BURLINGTON **Dreaming at CERN** by Patricia Domínguez and Suzanne Treister Articles / Artist dialogue • 12.09.2024 The artists Suzanne Treister (b.1958) and Patricia Domínguez (b.1984) first met in 2022, when they were both commissioned to produce public murals in the Danish town of Holbæk. There, they spent two weeks living as neighbours and formed a close friendship. Many shared themes and interests emerge throughout the artists' multifaceted practices, which are centred on ideas of technology, spirituality and ecology. A pioneer in the new media field since the 1990s, Treister works with video, interactive technologies, photography, drawing and watercolour to interrogate the relationship between technologies, societies and alternative belief Q systems. Domínguez often stages shrine-like installations that incorporate video and sculpture to exorcise the effects of late capitalism and ecological destruction, while also exploring the potential of artistic imagination as a FIG. 1 HEXEN 2.0/Historical Diagrams/From BURLINGTON ARPANET to DARWARS via the Internet, by form of psychic emancipation. Suzanne Treister. 2009-11. Ink and watercolour on paper produced as a digital Both also share the experience of having undertaken research at the print, dimensions variable. (Courtesy the artist, Annely Juda Fine Art, London, and European Organization for Nuclear Research, Meyrin (CERN). In 2018 PPOW Gallery, New York). Treister received the Collide Award, which allows artists to spend time working alongside particle physicists and engineers. Treister arrived at CERN with a research question: 'Is the holographic universe principle - the theory that our universe could be a vast and complex hologram something artists may have unconsciously sought to express since the beginning of our civilisation?'. Her project, The Holographic Universe Theory of Art History (THUTOAH) (2018), projects over 25,000 images from art history and conceptually echoes the actions of the Large Hadron Collider, accelerating at twenty-five images per second in a looped FIG. 2 Still from The Holographic Universe sequence. Four years later, Treister returned to CERN for Scientific Theory of Art History (THUTOAH), by Suzanne Treister. 2018. Video, duration 16 Dreaming (2022), in which she attempted to expand the unconscious minutes 54 seconds, with sound, duration 51 imagination of scientists in order to envisage positive futures. In 2021 minutes 16 seconds. (Developed as part of the Domínguez was a recipient of the Simetría Prize, a dual residency between Collide International Award; co-produced by Science-Art Network for New Exhibitions and CERN and the European Southern Observatory (ESO) astronomy facilities Research; courtesy the artist). in Chile: Antofagasta, La Silla and the ALMA observatory. The culmination of her time at these sites, the video *Tres Lunas Más Abajo* (*Three Moons* Below; 2023-24), will premiere at Cecilia Brunson Projects, London, this month (17th September-25th October 2024). In this conversation, the artists reflect on their research and projects at CERN and discuss entangled particles, dreaming with machines, the ethics of developing technologies and the role of optimism and empathy in 10H> envisioning alternative futures. 1 (101)+(10) Suzanne Treister: You wrote the other day that reading Octavia E. Butler's Parable of the Talents (1998), given what's been going on in Chile FIG. 3 THUTOAH/The Holographic Boundary (2), by Alessandra Gnecci, theoretical with the droughts and crime, made you really question how pessimistic or physicist at CERN. 2018. Watercolour and optimistic you are, or should be. It made me realise this is something I pencil on paper, 21 by 29.7 cm. (Courtesy Suzanne Treister). personally worry about a lot of the time – a constant undercurrent to everything I make as an artist. I feel like I naturally oscillate between the two, always looking out for dangerous paths and hypothesising better futures, but through my lifetime it's been getting harder and harder to be optimistic. One has to dig deeper and deeper into all possibilities in order to find some light at the end of the tunnel. And at the centre of what I do is always the question of technology. Patricia Domínguez: I believe that we live in a spiritual reality and at the end of the end, all will be fine. I hope. There's an intelligence that can't be touched and that can regenerate everything in new forms infinitely. But I'm also prepared to live in an expanding sense of apocalypse, of deep ecological and social mourning. Almost all the houses around here in Puchuncaví have been assaulted. Mine is probably next. The soil here is polluted with arsenic, which keeps getting worse with all the factories around. We live inside what has been called a 'Sacrifice Zone'. Sadly, I don't think things will get better until all the forms as we know them have collapsed. I'm putting together a garden in a place that's also devastated by dryness due to the privatisation of water. I wonder if all the efforts by the local community of renewing the native trees are worth it as the mega-drought permanence is imminent. I have a recurrent nightmare. A very subtle one. FIG. 4 Cámara de transhomologacion, by Patricia Domínguez. 2023. Watercolour on Nothing really happens apart from me in the future watching my garden paper, 72 by 44 cm. (Courtesy the artist and die in front of my eyes because of the lack of water. This, which is small by The Ryder Projects, Madrid). comparison to what's happening to the rest of the human planet, drains me a lot. And I wonder if I should allow that continuous draining or if I should gather all my enthusiasm and try to build better futures with more strength. At least the path on what to do to make things better is clear. Going back to the point about pessimism and optimism, I guess your new tarot deck is half positive, half honest, with all the dark forces around that THE HIEROPHANT FIG. 5 HEXEN 5.0/Tarot/V The Hierophant -Spiritual Ecology, by Suzanne Treister. 2024. Watercolour on paper produced as a digital print, dimensions variable. (Courtesy the artist, Annely Juda Fine Art, London, and PPOW Gallery, New York). planet? RADICAL COMPASSION AND COOPERATION AS AN AS AN ORGANISING PRINCIPLE SEVEN OF CHALICES FIG. 6 HEXEN 5.0/Tarot/Seven of Chalices -Solarpunk-Hopepunk, by Suzanne Treister. 2024. Watercolour on paper produced as a digital print, dimensions variable. (Courtesy the artist, Annely Juda Fine Art, London, and PPOW Gallery, New York). FIG. 7 Still from Tres Lunas Más Abajo (Three Moons Below), by Patricia Domínguez. 2023-24. Video, duration 53 minutes 53 seconds. (Commissioned by Arts at CERN; courtesy the artist and Cecilia Brunson Projects, London). FIG.3. PD: I feel the crossing in that watercolour! I made one of a person FIG.4 FIG. 8 SOFTWARE/Q. Would you recognise α crossing an energetic boundary to homologise with a bird and gain its Virtual Paradise?/Sacred Vision, by Suzanne Treister. 1993-94. Oil on cardboard boxes and vision. This comes from the meditations I do to connect with energetic floppy disk, 2 parts, each 22.5 by 16 by 4 cm. animals, who are my teachers. (Courtesy the artist, Annely Juda Fine Art, London, and PPOW Gallery, New York). Do you think that Hyper-empathy, plus the deep understanding that quantum physics offers, will help us rethink how we utilise technologies? And maybe finally get through this insular belief that societies have of only worrying about their own immediate territory, and instead think about what they encompass and what they're really connected to. What is your favourite technology in your new deck, the one that gives you more faith? ST: I guess that's what I'm trying to encourage with HEXEN 5.0. For the tarot cards, I'm using alchemical drawing structures to describe these technologies and everything else, to entwine them into a mystical space where they become differently animated and resonant. There are amazing developing technologies for renewable energy and food production, but it's the evolving new fields that inspire me with more hope for the future -MILLION YEARS AFTER THE INTERNET such as spiritual ecology FIG.5, nexus thinking, astrocognition and some of the new countercultures of refusal and renewal, alongside new directions in science fiction, like solarpunk and hopepunk FIG.6. The people involved in these fields are some of the people we need to effectively direct, promote and make use of these technologies in ways that help us all. How do your SURVIYOR (F) thoughts about technology play out in your work and your imagery? FIG. 9 SURVIVOR (F)/One Million Years Before And After The Internet, by Suzanne Treister. PD: I love your card about spiritual ecology. I'm excited to show it in Future 2016-19. Oil on canvas, 213 by 152 cm. Ours, the New York billboard project I'm co-curating. It will be an (Courtesy the artist, Annely Juda Fine Art, incantation, a counterspell, to show that card in the public space! London, and PPOW Gallery, New York). I see my work as a technology itself - an artistic-spiritual-experimental one. I focus on tracing digital and spiritual relationships between living species in this increasingly corporate and violently oppressed cosmos. I guess it's my way to not dissolve into despair. I reimagine these relationships and weave them together in a way that honours a more connected, planetary memory. The cosmos is collective; it includes electrical technology too. I've invented my own rituals to survive in this system and transcend some of my own culturalisation. I see the way I use technologies as a sort of capitalist hack, as I re-choreograph and recode their possible uses in order to honour injured birds, evaporating water, dry bodies, ancient petroglyphs, songs for the water, healing plants, vegetal intelligence and terrestrial intelligence. I arrange video-shrines as new world configurations. I perceive my practice as a stomach that digests the symbols and motifs of late capitalism, recoding them into myths of multispecies resistance. Once, a friend of mine, the curator Pablo José Ramirez, wrote about the inversions that my projects propose. Here is a quote that I love:

ABOUT

REVIEWS

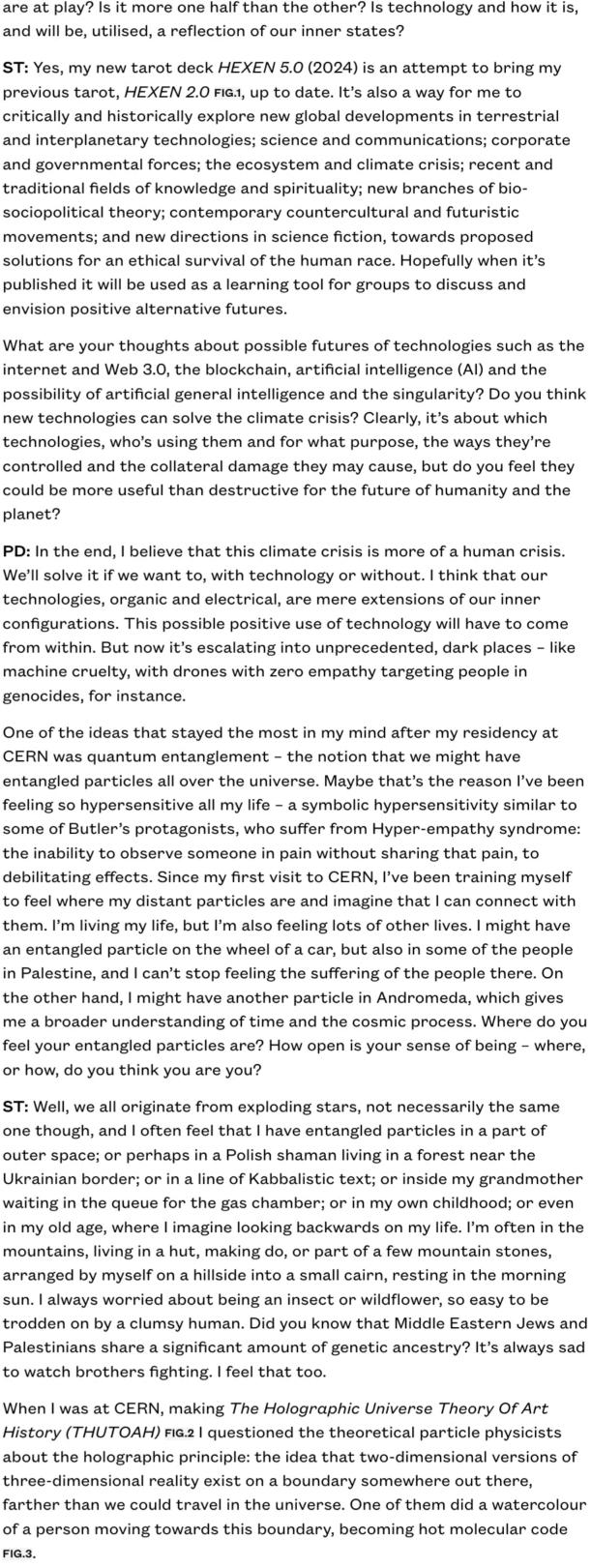
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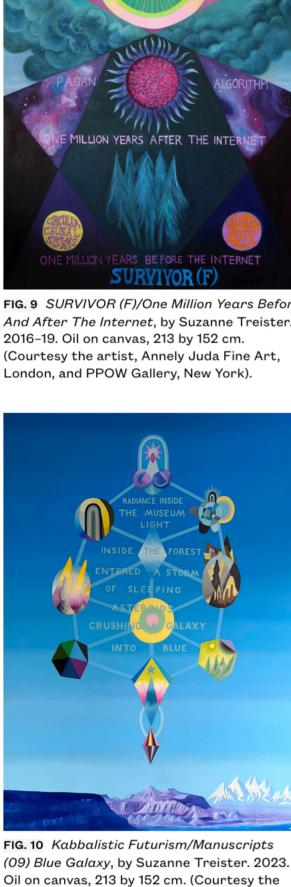


FIG. 11 Scientific Dreaming/CERN Sciencefiction writing workshops/Outcomes of Scientific Breakthroughs, by Suzanne Treister. 2022. Pen on paper produced as a digital print, 42 by 29.7 cm. (Courtesy the artist, Annely Juda Fine Art, London, and PPOW Gallery, New York).

FIG. 12 Still from Matrix Vegetal, by Patricia

Domínguez. 2021-22. Video installation with sculpture-totems and dry Brugmansia

FIG. 13 Detail of Matrix Vegetal, by Patricia

Domínguez. 2021-22. Video installation with sculpture-totems and dry Brugmansia

courtesy the artist and The Ryder Projects,

flowers, duration 21 minutes 12 seconds. (Commissioned by Screen City Biennial;

flowers, duration 21 minutes 12 seconds.

(Commissioned by Screen City Biennial; courtesy the artist and Cecilia Brunson

Projects, London).

Madrid).

artist, Annely Juda Fine Art, London, and

SCIENTIFIC DREAMING/CERN SCIENCE FICTION WORKSHORS/OUTCOMET OF SCIENTIFIC ERCHATHROUGHS

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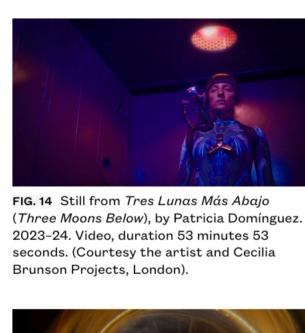


FIG. 15 Still from Tres Lunas Más Abajo

seconds. (Courtesy the artist and Cecilia

Brunson Projects, London).

(Three Moons Below), by Patricia Domínguez. 2023-24. Video, duration 53 minutes 53

FIG. 16 Still from Tres Lunas Más Abajo (Three Moons Below), by Patricia Domínguez. 2023-24. Video, duration 53 minutes 53 seconds. (Courtesy the artist and Cecilia Brunson Projects, London).

FIG. 17 Still from Tres Lunas Más Abajo

2023-24. Video, duration 53 minutes 53 seconds. (Courtesy the artist and Cecilia

Brunson Projects, London).

(Three Moons Below), by Patricia Domínguez.

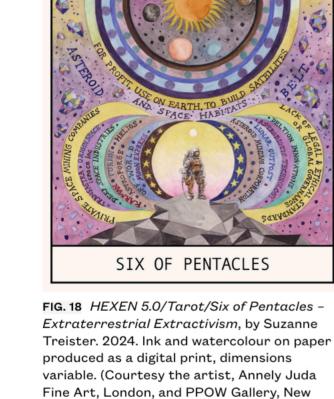


FIG. 19 TECHNOSHAMANIC

Gallery, New York).

Gallery, New York).

SYSTEMS/Spacecraft Designs/Crystal Spaceship 06, by Suzanne Treister. 2019-20.

Watercolour on paper produced as a digital

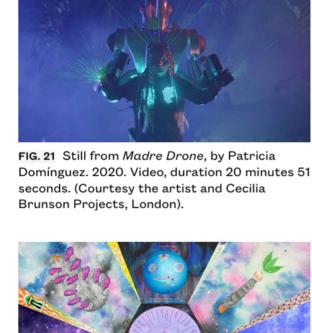
print, 21 by 29.7 cm. (Courtesy the artist, Annely Juda Fine Art, London, and PPOW

FIG. 20 Still from The Eyes of Plants, by

Patricia Domínguez. 2019. Video, duration 24 Spaceship 06, by Suzanne Treister. 2019-20.

Watercolour on paper produced as a digital

print, 21 by 29.7 cm. (Courtesy the artist, Annely Juda Fine Art, London, and PPOW



Interplanetary Technologies - A Dowsing Poster, by Suzanne Treister and Patricia Domínguez. 2022. Double-sided poster, 70 by 100 cm. (Courtesy the artists, Annely Juda Fine Art, London, PPOW Gallery, New York, and Cecilia Brunson Projects, London).

FIG. 22 Side 2 of The Museum of Ethics and

sensor. For your project at CERN, Scientific Dreaming (2022), I loved that you made the scientists dream. Can you show me one of their dreams? When I was there, I wanted to dream with the machines, but I only dreamt with my mom! ST: I'm so excited hearing you talk about your work like this. It really resonates with how I've felt about my own, from early paintings, computer work and SOFTWARE project FIG.8 to the more recent SURVIVOR (F) FIG.9, The Escapist BHST (Black Hole Spacetime) (2018–19), Technoshamanic Systems (2020-23) and Kabbalistic Futurism FIG.10, in which I'm trying to imagine and connect transcendent scenarios of deep history, possible futures of technology, existence and understandings of the universe. In Scientific Dreaming, I attempted to hypnotise a group of particle physicists to allow them to access other parts of their brain in the hope that they might come up with new solutions to the climate crisis. I led each scientist through a series of prompts, which resulted in them making a

plot diagram for a science fiction short story that they would later write. I only told them at the end of the workshop that their drawing was for this

purpose. One of the prompts was to ask them to describe a dream

experienced by one of the characters they'd invented, which could be a

dream they'd had themselves. Examples of their dreams were: flying close to the sun; walking in the Vatican; a robot dreaming of the person who built

him; modelling future worlds; cycling by a river where the water is rising

to measure the cosmological constant in the universe; rivers full of fish;

too high; travelling through the universe as an ethereal being; realising how

and a world of truth and justice. I created a diagram for the results of each

PD: I see kittens, dreams of winning the lottery and ethereal travelling! It's

such a good exercise to have new thoughts and connections. For me, this is

ST: I would love to hear more about your new video. Since leaving CERN,

PD: I haven't been able to dream with machines yet, can you believe it? I

Following the traces of symbols and cultural objects as they enter

digital grounds and come back to the physical world transformed,

the movement that Patricia performs is similar to a material hacking exercise: if the digital corporatism operation implies

turning what is alive into pixels, stripping it of all traces of

I feel like catching and materialising pixels of information coming to us from the sky. This new video and watercolour series I'm working on now,

Tres Lunas Más Abajo FIG.7, is a spiritual pilgrimage to cutting-edge

technologies. It's a journey, a video prayer to broaden my cosmological

with memory.²

prompt FIG.11.

a crucial thing to do at the moment.

have you been able to dream with the machines?

planetary and ancestral memory, her movement is inversely

opposite; she materializes what is digital, in order to connect it

keep dreaming about organic technologies and expanding my vision. I guess my biggest interest is to empower our bodies and their possible quantum functioning: the ultimate organic technology. The new video is the second part of a personal inquiry, which I started in 2021, to broaden my understanding of the invisible. My previous video installation or 'door' Matrix Vegetal FIG.12 FIG.13 is the 'vegetal door' of the shamanic universe of plant intelligence, and this new work is the mirror 'video door', which explores mysticism and ritual while navigating fundamental science and cutting-edge technologies. The film is a quest of decoding and recoding how we understand reality and how we can shift perspectives. In the video, the same actress from Matrix Vegetal - Claudia, my best friend from Chile - is guided by a bird-robot FIG.14, who leads her through the quantum worlds of CERN and the machine there that studies the smallest particles FIG.15; ancestral spaces in a petroglyph in the Atacama Desert, hidden under the sands; and the world's most precise observatories at the ALMA and La Silla Observatories in the Atacama Desert FIG.16. She embraces different machines and technologies to acquire

their capabilities. She longs for the vision and understanding that these objects can give her, so that she can broaden her cosmological sensor her connection to the universe, galaxies, animals and the unknown. The

video ends with CERN's Large Hadron Collider telling her to go and dream,

experiences that most expanded my thinking during my own 'pilgrimage' to

ST: To go back to where we started, I think we both now have entangled

particles inside Butler's Parable of the Talents, we both experience forms

of Hyper-empathy and some kind of Lauren-Olamina-type drive to rescue

incalculable, complex horrors of present-day realities, we both believe we

can contribute positively through art, through illuminating the deeper levels of connection and inhabiting the bad parts in order to make them better. And if only a few people are energised by our work, then we're not

PD: Yes, if one person is touched by what we do it's worth it. The end of Butler's amazing novel was a bummer though, right? I was so curious to

ST: Yes totally, I was surprised by that part. But it was written in 1998,

before Trumpian ideas of mining Mars and the Moon, before Foster + Partners had designed potentially realisable Mars habitats, and her

see how all the mess would unfold, and they ended up jumping into ships to

fantasy was socially inclusive. I'm all for exploring outer space - it's part of

Postcolonial, planetary chauvinistic, imperialist development of

space, extending coloniality into space in a perpetuation of settler

the inevitable human search for knowledge - but in non-colonialist, nondestructive ways. I've just finished another HEXEN 5.0 work FIG.18, which has a text about the perils of government and private space colonisation:

the human race and restore the planet. Despite acknowledging the

which ends up being the space where she can finally connect with her

entangled particles FIG.17. I'm trying to embed the video with the

these places and concepts.

totally delusional!

colonise other planets.

colonialism and manifest destiny, by government space agencies, contractors, and wealthy elites affiliated with private corporations, leading to interplanetary contamination/destruction, possible extinction of indigenous extraterrestrial life, and endangering of any extraterrestrial first contact. What is your feeling about humanity entering the cosmos? PD: I think we should wait until we fix our mess here, and learn to live together before putting a foot in outer space. If not, it will be controlled, as you say, by governments, power and greed. I feel we're not worthy to go into space yet. For now, we can travel with our imaginations across different dimensions, learning to open the portals here on Earth. ST: Yes, I totally understand that position, but this situation is already happening. It's unlikely anyone can stop governments and corporations developing their extractivist colonialist space programmes, just as it's unlikely anyone can stop the tech community developing more and more

sophisticated Al. These people have power and are obsessively driven. But what we can do is imagine and advocate for inclusive, ecologically safe and

For example, my designs for psychedelic spaceships FIG.19 and dresses for space travel, although purely dysfunctional and imaginary, are meant to be

ways of suggesting this direction, like a fantasy of countercultural space

There are other issues, though. There is the emerging field of

exploration, which was maybe more what Butler was getting at? It doesn't necessarily mean we have to go out there, but imagining positive ways of

ethically driven alternatives in these fields.

being out there is important somehow.

in the cracks of this era.

astrocognition, which considers possible changes in our brains, thinking and belief systems in extraterrestrial environments. There is also Liu Cixin's idea of the dark forest in his science-fiction novel of the same name: the idea that civilisations from other planets may be hostile and that we should perhaps hide our presence in the universe, adopting a so-called 'dark forest strategy'. PD: I woke up today thinking that maybe the universe is the one that needs to learn to be at peace with itself? We're just minuscule parts of it, trespassed by these strong forces. Who really knows what is happening outside? I think that your new tarot deck will offer a total update of information, new sciences and the strong forces that are at play in the universe. And, yes, I agree that we can hack the system from the inside and advocate

for new uses of technology. In my work, I've made bio-prospecting drones

cry alongside indigenous vases for the extracted land FIG.20; prayed for the

quartz that is being mined for the processing chips in our computers in Quartz, cactus and silicon chip meditation (2020); imagined an LED light woman who can neutralise stressed robots and liberate their rational mind

using medicinal plans FIG.21; and asked to absorb the pixelated vision of a blinded police drone so I can expand my own, so I can imagine new futures

technologies before they were developed. We have to consider everything -

I wish that we had come to terms with the ethics of the new Al

all species, the planet, water, soil, the universe, all peoples, the resources they used and their biases - along with the immense amount of electrical energy that Al is consuming. Lots of people are pushing to challenge those who create and programme new forms of Al. Yesterday, I gave a talk about the relationship of my work to the planet and technology, which was shown at SIGGRAPH 2024, a tech conference in the United States. There was discussion about the fact that engineers are designing things like NFTs or the Metaverse, but they keep falling apart because they have no content or criticality. They don't have a root to the Earth, to life. So, this year they're inviting artists, peace advocators and people from the healthcare system to help them advocate for everything that's left behind after this brutal digitalisation of life. With that equation activated, we can then programme Al to help us take better care of the planet. I know it sounds totally utopian. Talking about

utopias, I recited to them the technologies we invented for the Museum of

Technologies for distributing the most healing plants around the

Ethics and Interplanetary Technologies:

universe between civilizations

Decodification of the languages of the cosmos Technology to activate unused and dormant cells in the brain Unlimited interplanetary energy sources through dark matter/dark energy invocations Interplanetary species empathy exchange technology for experiencing each other's position Ethical assessment technology for intergalactic welfare. Seeing how corporations control Al, and most of all, technological

innovations, I'm much more interested in learning about spiritual, healing

consulting the intelligence of the planet. I know you also draw on this, and also cosmic information. It's crucial to find and sustain this direct access

and artistic technologies - 'technologies with no hardware' - and

ST: I agree, and it was amazing to make that poster with you for

to reality, new thoughts and techniques as a counterspell.

Transmediale FIG.22, inventing together those technologies for non-invasive and peaceful interplanetary coexistence for the Museum of Ethics and Interplanetary Technologies.3 I can't wait to see your new video. I know I'm going to find it energising! I wonder what it would feel like to look back on our work, if it still exists, a hundred years in the future?

Patricia Domínguez is an artist, organic technologist and Earth defender based in Puchuncaví, Chile. Assembling experimental research on ethnobotany, extractivism and healing practices, her work focuses on tracing digital and spiritual relationships between living species in an increasingly corporate cosmos. She proposes a poetic vision of contemporary life as deeply connected to the earth. She is the founder of Studio Vegetalista, an experimental platform for ethnobotanical research. She holds a MFA from Hunter College, New York, and studied a Botanical Art Illustration Certificate at the New York Botanical Garden. Suzanne Treister is an artist based in London and the French Pyrenees, having lived in Australia, New York and Berlin. Initially recognised in the 1980s as a painter, she became a pioneer in the new media field from the beginning of the 1990s, making work

about emerging technologies, developing fictional worlds and international collaborative organisations. Treister's work engages with eccentric narratives and unconventional bodies of research to reveal structures that bind power, identity and knowledge. Often spanning several years, her projects comprise fantastic reinterpretations of given taxonomies and histories that examine the existence of covert forces at work in the world. An ongoing focus of her work is the relationship between new technologies, society, alternative belief systems and the potential futures of humanity.

About the authors