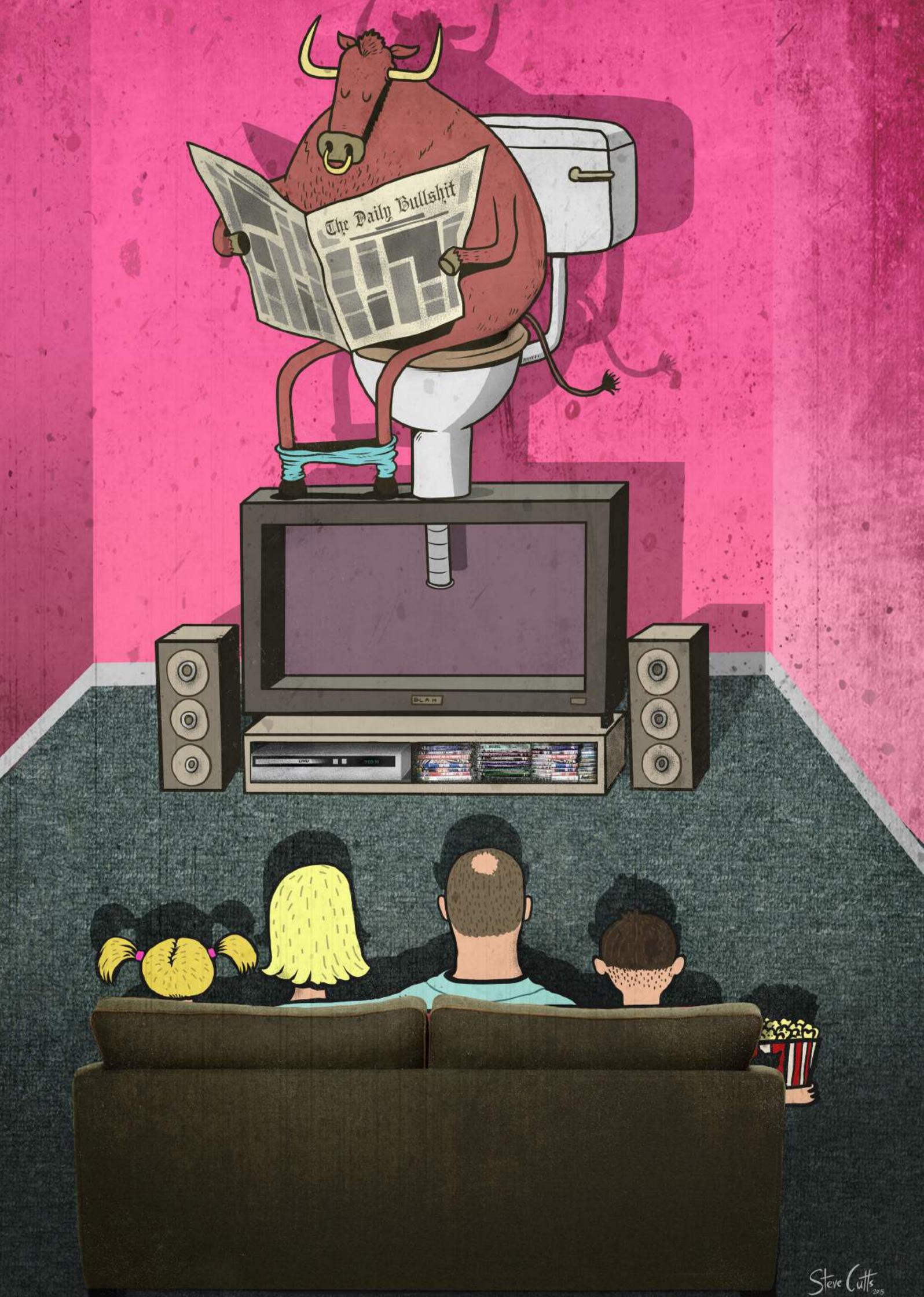




WH@T ON EARTH

HOW DIGITAL TECHNOLOGY IS SEVERING OUR RELATIONSHIP
WITH OURSELVES, EACH OTHER AND OUR LIVING PLANET



The Daily Bullshit

Wh@t on Earth:
How Digital Technology is Severing our Relationship with
Ourselves, Each Other and our Living Planet (2018)

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Visit www.gaiafoundation.org for a digital version of this booklet and to read the full report, of the same title, the booklet is drawn from.

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"I GIVE YOU MY DONKEY!"

Mulla Nasrudin was the most mischievous, foolish and wise of men, and one day...

'Profiting by the immense reputation which Sufis have as teachers of special insight, a group of robbers settled in an abandoned monastery on a highway, pretending to be Sufi dervishes.

Nasrudin and his small son were travelling on a long journey when they were espied by a lookout man among the robbers. They immediately started to carry out a rhythmic dance, with a great deal of noise.

As they approached, Nasrudin said to his son: "Night will fall soon, and this seems to be a monastery of advanced dervishes. Let us seek their hospitality."

The false dervishes welcomed them heartily, and even asked the Mulla to join their special exercises. These took the form of a rapid circular movement, with the repetition of phrases which were changed from time to time by the leader.

Presently Nasrudin was whirling with the best of them, taking up the repetitious cries and in a near-hysterical frame of mind. Now the leader of the 'dervishes' started to call: "I give you my donkey! I give you my donkey!"

Obediently, Nasrudin echoed the refrain, and the tempo was increased until he fell unconscious.

When he awoke with the dawn, Nasrudin found the robbers – and the donkey – gone. "I thought I left you in

charge of the animal!" he roared at his son.

"Yes Father. But when one of the dervishes came and took the donkey I ran to you, and you were shouting 'I give you my donkey!' so often and in front of so many witnesses that I realized that you had given him away."¹



***HOW IS THAT
SHORT, INNOCUOUS
STORY RELEVANT
TO OUR SUBJECT
MATTER?***





How is that short, innocuous story relevant to our subject matter?

On 22nd September 2017 Apple launched the 8th version of its flagship smartphone, the iPhone 8 - "a new step forward for iPhone", claimed Apple CEO Tim Cook, which will "set the pace for technology for the next decade."² And on goes the rhetoric for each new release, each new version assuring a better experience, taking us ever closer to the Digital Promised Land.

But, one might naively ask, "why the fuss?" What is it that exerts such a powerful grip on so many people, on all of us in fact? Consider this: while a total of 173 million smartphones were shipped in the world in 2009, this figure was eight times higher a mere seven years later (1.47 billion units in 2016).³ Global smartphone penetration rate was estimated to be 44 percent in 2017, up from 21.6 percent in 2014.⁴ And since 96% of smartphone owners text,⁵ these smartphones, in turn, feed a frenetic peer-to-peer communication: 22 billion texts are sent every day worldwide, excluding app to app messaging - a staggering 15 million texts exchanged every minute of every day.⁶ Is this the sign of a deep craving for communication in a fractured world? Or is something else at play? In California during a previous iPhone launch, journalists reported that, far from queuing up for a mere phone, some people actually wanted to "be part of a tribal experience". "I like to be part of the magic", said one.⁷ There is obviously something much deeper than the blunt appeal of a slick product.

Whatever the answer(s), there is no denying that ever since the arrival of the internet and its subsequent tools (smartphones, tablets, laptops and phablets) the world has been experiencing a collective captivation without precedent. And a time-consuming one at that: according to a 2014 study from Baylor University,⁸ university students spend between 8 and 10 hours per day on cell phone - a figure that, in truth, beggars belief. But as texts are on average read within 5 seconds of their reception, with an average response time of 90 seconds, the numbers start to make sense.⁹ This study displays 'connectedness' as a double-edged sword,

as the near limitless ability to communicate actually shackles people to technology. Therefore, as one researcher noted, mobile phone use represents a real conundrum, being both "freeing and enslaving at the same time".¹⁰

Here, really, lies the crux that this booklet will try to address.

The spell of digital technology is truly global, reinforced by the all pervasive mantra that says the more connected you are, the better off. As William Powers puts it in Hamlet's Blackberry:

"FOR SOME PEOPLE, DIGITAL TECHNOLOGY ISN'T JUST A NEW KIND OF TOOL, IT'S A REVOLUTIONARY CREED TO BELIEVE IN AND LIVE FOR, A MOVEMENT THAT'S TRANSFORMING AND PERFECTING LIFE ON EARTH." "

We are scratching here at something that runs much deeper than the Internet: namely, the interaction between humans and technology, whose respective evolutions have always been interconnected, with each technological breakthrough creating a crisis, a rupture point.

Marshall McLuhan called technology "the extensions of man" and more than anybody else he understood the numbness any innovation creates in unsuspecting humans, writing:

"It is a necessary approach in understanding media and technology to realize that when the spell of the gimmick or an extension of our bodies is new, there comes narcosis or numbing to the newly amplified area."¹²

When the "newly amplified area" is the nervous system, as it is with the Internet, the consequences are far from benign. McLuhan described the 'newly amplified area' as one which produces a numbness, or "narcissistic trance". According to him, the best way to avoid this narcosis was increased awareness:

“Simply in knowing that the spell can occur immediately upon contact, as in the first bars of a melody”.¹³

Just like Nasrudin, entranced by the false dervishes,

WE ARE SPELLBOUND BY THE MANTRA OF 'CONNECTEDNESS', WHICH IS BRANDISHED BY THE GIANT HIGH TECH COMPANIES.

Is this doing us any good? At each step, technology has been proclaimed as the source of mankind's liberation, offering nuggets of extra time on a golden plate thanks to the work done in the place of humans by machines.

Northcote Parkinson's Law tells a different story:

“Work expands so as to fill the time available for its completion.”¹⁴

If a task which before necessitated one hour can now be done in five minutes, does this mean we get 55 minutes of free time to play music, daydream or meet friends? No. Rather it means that, like Hercules, we are expected to perform 12 tasks within the hour with the inevitable consequence of a dramatic acceleration in the pace of life. More than that, the pervasiveness of the Internet now means that the separation between leisure time and work time is increasingly blurred, keeping us in check 24/7.

How is this affecting us and our relation to planet Earth?

Questioning the role of technology inevitably elicits strong reactions and accusations of Luddism – of being dogmatically against new technologies, against progress, of romanticising a past when humans crouched in dark caves to fend off the bitter cold. But the Luddites asked pertinent questions and rightfully wondering what technology, by taking away skilled human labour and replacing it with machines, would do to us.

Should we unquestionably maintain blind faith in the new possibilities undeniably opening up with the digital

age and, increasingly, with AI (Artificial Intelligence)? John Naughton, Professor of the Public Understanding of Technology at the Open University, sums it up thus:

“The problem with the optimist-pessimist dichotomy is that the optimists rarely address the reality of destruction (of the old ways) while the pessimists rarely acknowledge the creative possibilities of the new.”¹⁵

Widespread digital connectivity, seen as a vital condition for promoting information, communication and education, is without a doubt doing its job very well. Too well, one might say. Indeed, in a twist, communication is now in many respects increasingly reduced to ‘digital connectivity’ – with the resultant loss or impoverishment of other forms of communication. And so we may ask: after 25 years of the World Wide Web, has the Net improved or diminished our ability to communicate?

While this question will elicit several answers, it does inevitably assume an inter-human communication, an exchange between human beings. But looming large over the digital sphere is our relation to the living Earth and to other life forms. How has digital technology affected this relation? We as a species seem to be, increasingly, in a dialogue with ourselves only and, through the literal and symbolic mediation of our screens, we are creating more and more distance between ourselves and the sentient Earth – at a time when re-engaging with her and establishing a new covenant is desperately urgent.

Back to our little tale: which donkeys are we unconsciously giving up in our trance? What are we robbed of without realising it? There are several themes worth examining:

- Mental health: depression, anxiety, addiction are some of the psychological issues generated by a disharmonious relation to the digital sphere. Author and IT entrepreneur Esther Dyson makes the analogy with sugar:

“SOMETIMES I THINK MUCH OF WHAT WE GET ON THE INTERNET IS EMPTY CALORIES.”





“...It’s sugar – short videos, pokes from friends, blog posts, Twitter posts, pop-ups, visualizations... Sugar is so much easier to digest, so enticing – and ultimately it leaves us hungrier than before.”¹⁶

While Internet Addiction Disorder (IAD) has not yet made its appearance in the US DSM directory of mental disorders, psychologist Aaron Balick asks whether the Web 2.0 and similar technologies (such as smartphones and tablets) create new psychological pathologies or:

“ ... are they simply novel technological platforms through which the same old psychological traits express themselves through a different medium”?¹⁷

But the figures are staggering: according to a recent study, users in rich countries touch their phones 2,600 times a day.¹⁸ Children are particularly vulnerable, eliciting serious concerns. Even the one of the great bastions of capitalism – shareholders – are starting to worry. On January 6th, 2018, two major Apple shareholders, Jana Partners LLC and the California State Teachers’ Retirement System, sent a letter to Apple management to raise the alarm about children’s addiction to iPhones, which they compared to junk food. They wanted the company to study the effects of heavy usage on mental health. Their main reason for doing so is their fear of seeing the company’s stock price potentially hit by a massive public health crisis.¹⁹ Enlightened minds? Hardly. But concern, however self-interested, is mounting.

- Privacy: notwithstanding well-documented state spying programmes that would make Big Brother blush, how are social media and our new ways of interacting with each other affecting our sense of identity, our intimacy, our personal relationships? With regard to family life, William Powers declared:

“The more connected our house became in the last decade, the less it provided the sense of peace and soul nourishment I associate with home.”²⁰

- Individuality: is social media encouraging a herd mentality, in which we relinquish independence of

thought, depth and reflection? The Internet is a vast echo chamber, and hearing millions of people repeating something – anything – might give the impression, by the sheer force of numbers, that it is true. Jonathan Crary has a sombre take on it all:

“Even in the absence of direct compulsion, we choose to do what we are told to do; we allow the management of our bodies, our ideas, our entertainment, and all our imaginary needs to be externally imposed.”²¹

The spread of misinformation, a high point of which was reached during the 2016 US elections, is compounding the problem even further. According to a 2017 article by The Economist:

“Facebook acknowledged that before and after last year’s American election, between January 2015 and August this year, 146 million users may have seen Russian misinformation on its platform. Google’s YouTube admitted to 1,108 Russian-linked videos and Twitter to 36,746 accounts.”²²

For the magazine there is little doubt that, “by spreading untruth and outrage, corroding voters’ judgment and aggravating partisanship”,

...SOCIAL MEDIA AMPLIFIES DIVISION AND CONTRIBUTES TO A TOXIC POLITICAL CLIMATE WHERE COMPROMISE – THE FOUNDATION OF DEMOCRACY – IS INCREASINGLY DIFFICULT TO REACH.

Some former executives in the digital media industry are exhibiting tremendous unease about the dark shadow of the digital sphere. Chamath Paliyapitiya, former Facebook vice-president for user growth until 2011, recently came out expressing regret and guilt about the social network’s role in “ripping apart the social fabric” of society:

“The short-term, dopamine-driven feedback loops that we have created are destroying how society works. No civil discourse, no cooperation, misinformation,

mistruth.... This is not about Russian ads. This is a global problem ... It is eroding the core foundations of how people behave by and between each other."²³

- Is the Internet changing us?

According to physicist and deep ecologist Fritjof Capra:

"The first human species was given the name Homo habilis ('skillful human') to denote its ability to make sophisticated tools. Thus technology is a defining characteristic of human nature: its history encompasses the entire history of human evolution."²⁴

McLuhan agrees:

"Man is perpetually modified by technology and in turn finds ways of modifying technology."²⁵

We are today living in a time of considerable technological change – the digital revolution and artificial intelligence – and there is no doubt that we are being, and will be, shaped accordingly in many different ways, some foreseen, others not. Evolutionary psychologist Geoffrey Miller believes:

"The Internet changes every aspect of thinking: perception, categorization, attention, memory, spatial navigation, language, imagination, creativity, problem solving, Theory of Mind, judgement, and decision-making."²⁶

We all have experiences of sitting in a restaurant next to a couple endlessly checking their smartphones, impervious to each other's presence, of having friends for dinner with one eye across the table and the other checking e-mails on their knees, of family gatherings with kids glued to their screens, of business meetings where smartphones rule... the list is endless. What is happening to us? Why this compulsion? Says Jonathan Crary:

"Because of the infinity of content accessible 24/7 ... there will always be something online more informative, surprising, funny, divertive, impressive than anything in

one's immediate circumstances."²⁷

Digital technology, especially since it has been available on the move, is vampirising our attention, sucking the blood from what makes life precious - experiencing each instant with one's whole being. We are relentlessly thrown outside of ourselves and our inner lives are a major casualty of this process.

Remember! Souviens-toi! Spendthrift! Esto memor!
(My metal throat can speak all languages.)

Minutes, blithesome mortal, are bits of ore

That you must not release without extracting the gold!

The Clock, Charles Baudelaire

When we turn on our computer we are indeed plunged into an ecosystem of interruption technologies.

Buckminster Fuller once remarked:

"I am convinced that human continuance depends entirely upon the intuitive wisdom of each and every individual, on the individual's informedness, the individual's integrity of speaking and acting only in the individual's own, within, self intuited and reasoned initiative, the individual's never joining action with others as motivated only by crowd-engendered emotionalism, or by a sense of the crowd power to overwhelm."²⁸

Why do we have this nagging feeling that Internet's over-consumption draws us in the exact opposite direction?

- Our relation with our bodies and with Earth: without question, the mind/body split is accelerating. Screen technology is taking us further away from our senses and from our animal roots.

WE ARE INCREASINGLY BECOMING DISINCARNATE BODIES, DETACHED FROM EARTH, WITH A FALSE SENSE OF OMNIPOTENCE

...and an arrogant view that Nature, which includes our nature, can be conquered. The superhuman is arriving but forgetting everything that made them human in the first place - a co-host on planet Earth engaged in a meaningful dialogue with her life-giving environment.

That the Internet should be the exclusive precinct of the Mind is very tellingly expressed in these extracts from the Declaration of the Independence of Cyberspace, issued in 1996 by John Perry Barlow:

“Governments of the Industrial World, you weary giants of flesh and steel, I come from Cyberspace, the new home of Mind. On behalf of the future, I ask you of the past to leave us alone. You are not welcome among us. You have no sovereignty where we gather.”²⁹

And even more to the point:

“Cyberspace consists of transactions, relationships, and thought itself, arrayed like a standing wave in the web of our communications. Ours is a world that is both everywhere and nowhere, but it is not where bodies live.” (our italics)

In cyberspace, bodies can be left behind for minds to roam at leisure in virtual reality. By figuratively wrapping ourselves in our screens, we are effectively insulating ourselves from direct experience. For David Abram:

“Caught up in a mass of abstractions, our attention hypnotized by a host of man-made technologies that only reflect us back to ourselves, it is all too easy to forget our carnal inheritance in a more-than-human matrix of sensations and sensibilities.”³⁰

The ‘virtual’ quality of digital technologies also belies their ecological impact.

VISITING A WEBSITE IS NOT NEUTRAL, FROM THE POINT OF VIEW OF EARTH

– it is not an immaterial visit in cyberspace. Each Google search, by the sheer amount of energy that it requires, emits CO₂. Besides, the production, consumption and disposal of these billions of electronic devices are exerting a huge toll on Earth ecosystems.

These impacts have been well documented in a report named Short Circuit,³¹ that also showed that if the

Cloud were a country, it would rank fifth in the world in energy consumption. A new US research claims:

“Billions of internet-connected devices could produce 3.5% of global emissions within 10 years and 14% by 2040...[while] the communication industry could use 20% of all the world’s electricity by 2025.”³²

CONCLUSION

THE PURPOSE OF THIS BOOKLET IS NOT TO DEMONISE TECHNOLOGY AND ITS LATEST, MOST CONSPICUOUS AVATAR, THE INTERNET.

It is important to recognise the benefits that it brings and the new avenues it opens. We may for instance take comfort in the numerous online communities that are openly advocating for a new relation with Earth away from the dominant hierarchical structures of power. However, the ‘trance’ that new technology induces has to be faced consciously.

In a 2014 column in the Guardian, journalist Jess Zimmerman wrote:

“Why do we go into panic mode when someone introduces a new way for humans to twine their lives with technology? Part of it is just our relentless human drive toward mediocrity; anything new and confusing, however valuable, will be a source of fear and trumped-up nostalgia.”³³

Behind this widely held attitude – Psychological Modernism, in Thomas Moore’s words – lurks the temptation to unconditionally embrace any new technological development, without stepping back and pondering what we are losing in the process.

Undoubtedly, starting with fire, humankind’s evolution has always been closely intertwined with innovation. So has the evolution of countless animals – birds building their nests or bees inventing the hexagonal comb. There is a natural drive in nature to make the most of one’s abilities and of one’s surroundings to further one’s chances of survival and thriving.

But we have now reached a point in humanity’s history that should make us stop, notice and reassess. After 25

years of the Internet we have to recognise that we are showing disturbing signs of over-engagement with the digital sphere; that this over-engagement is a significant factor in accelerating our dissociation from more-than-human nature and the natural processes that sustain us; that our disengagement is both product and cause of planetary-scale ecological destruction, and comes at a time when renewing our bond with planet Earth is more urgent than ever.

Can we really hold technology to account for this sad state of affairs? Yes and no.

Yes, because technology has given us the means to be ever more destructive on a grand scale. No, because the real reason is not to be found in technology per se but in our psychological attitude to it, our “total identification with it,” as Ken Wilber says.

What may be particularly pernicious is the illusion that technology can create a Utopia – with each technological invention rising from the ashes of the previous one to bring us closer to a Promised Land, beyond all planetary boundaries and limits on our potential. The Internet is no exception, heralding as it does the new human, faster, cleverer, ‘more connected’ than before.

In The Perennial Philosophy Aldous Huxley contended that:

“THE RELIGION OF INEVITABLE PROGRESS IS, IN THE LAST ANALYSIS, THE HOPE AND FAITH (IN THE TEETH OF ALL HUMAN EXPERIENCE) THAT ONE CAN GET SOMETHING FOR NOTHING.”³⁴

Like the ancient Greeks, Huxley knew that hubris (excessive pride, arrogance) always calls for nemesis (undoing, downfall):

“What is obvious is that the advantages accruing from recent technological advances - or, in Greek phraseology, from recent acts of hubris directed against Nature – are generally accompanied by corresponding disadvantages, and that gains in one direction entail losses in other directions.”

These lines were written in 1945, in the shadow of the Holocaust and of Hiroshima. Seventy years later we are not only talking about ‘losses’, but about the ultimate Loss, as our activities destabilise the Earth system itself. This is precisely why today is a critical moment to reassess our relation to technology, both collectively and individually.

We must, urgently, make peace with our technology. In the first instance this entails taking our distance from the digital sphere, opening up a gap with our screens and reaffirming our kinship with the planet- our home of feathers, claws and rocks- rediscovering the beauty that surrounds us before it is consigned to the landfills of history.

THE MORE WE DELVE INTO DIGITAL REALMS, THE MORE URGENT THE NEED FOR PHYSICAL REALITY.

As filmmaker Jonas Mekas contends:

“I would like to add one more note about what the Internet has done to me. And that is that I began paying more attention to everything the Internet seems to be eliminating, books, especially, but also nature. In short, the more it all expands into virtual reality, the more I feel a need to love and protect actual reality. Not because of sentimental reasons, no – from a very real, practical, almost a survival need, from my knowledge that I would lose an essential part of myself by losing actual reality, both cultural and physical.”³⁵

How many of us do recognise this need and are ready to act on it?

By his folly, Nasruddin has indeed taught us an essential lesson: our donkeys are precious, they need our care, respect and love now more than ever.

Dearly beloved!
I have called you so often and you have not heard me
I have shown myself to you so often
And you have not seen me.
I have made myself fragrant so often,
And you have not smelled me.
Savourous food and you have not tasted me.
Why can you not reach me through the objects you
touch,
Or breathe me through sweet perfumes?
Why do you not see me? Why do you not hear me?
Why? Why? Why?
Ibn'Arabi³⁶

REFERENCES

- ¹ Shah, Idries. *The Pleasantries of the Incredible Mulla Nasrudin*. London: Octagon Press, 1968.
- ² Field, Matthew and Mark Molloy. "iPhone 8: UK release date, price, specs and best features of Apple's new phone." *The Telegraph*, September 22, 2017. [<https://www.telegraph.co.uk/technology/0/iphone-8-uk-release-date-price-specs-best-features-apples-new/>]
- ³ 'Apple Tops Samsung in the Fourth Quarter to Close Out a Roller Coaster Year for the Smartphone Market, According to IDC', IDC, February 1 2017. [<https://www.idc.com/getdoc.jsp?containerId=prUS42268917>]
- ⁴ Sui, Linda. '44% of World Population will Own Smartphones in 2017,' *Strategy Analytics*, December 21 2016. [<https://www.strategyanalytics.com/strategy-analytics/blogs/devices/smartphones/smart-phones/2016/12/21/44-of-world-population-will-own-smartphones-in-2017>]
- ⁵ Smith, Aaron. "U.S. Smartphone Use in 2015." *Pew Research Center*, April 1, 2015. [<http://www.pewinternet.org/2015/04/01/us-smartphone-use-in-2015/>]
- ⁶ Burke, Kenneth. "73 Texting Statistics That Answer All Your Questions." *Text Request*, May 24, 2016. [<https://www.textrequest.com/blog/texting-statistics-answer-questions/>]
- ⁷ Powers, William. *Hamlet's BlackBerry: a practical philosophy for building a good life in the digital age*. Melbourne: Scribe, 2013. p.31.
- ⁸ Wood, Janice. "College Students In Study Spend 8 to 10 Hours Daily on Cell Phone." *Psych Central*, October 6, 2015. [<https://psychcentral.com/news/2014/08/31/new-study-finds-cell-phone-addiction-increasingly-realistic-possibility/74312.html>] The students reported spending the most time texting, with an average of 94.6 minutes a day. That was followed by sending emails (48.5 minutes), checking Facebook (38.6 minutes), surfing the Internet (34.4 minutes), and listening to music (26.9 minutes).
- ⁹ Burke. '73 Texting Statistics...' (see footnote 6).
- ¹⁰ Wood. 'College Students...' (see footnote 9).
- ¹¹ Powers. 'Hamlet's BlackBerry...' p.29. (see footnote 7).
- ¹² McLuhan, Marshall. *Understanding Media: The Extensions of Man*. Berkeley, Calif: Gingko Press, 1964. p.149.
- ¹³ *Ibid*, p.15.
- ¹⁴ *Ibid*, p.262.
- ¹⁵ Naughton, John. *From Gutenberg to Zuckerberg: What You Really Need to Know About the Internet*. London: Quercus, 2012. p. 182.
- ¹⁶ Brockman, John. *How Is the Internet Changing the Way You Think?: The Net's Impact on Our Minds and Future*. London: Atlantic, 2013. p.141.
- ¹⁷ Balick, Aaron. *The Psychodynamics of Social Networking: Connected-up Instantaneous Culture and the Self*. London: Karnac Books, 2014. p.xxxi.
- ¹⁸ Franklin, Bo. "Do Social Media Threaten Democracy?" *The Economist*, November 1, 2017. [<https://www.economist.com/leaders/2017/11/04/do-social-media-threaten-democracy>]
- ¹⁹ Kawa, Luke. "Two Major Apple Shareholders Push for Study of iPhone Addiction in Children." *Bloomberg*, January 8, 2018. [<https://www.bloomberg.com/news/articles/2018-01-08/jana-calpers-push-apple-to-study-iphone-addiction-in-children>]
- ²⁰ Powers. 'Hamlet's BlackBerry...' p.178. (see footnote 7)
- ²¹ Crary, Jonathan. *24/7: Late Capitalism and the Ends of Sleep*. New York: Verso, 2014. p.60
- ²² Franklin, Bo. 'Social Media...' (see footnote 19)
- ²³ Wong, Julia C. "Former Facebook executive: social media is ripping society apart." *The Guardian*, December 12, 2017. [<https://www.theguardian.com/technology/2017/dec/11/facebook-former-executive-ripping-society-apart>]
- ²⁴ Capra, Fritjof, and Pier L. Luisi. *The Systems View of Life: A Unifying Vision*. Cambridge University Press, 2016. p.314.
- ²⁵ McLuhan. 'Understanding Media,' p.46. (see footnote 13)
- ²⁶ Brockman. 'How is the Internet changing...' p.288. (see footnote 17)
- ²⁷ Crary. '24/7...' p.59. (see footnote 22)
- ²⁸ Fuller, R. Buckminster. *Critical Path*. St Martin's Press, 1981.
- ²⁹ Barlow, John P. "A Declaration of the Independence of Cyberspace." *Electronic Frontier Foundation*, February 8, 1996. [<https://projects.eff.org/~barlow/Declaration-Final.html>]
- ³⁰ Abram, David. *The Spell of the Sensuous: Perception and Language in a More-Than-Human World*. New York: Pantheon Books, 1996. p.22.

³¹ 'Short Circuit: The Lifecycle of our Electronic Gadgets and the True Cost to Earth.' Gaia Foundation, 2013. [<https://www.gaiafoundation.org/launch-of-the-short-circuit-report/>]

³² 'Tsunami of data' could consume one fifth of global electricity by 2025.' The Guardian, December 11, 2017. [<https://www.theguardian.com/environment/2017/dec/11/tsunami-of-data-could-consume-fifth-global-electricity-by-2025>]

³³ Zimmerman, Jess. "Stop worrying about your 'addiction' to the internet. We're all cyborgs – always have been." The Guardian, October 15, 2014. [<http://www.theguardian.com/commentisfree/2014/oct/15/addiction-internet-cyborgs-google-glass-withdrawal>]

³⁴ Huxley, Aldous. The Perennial Philosophy. London: Collins, 1958. p.93.

³⁵ Mekas, Jonas. Quoted in Brockman. 'How is the Internet Changing...' p.118. (see footnote 17)

³⁶ Arabi, Ibn'. Quoted by Vaughan-Lee, Llewellyn (ed.) in Spiritual Ecology: The Cry of the Earth. Golden Sufi Center, 2016. p.243.

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