a system indistinguishable from it.

As framed in Shakespeare's text, this simulacral *state of nature* contains no *falsehood as such*, merely an 'ignorance' of the Law of *scientia universalis*. There can neither be any question of access to a doctrine of 'truth' beyond its own narrative enframing. And insofar as its *topos* is made to resemble the archetypal *garden*, it serves to evoke a regression of *savage thought* forever falling under the sway of a *technē politikē* it is incapable of representing to itself, other than as a miraculous power. It is this illiterate, superstitious non-knowledge that nevertheless *underwrites* Prospero's own panoptical *dystopia*. It is both a prison and a phantasm: an ecology of radical contradictions, driven by a *metabolic rift* in the subordinated forces of nature and a fantastic *return of the real* by way of the *technē of the word*. As allegory of a certain transcendental reason *at the service of an ultimate restitution of the political order*, this movement becomes the object of a whole series of ideologically inflected "sciences," culminating in that of a historical materialism that (in a seeming re-enactment of Prospero drowning his books) supersedes itself in the accomplishment of the End of History and the insipidity, as Lacan says, "of our contemporary superman."<sup>41</sup>

### **Anthropocenic Vistas**

Seemingly worlds away, the inauguration of the "space race" by the launch of Sputnik by the USSR in 1957 – and brought to a climax by the Apollo lunar missions twelve years later – served to erode many of the conventional distinctions that had grown out of the Renaissance between science, fiction and 'science fiction.' By 1975, after the remnants of the Apollo project had morphed into Skylab (accompanying a vast communications project anticipating the advent of GPS), the space race had exhausted its immediate value as political spectacle as well, supposedly, as its scientific *raison d'être*. Where it had been von

<sup>40</sup> Michel de Montaigne, "Of the Cannibals," *Essays*, trans. John Florio (London: Edward Blount, 1603) 258.

<sup>41</sup> Lacan, "Seminar on 'The Purloined Letter'" 11.

Braun's express view that Apollo was simply a dry run for manned missions to other planets in the solar system, for those holding the NASA purse-strings it had served ultimately as a potlatch directed at Moscow (like Reagan's "Star Wars" project a decade later and, arguably, the Space Shuttle programme that replaced Apollo, whose Soviet analogue – Buran – virtually bankrupted Roscosmos at the beginning of the 1990s).

For the grand historical occasion marking the transition from interplanetary to Earth-bound 'manned space exploration,' the Soviet and US governments orchestrated another bit of live televised agitprop, symbolising the new policy of détente and ceremonially marking the official end of the superpower "space race," with a handshake between the crews of Soyuz 19 and the last Apollo module to be launched. It occurred at a time of extraordinary political unreality in the US, after the turmoil of the Nixon administration and the Vietnam War, and against a backdrop of paranoia and conspiracy theories not far removed from the daily fair of TV news reality. In any case, by 1975 the vision of a future space-faring species (in Carl Sagan's phraseology) appeared to have terminated in low Earth orbit, where it has remained more or less ever since, pending the future emergence of another corporate-state arms race.<sup>42</sup>

The termination of the lunar programme and the one-off Apollo-Soyuz Test Project thus presenting a fertile opportunity for an obscure group of British filmmakers to produce a fake episode of the popular *Science Report* documentary series on Anglia TV. Directed by Christopher Miles and featuring former newscaster (and Tory member of parliament) Tim Brinton, *Alternative 3* (1977) presented itself as an investigative report into links between climate change, Britain's "brain drain," and a secret US-Soviet project to establish a colony on Mars. Intended for broadcast on April Fools Day, the *Science Report* hoax supposedly provoked front-page hysteria in the nation's tabloid press, reminiscent of Orson Welles' 1938 radio broadcast of *War of the Worlds*. Yet unlike Peter Hyams' *Capricorn One* of the same year, which converted the Apollo lunar landing conspiracy theories into a fake NASA mission to Mars (again replete with live TV broadcasts), *Alternative 3* exploited the medium of the TV

<sup>42</sup> One that may be driven by the entry of China, Japan, India, Israel and by privateers like Virgin Galactic and SpaceX. There have, in any case, been an increasing number of revivals of Wernher von Braun's space colonisation project, from Robert Zubrin's *Mars Direct* – the inspiration behind Brian De Palma's *Mission to Mars* (2000) and Ridley Scott's *Martian* (2015) – to Elon Musk's SpaceX, which in 2018 successfully launched a test payload aboard the Falcon Heavy rocket comprising a Tesla Roadster, a stereo playing David Bowie's "Space Oddity" on a loop, and a digital copy of Isaac Asimov's 1950s *Foundation* saga encoded on a data crystal.

science documentary to expose a (fake) conspiracy between the Cold War powers in which the Soyuz/Apollo programmes served as a joint front to cover-up a (fictionally 'real') Mars landing. Of course, what *Alternative 3* was actually about was the ideological 'medium' of information itself.

Combined with 'real-world' scenarios of industrial wastage, over-population, resource degradation, ecological catastrophe and every other life-threatening symptom of globalisation, *Alternative 3* uncannily projected a conspiratorial vision of the end of the Cold War, cyberspace, artificial intelligence, the all-pervasiveness of the military-industrial complex and the secret commodification of space. And it's in this last respect – as *prospective* cinema of the Anthropocene – that *Alternative 3* is most incisive. Posed as an escape plan (while there's still time to leave this planet and colonise another), what the film's eponymous "Alternative 3" in fact proffers is a bold project for the *preservation of the status quo* under the guise firstly of *sustainable* political, economic and technological progress (space as the ultimate arbiter of social-Darwinistic struggle, in which the Cold War has become merely a *pretence*) and secondly of environmental transcendence (the colonisation space and evacuation of Earth as *necessity*). Both are nevertheless suspended in a type of "indefinite and unending"<sup>43</sup> hyper-industrial present, whose aim is to propagate a simulacrum of itself, both in space (other worlds) and time (ownership of the future). This is precisely the implied sense of 'global power' that merges with Fukuyama's post-1989 "End of History" and what Baudrillard calls the "projective hypostasis of the robot."<sup>44</sup>

### The Future of a Disaster

In its increasingly critical response to the evolution of corporate-political power and the cyberneticisation of society, 'science fiction' at the turn of the millennium was no longer concerned with positing a present-transcended but – like Terry Gilliam's 1995 remake of Marker's *La Jetée*, *12 Monkeys* – a future-foreclosed. In this mode of recursive cinema, History collapses back into the illusion of itself in a closed loop of collective alienation, manufactured consent, rampant commodification and the advent of a "post-truth" epoch dominated by fully-automated global surveillance systems. We have moved from the panoptical war machine of Godard's *Alphaville* (1964) to the multi-level computer-simulation of Fassbinder's *Welt am Draht*. Fassbinder's "Simulacron" (designed by the "Institut für Kybernetik

<sup>43</sup> J.G. Ballard, "Memories of the Space Age," *The Penguin Book of Modern British Short Stories*, ed. Malcolm Bradbury (London: Penguin, 1988) 237.

<sup>44</sup> Baudrillard n.p.

und Zukunftsforschung" [Cybernetics and Future Research Institute] as a global simulation or virtual reality machine for modelling future economic events) is to Godard's "α60" (the handiwork of a certain Professor von Braun) as William Gibson's "Matrix" is to Kubrick's "HAL." The world of Fassbinder's "Simulacron" is itself an immersive *expanded cinema*, in which the carceral logic of *subjection* revolves into the production of *subjectivity*: there is no external galaxy of the 'real' to which its pseudo-protagonists might escape, there is only the "simulation" of an outside, itself a simulation. Ultimately there's nothing but simulacra *all the way down*.

In 2003 Gibson remarked that, if "science fiction" has tended increasingly towards cinematic *realism*, this derives from an impulse to conceal the fact that "we have no *future* because our present is too volatile... We have only risk management. The spinning of the given moment's scenario."<sup>45</sup> According to Gibson, as Western society evolves further into the realm of the virtual and the so-called posthuman, "the future" tends increasingly to assume the appearance of a *preservation strategy*.<sup>46</sup> This sense of "preservation," in which science fiction corresponds to a multiple-scenario system of prospective disaster management overlapping the Anthropocene, points to the tension between the instrumental function of simulationism and the relation of fiction-to-truth (in Lacan's formulation) as a signifying *automatism* in which technology, the (future-historical) present, and the real are equally (if not equivalently) construed. Not only is science fiction a "mapping of the topography of a yawning postcapitalism,"<sup>47</sup> as D. Harlan Wilson has observed, but is itself the discourse of its operations, indeed of its very possibility. And if "Gibson and Bruce Sterling [...] fetishized how electronic technologies invaded, modified, and evolved the flesh," via "a shared preoccupation with [...] commodification of the body and, by extension, the psyche,"<sup>48</sup> this is precisely a measure of the *autonomous* function

<sup>45</sup> William Gibson, *Pattern Recognition* (New York: Berkeley Books, 2003) 59.

<sup>46</sup> Through 'science,' however, we have become accustomed to certainties which are, so to speak, both timeless and tolerant of contradiction. Certainties that possess the adaptive qualities of 'fiction,' and which we may indeed treat as forms of discourse into which the unknown and the indeterminate are constantly assimilated. In this sense, 'science fiction' might describe a mode being *with* possibility. It points to the way in which literature describes a 'philosophy of life' – a means of understanding what it is we are constantly on the verge of becoming.

<sup>47</sup> D. Harlan Wilson, "Experiments in Postcapitalism: On Dempow Torishima's *Sisyphian*," *Los Angeles Review of Books* (3 August 2019), <https://lareviewofbooks.org/article/experiments-in-postcapitalism-on-dempow-torishimas-sisyphian>, accessed 19 December 2019.

<sup>48</sup> Wilson n.p.

Freud and Marx attribute to the fetish as such, as the instigation of agency in and by a system of alienation it would otherwise be taken to merely represent or describe.

Yet within the discourse of posthistoricism *après* Fukuyama it is not the utopian future but the imagined present that stands as the conservational horizon of this “brave new world”: a world nevertheless verifiable only as data-points in an ongoing “hyperstitional” multiple-scenario construct, designed to perpetuate itself *ad aeternitatem*. These are what Gibson, in “The Gernsback Continuum” (1981), called *semiotic ghosts* – a cyberneticised collective unconscious that exists, like its Freudian doppelgänger, in timeless superposition. Alien, this “thing that thinks”<sup>49</sup> is no mere *analogue* of the human, but indicates its – so to speak – divine inscription in the very stuff of the universe (pure information): the stuff from which probability flows towards an inevitable encounter with a cosmic intelligence. In the “epoch” of space exploration, this aspiration-cum-preservation-strategy finds its most explicit form in those summarised digests of human life on Earth sent aboard deep-space probes like Pioneer (10 and 11) and Voyager (1 and 2), addressed to distant extraterrestrial (or future human) ‘life’ – each containing an eccentric array of scientific and cultural data selected by a NASA committee chaired by Carl Sagan: from human biology and Earth’s relative location in the galaxy, to recordings of Bach and images of people shopping in supermarkets.

As a projected encounter with extraterrestrial life – like Nicola Tesla’s radio communications with Mars – Pioneer and Voyager represent the export of a cosmic Humanism. “Billions of years from now,” Sagan wrote, “our sun, then a distended red giant star, will have reduced Earth to a charred cinder. But the Voyager record will still be largely intact, in some other remote region of the Milky Way galaxy, preserving a murmur of an ancient civilisation that once flourished – perhaps before moving on to greater deeds and other worlds [...].”<sup>50</sup> Voyager’s message “to future times and beings”<sup>51</sup> – objectively interpretable, so Sagan believed, by any sufficiently advanced “space-faring” species – represents a *human abstract* for whom both History and the fantastic dream of universal knowledge

<sup>49</sup> René Descartes, “Meditation Two: Concerning the Nature of Human Mind,” trans. Roger Ariew, John Cottingham and Tom Sorrell, *Readings in Modern Philosophy*, vol. 1, ed. Roger Ariew and Eric Watkins (Indianapolis and Cambridge: Hackett Publishing, 2000) 32ff.

<sup>50</sup> Carl Sagan et al., *Murmurs of Earth: The Voyager Interstellar Record* (New York: Random House, 1978) 42.

<sup>51</sup> Sagan, *Murmurs of Earth* 42.

are commodities like any other, married to the sentimental idea of *living on* (what we might call the derivatives market in the *future of an illusion*). It is a narrative of projection and (narcissistic) re-encounter that has found a more recent (and more local) iteration with the 2018 launch of the Arch Mission Foundation's prototype archive of "critical human knowledge" aboard the SpaceX Falcon Heavy, it has taken the provisional form of an "off-site backup," ultimately envisaged as a distributed data network in orbit around each of the planets in the solar system, as insurance against terrestrial catastrophe.

### Logistical Fallacies

The "Arch" (or ark) is encoded in a variety of formats, including 360 terabyte datacrystals, capable of resisting cosmic radiation, with an estimated functionality of 14 billion years (the digital episteme as transcendental signified). As its name intends, this Anthropocenic contingency plan represents nothing less than a future knowledge-platform for an expanded field of human habitation off-world: for the Ark is not simply an escape vehicle, but a *system* of dissemination and re-colonisation. What presents itself as a survival strategy is thus also the germ of a future space technocracy, whose ultimate beneficiary (echoing Aaron Swartz's critique of the intellectual property regimes of JSTOR et al.<sup>52</sup>) would not be those escaping the Corporate-State disaster of the Anthropocene (and its micromanaged, algorithmic, proprietary neoliberalism) – perhaps in the hope of establishing a 'future' public domain – but rather archmission.org itself, their partner Cloud Constellation Corporation, and their institutional subscribers (the dead hand of so-called postcapitalism).

While the science of bulk data transmission and storage in outer-space represents a serious logistical challenge, the idea that such projects are ideologically neutral represents the dominant *science fiction* of our era. It is possible, though, that one day these futurist time-capsules will, despite themselves, come more and more to resemble Frankenstein's "monstrous" doppelgänger and Huxley's "savage": failed evolutionary escapees from the videodrome of the *techno-capitalist sublime*, in whose image they were created (Huxley's "World State"). This hyperstitional relay, from the "imaginary" to totalisation in the "real," reprises to a certain extent Baudrillard's argument concerning the ideological saturation of the *epistēmē*, and consequently of the belief in an emancipatory scientism:

<sup>52</sup> Aaron Swartz, "Guerilla Open Access Manifesto" (2008), [https://archive.org/stream/GuerillaOpenAccessManifesto/Goamjuly2008\\_djvu.txt](https://archive.org/stream/GuerillaOpenAccessManifesto/Goamjuly2008_djvu.txt), accessed 19 December 2019.



We can no longer imagine other universes; and the gift of transcendence has been taken from us as well. Classic SF was one of expanding universes: it found its calling in narratives of space exploration, coupled with more terrestrial forms of exploration and colonization indigenous to the 19th and 20th centuries. There is no cause-effect relationship to be seen here. Not simply because, today, terrestrial space has been virtually completely encoded, mapped, inventoried, saturated; has in some sense been shrunk by globalization; has become a collective marketplace not only for products but also for values, signs, and models, thereby leaving no room any more for the imaginary. It is not exactly because of all this that the exploratory universe (technical, mental, cosmic) of SF has also stopped functioning. But the two phenomena are closely linked, and they are two aspects of the same general evolutionary process: a period of implosion, after centuries of explosion and expansion. When a system reaches its limits, its own saturation point, a reversal begins to take place. And something happens also to the imagination.<sup>53</sup>

But whether apocalyptic futurism or self-preservational status quo, the science fiction of the current global political disorder – like the geo-technic epoch in which it is reified (this so-called Anthropocene) – marks the subsumption of the imaginary into the ideological *at precisely that point at which ideology itself appears to dissipate under the critical mass of the 'real'* (climate change, the geological register, etc.). This is the moment Stiegler refers to as the “digital epistēmē,”<sup>54</sup> the point of generalisation of the cybernetic conception of information throughout and in fact *as* the so-called medium of the real and thus, in McLuhan’s terms, its “message.”

Such a general dissemination of the apparently fictive doesn’t accomplish itself as an algorithmic universalism, but the contrary, as emergent specificity, as idiom, as – in a sense – particles of thought extrapolated from a probability field: the infinity of detail that constitutes what Ballard called “the eternal present of this timeless zone.”<sup>55</sup> It is this particularity, this *point de capiton*<sup>56</sup> of ideology in the real that orientates the entire epistemological schema as ideological *par*

<sup>53</sup> Baudrillard n.p.

<sup>54</sup> Bernard Stiegler, “Hermeneutics, Heuristics and Paideia in the Digital Episteme,” talk delivered at the University of California at Berkeley, October 2013.

<sup>55</sup> Ballard, “Memories of the Space Age” 237-38.

<sup>56</sup> See Jacques Lacan, “Le point de capiton,” *Le séminaire III: Les Psychoses, 1955-56*, ed. Jacques-Alain Miller (Paris: Seuil, 1981) 296ff.

*excellence*, and which extends its claims of monopoly over every mode of computable future, including all of the computable non-futures (ideology is not what Baudrillard calls the “coefficient of reality [...] proportional to the imaginary,”<sup>57</sup> but the field within which any such coefficient may be inscribed). In doing so it automatically defines a singular ‘horizon’ of *all possible futures* – and of the *impossibility* of any (other) future *of possibility itself* beyond this singularity – a movement that comes into view, at the horizon of the End of History, as infinitely self-repeating in an accumulation of toxic world-suffocating ‘simulacra’ of a universal present. This (dys)utopia is all-inclusive: even its dysfunctions feed the play of (im)possibilities. And it’s here that science fiction, previously Id to rationalism’s Ego, reveals itself as comprising not a *deviation from the real* but realism’s foundation.<sup>58</sup> It inscribes that projective, cinematic realm of the *to come* in which the possibility of the *impossible* resides, and through which ‘we’ obtain ‘our’ perspective on a future that – like the Cartesian planet-annihilating warhead in Carpenter and O’Bannon’s *Dark Star* (1974) – we may fulfil only by adverting to our own unreality.

<sup>57</sup> Baudrillard n.p.

<sup>58</sup> Science may contradict ideology (as systems of meaning) *in certain respects*, but it cannot critique it.