

# Towards a Planetary Identity

## Abstract

At present, human thinking is limited by each person's own cognitive abilities, perceptual experiences and the individual, reduced model of the world. Although we are expanding our cognitive abilities through language, thinking tools, (computer-)systems and interaction with other brains (Engelbart, 1963), (Clark, 2003), reality is becoming increasingly too complex for individual brains.

Our capitalist social structure has led to immense inequality for decades, weakened the ability for cooperation (Sennett, 2014) and resulted in the conscious destruction of the planetary habitat (Latour, 2018), (Steffen et al., 2015).

In contrast, lys is developing a decentralized complex adaptive system that forms the framework of a participatory collective intelligence. In a sustainable society, all human beings are networked via implanted synthetic neurons, so that their thoughts are already in the process of their emergence of common origin. This enables much more complex and novel thinking processes, decentralizes decision-making processes, and the individual acts less selfishly, but for the collective benefit and in planetary sustainability.

## Keywords

Anthropocene, Artificial Intelligence, Collective, Decentralization, Identity, Neural Network, Planetary Identity, Self, Society

## 1 Introduction

In the first years of our lives we are, especially in western cultures, educated to individualism and we construct our own identity in dialogue with society. Through marketing strategies, the individuality of the singular is exaggerated in its uniqueness. Individuality and capitalism are mutually beneficial. For the purpose of competition, selfish thinking takes precedence over collective thinking. Individualism on a planetary scale is unsustainable and, to an excessive extent, not conducive to the survival of humanity. "Identity is not what matters in survival." (Parfit, 1987) On the one hand, identity has no purely biological basis (but is culturally constructed), on the other hand we deprive ourselves of our biological basis (our living space) with this construction and the resulting behavior.

We already socialized people are not able to give up our individual self-image. But we can make it possible for future generations to experience oneself not as a separated self but as a collective, growing up with a collective self-image from childhood. This also changes the entire social system, which is currently based on destructive individualism, especially in Western countries.

Although one's own view of the world is experienced from an individual central perspective, this center does not exist in our environment and in our society. Our society is based on a poly-centric order, the complexity of which can no longer be grasped by individuals and which can hardly be

controlled (Gertenbach et al., 2010, p. 32).

Due to the direct networking of the brains, these 1) can access a much greater wealth of knowledge and experience and 2) due to the much higher number of neurons, have a much higher "computing power" which enables far more complex and associative thoughts than it is possible in a single brain. Networking leads to direct decentralized collective intelligence. Thoughts are in the process of their origin in the community.

## 2 Open Self-Concept

Intuitively it seems to us that our thoughts genuinely emerge within us and that we are the sole authors of our identity. But this is essentially determined by external social factors (Dennett, 1995), (Blackmore, 1999). Our actions are also incomprehensible in their origin, as they originate from a network of countless actors (Latour, 2010, p. 81 f.). In exchange with our environment, our synaptic connections and thus also what we perceive as our self are constantly changing (Seung, 2013, p. XVI).

This ›self‹ arises in the first years of life as a cultural construction in the dialogue between several brains (Singer, 2013a, p. 73). As a child, we are addressed by adults as a unified individual. This creates the impression of the singular self (Roth, 2015, p. 98). The self model is very strongly determined from the outside and can only be formed in the incorporation of others. The ability to put oneself in the position of others and to communicate with them through cultural meta representations is essential (Singer, 2013a, p. 74).

The degree of individualization is linked to the amount and variety of external influences. Thanks to the global networking already in place, this self-concept can now in principle be made much more open and comprehensive than in the past, since much more information can be incorporated into the design from outside. Future neural networking will allow a much more direct access to others and thus increase the diversity of our self.

For this we must be ready to gradually dissolve our mind, which is perceived as genuine. Through the factual physical networking we are aware that we are not the sole authors of our thoughts. Accordingly, our self-perception is changing.

This self-abandonment cannot easily be unified with one's own already established self-model. However: "We are not one I", but a connection of several "I-states"<sup>1</sup>, which refer to each other (Roth, 2015, p. 96).

"The ›perspective of the first person‹ is exclusively a phenomenon of representation that corresponds to nothing in the objective structure of the world. We are not mysteriously identical with a particular inner-worldly person and his or her point of view, but in this sense we have no identity at all: we are an internally more or less strongly correlated set of physical and psychological characteristics that moves through time. The unity of self-confidence is a representational fiction." (Metzinger, 1996, p. 151)

Our body is also a connection formed from single elements. This open system is in permanent exchange with the environment (energy, microbes, viruses). If we think of our body not as a closed singular thing but as this open multiplicity (Yong, 2016), the step to an open neural activity shared with other living beings is not far.

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<sup>1</sup> All quotations (except by Parfit and Wallace) are translated by the authors.

### **3 Planetary Identity**

We humans belong to those living beings who create mental models from their experiences: a personal self-model of ourselves in our environment, models of small communities and a comprehensive model of reality into which all other models are integrated (Metzinger, 1996, p. 130). What is missing is a planetary mental model that is written collectively and transcends individual life. In the first stage of lys, the networking and thus the construction of this planetary mental model is limited to humans and machines constructed by humans. Afterwards, other non-human actors (animals, plants, raw materials) will gradually be integrated into the network with the aim of creating a planetary identity that is as comprehensive and balanced as possible.

Various non-human animals with similarly formed brains also have forms of consciousness and ego-feeling. What distinguishes the human brain from these is the syntactic-grammatical language and a more pronounced capacity for action planning (Roth, 2015, p. 55). This allows us to tell us ourselves (Ricoeur, 1992) and imagine and plan our future. Nevertheless, our mental abilities are also limited and we usually think in everyday questions during our own biological life. The self is regarded as very valuable ("worship of self" (Wallace, 2005, p. 9)) and stands above the rest of society.

„Everything in my own immediate experience supports my deep belief that I am the absolute center of the universe; the realest, most vivid and important person in existence." (Wallace, 2005, p. 3)

The thought that one's own life and thus one's self is finite is a problem for many people. A currently popular research strand tries to solve the problem by mind uploading. Planetary neural networking offers another way out: the embedding of one's own thoughts into the community. The body dies, thoughts continue to exist in the thoughts of others. Through networking, the individual is part of a new eco-socio-system (a grounded (Latour, 2018) connection of man and environment), that extends beyond this individual and exists.

While decisions are distributed in our brain and not made centrally, the decision-making structure of our social systems is largely oriented towards hierarchical decision-making models (Singer, 2013b, p. 169). However, from a certain degree of complexity these are unsuitable:

"Either the decision-makers are overwhelmed because they have to use too much information, or too much information is suppressed and eliminated in the run-up to the decision in order to relieve the decision-makers." (Singer, 2013b, p. 169)

Through the direct networking of neural activities, not only economic and political decisions are decentralized, but also decisions that directly affect personal life are made much more decentral than is possible in a singular closed brain, which only uses a singular world view as a reference object. This does not mean that the identity will completely dissolve, but it will emerge in a new multilayered form. Direct networking not only enables us to put ourselves in the perspective of others, the perspective of others flows directly into our perspective and leads to a genuine poly-perspective.

### **4 Implementation**

An external network is required to link suitable impulses of various minds with each other. In principle, it is based on the basic idea of the current Internet, which is already a step towards a global self-model. In the traditional Internet, the individual actor is predominantly at the center of

his own Internet activity. Methods of network organization and information distribution (algorithmic filters) promote this isolation from the other and the consolidation of one's own thinking.

In contrast, the decentralized, complex adaptive system developed by lys guarantees the characteristics of healthy collective intelligence: diversity of opinion (each with its own different information), independence (without directly influencing individuals), decentralization (different knowledge contexts), aggregation (bringing together individual decisions). (Surowiecki, 2005)

First of all, it is necessary to make parts of the neural associations of the cerebral cortex capable of transmission. No surgery will be necessary for this, as the necessary components reach their destination in the cell bodies of the neurons by means of molecular machines ("nanomachines"). Each synthetic neuron is equipped with an atomic transistor of graphene (Novoselov et al., 2004). This measures and controls the neuron's electricity flow. Status changes are recorded and transmitted (encrypted with a biological key) to our nearest server using radio frequency technology (Han et al., 2014). The core of the following analysis with artificial intelligence is the connection of neural activities with mental representations of the specific mind. In addition to these mental representations, we search for real-time mental representations of other actors in our system that can interact with them and produce new neural activities. This creates temporary spontaneous peer-to-peer communities. The focus is on the fact that the individual is a variable actor of the system and not its center. lys also sees itself not as the center, but as a framework for the actual actors. The information flowing through the system is not permanently stored (which would be contrary to the idea of planetary sustainability in view of the amount of data), but is only used to improve the system. Thus there is no huge database from which fixed knowledge can be retrieved if required. Information is generated ad hoc by the network at the relevant moment in the interaction of neural activities. Carriers of information are not computer centres, but living biological cells in our bodies.

Evolutionary older brain areas (hypothalamus, central gray, central amygdala, vegetative brain stem centers), which are responsible for basic functions such as movement control and vegetative functions, are not directly equipped with synthetic neurons. In this way, every being retains their own body awareness in addition to the automatically occurring vital bodily functions. (Only the affect behavior is, if necessary, synthetically modified via the limbic areas of the cerebral cortex. If the mother is sufficiently integrated into the system during pregnancy, the affective behavior is already adjusted by prenatal influences on a collective scale.

In general, it is beneficial for the development of the child if the mother is cross-linked by synthetic neurons. The brain of a fetus is particularly versatile and reacts strongly to external environmental influences, including the brain activities of the mother (Roth, 2015, p. 30). Accordingly, collective thoughts of the mother during pregnancy lead to a direct adaptation of the brain to a sustainable coexistence.

Of course, we also implant the network-capable neurons in adults. There they are then in competition with the established self-image and will dissolve it over time.

The following is an example of how lys works.

»Competition«: Person A sees person B in the pedestrian zone wearing a shopping bag from a manufacturer of cheap clothing. In A neural activities are generated which evaluate purchasing negatively. A thinks of the associated environmental impact and the exploitation of human labour. If B also thinks about purchasing at the same moment, the neural activities of A and B could easily be linked together. lys calculates a higher planetary value for the thoughts of A, since A does not think of itself but of other actors and creates a more extensive and multi-layered network in our

system through connections to them. B, on the other hand, sees himself at the center of thought. At B, conspicuous activities in the limbic level of emotional conditioning (The "infant in us" (Roth, 2015, p. 119)), especially in the mesolimbic system (ventral segmental area, nucleus accumbens) can be discerned, which suggest an engagement of the person with himself and the immediate environment. Thus, the neural activities of A are integrated into those of B and initiate a rethinking.

»Instructions«: A person moves in unknown terrain (sociological, geological). This can be seen in an increased neural activity, which is necessary to cope with this situation, which is everyday for other people and can be solved without conscious cognitive effort. lys registers this effort in A and as a result a network with people who are familiar with this terrain and who are also in it and have no difficulties with the situation is realized.

»Cooperation«: Another essential advantage of the system is collective problem solving. This also reveals the potential growth of the collective. A small working group of people equipped with synthetic neurons is working on solving a complex problem. They can communicate very well with each other, since there are often coherences of their mental representations and they are in a fluid exchange with each other via lys.<sup>2</sup> Of course, networking is not limited to this small group. From each of them a ramified networking to other people takes place, whose thoughts and insights (which in turn are related to other people) flow into the thoughts of the working group. At the same time, everyone becomes both the receiver of information and the transmitter, so that a manifold interacting neural activity arises. It will thus be possible for virtually the whole planet to be involved in solving a problem and, consequently, for all interests to be involved.

## 5 Conclusion

We do not have full control over many of our characteristics and actions. Our ecological and social environment determines us more than we are aware of. In the first years of life we are at the mercy of this environment. Why do we think that this changes so much with the formation of the self? External influences have direct effects on our brain and flow into it, why not the thoughts of other people?

In its current form, egoism and capitalism prevent a sustainable human coexistence. In contrast, lys establishes a framework that enables the spontaneous and loose networking of individuals to collectives on a planetary scale. This is not done via interfaces, but directly in the area of neural activities using synthetic neurons. This leads to an expanded opening and gradual dissolution of the self. Which, as has been described, however, has always been far less genuine (and biologically real existent) than we perceive it.

In adolescence, children experience themselves as a unique and individual person with a singular self (Roth, 2015, p. 98). When synthetic neurons are implanted in future generations during the first two years of life, their consciousness awakens as a collective planetary consciousness. Since the synaptic connections are only formed during pregnancy and the first years of life, they can adapt the brain structure to collective coexistence if the mother has already been cross-linked.

Through cooperation we can "gain self-knowledge [...]" (Sennett, 2014, p. 19). The self-centeredness in our everyday world experience is an unconscious standard behavior towards which, if we can detach from our own perspective, we live a conscious and free life (Wallace, 2005, pp. 3–4, 9).

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2 This is the business model of lys: Since networking is a simpler and more comprehensive way of communication in working groups, it becomes an employment criterion. In addition, networking stands for increased cognitive competence.

Through networking, thoughts are of common origin and we can take up an actual poly-perspective world view that creates in each of us a model of a planetary identity that reaches beyond the individual. Decision-making is decentralized and ideally integrates the needs of all actors concerned. The success of my thoughts does not depend solely on me, but on the feedback they generate in the network.

In further development steps more and more actors of the earth are associated with each other, which relativizes the position of humans in this system and gives their actions and goals a grounding.

## References

- Blackmore, S., 1999. *The Meme Machine*. Oxford University Press, New York.
- Clark, A., 2003. *Natural-Born Cyborgs: Minds, Technologies, and the Future of Human Intelligence*. Oxford University Press, New York.
- Dennett, D.C., 1995. *Darwin's Dangerous Ideas. Evolution and the Meaning of Life*. Simon & Schuster, New York.
- Engelbart, D., 1963. A Conceptual Framework for the Augmentation of Man's Intellect, in: Howerton, P., Weeks, D. (Eds.), *Vistas in Information Handling*. Spartan Books, Washington D.C, pp. 1–29.
- Gertenbach, L., Laux, H., Rosa, H., Strecker, D., 2010. *Theorien der Gemeinschaft. Zur Einführung*. Junius, Hamburg.
- Han, S.-J., Garcia, A.V., Oida, S., Jenkins, K.A., Haensch, W., 2014. Graphene radio frequency receiver integrated circuit. *Nat. Commun.* 5, 3086.
- Latour, B., 2018. *Das terrestrische Manifest*. Suhrkamp, Berlin.
- Latour, B., 2010. *Eine neue Soziologie für eine neue Gesellschaft. Einführung in die Akteur-Netzwerk-Theorie*. Suhrkamp, Berlin.
- Metzinger, T., 1996. *Niemand sein. Kann man eine naturalistische Perspektive auf die Subjektivität des Mentalen einnehmen?*, in: Krämer, S. (Ed.), *Bewußtsein. Philosophische Beiträge*. Suhrkamp, Frankfurt am Main, pp. 130–154.
- Novoselov, K.S., Geim, A.K., Morozov, S.V., Jiang, D., Zhang, Y., Dubonos, S.V., Grigorieva, I.V., Firsov, A.A., 2004. Electric Field Effect in Atomically Thin Carbon Films. *Science* 306, 666. <https://doi.org/10.1126/science.1102896>
- Parfit, D., 1987. *Reasons and Persons*. Clarendon Press, Oxford.
- Ricœur, P., 1992. *Oneself as Another*. University of Chicago Press, Chicago.
- Roth, G., 2015. *Persönlichkeit, Entscheidung und Verhalten. Warum es so schwierig ist, sich und andere zu ändern*. Klett-Cotta, Stuttgart.
- Sennett, R., 2014. *Zusammenarbeit. Was unsere Gesellschaft zusammenhält*. Deutscher Taschenbuch Verlag, München.
- Seung, S., 2013. *Das Konnektom. Erklärt der Schaltplan des Gehirns unser Ich?* Springer, Berlin.
- Singer, W., 2013a. Vom Gehirn zum Bewußtsein, in: *Der Beobachter Im Gehirn. Essays Zur Hirnforschung*. Suhrkamp, Berlin, pp. 60–76.
- Singer, W., 2013b. Der Beobachter im Gehirn, in: *Der Beobachter Im Gehirn. Essays Zur Hirnforschung*. Suhrkamp, Berlin, pp. 144–170.
- Steffen, W., Broadgate, W., Deutsch, L., Gaffney, O., Ludwig, C., 2015. The trajectory of the Anthropocene: The Great Acceleration. *Anthr. Rev.* 2, 81–98.
- Surowiecki, J., 2005. *Die Weisheit der Vielen*. Bertelsmann, München.
- Wallace, D.F., 2005. *Transcription of the 2005 Kenyon Commencement Address*.
- Yong, E., 2016. *I Contain Multitudes. The Microbes Within Us and a Grander View of Life*. Random House, London.