

How ‘Cocreation and Cocreation Sciences’ can help to make the transition towards endogenous sustainable development.

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Summary

In this contribution I will describe our experiences in The Netherlands in our International Institute for Inclusive Science (‘Triple I-S’) with the new transdisciplinary field of cocreation sciences, that we started as a one-year postgraduate training in 2004. Its program was based on our experiences with the network ‘Spirit in Science’ since 1997, and their four dutch conferences, as well as with the two international conferences ‘Seeds of Wholeness’ (see www.seeds-of-wholeness.org).

The training, a real journey, started from the core questions: ‘Can you imagine a world based on co-operation and cocreation, on sustainability and harmony, in humans, work and environment, on local and global levels, for now and in the future? How can scientists provide a contemporary contribution to foster such a self-aware world?’

We started from the principles as formulated in the Earth Charter in 2000 and tried to implement these principles through (self-)consciousness and practice, embedded in new scientific notions and theories. So, the program aimed to contribute to a sustainable and harmonious society for all living forms, and placed the urgent development of human consciousness as pivotal to this process. Five students embarked with the mission to create something new together within our existing historical context. Three pillars form the program: (1) the theory, with transition sciences and consciousness research; (2) the practice, focused on harmony, sustainability and quality of life and (3) the dimension of self-inquiry’: who am I and what is my gift to the world? The first and third pillar will be described in this article. The second pillar will be described in two other articles for Moving Worldviews (see Verschuur and Stijkel 2006; Bosman 2006).

After millions of evolutionary years we are facing an unprecedented crisis that we perceive as a birth. All we have to do is enter the evolutionary spiral. Through synchronicity we named our journey ‘the end of a new beginning’. Let’s make that quantum leap together...

Cocreation

Cocreation is essentially a divine process between beings in conscious connection with their wholeness, an evolving phenomenon of creation between the masculine and the feminine. Barbara Marx Hubbard can be seen as the mother of cocreation, when she comes with her revolutionary book ‘The revelation: Our crisis as a birth’ (1993). She describes cocreation as ‘the act of engaging in a conscious creative partnership with the innate impulse of creation, the intelligence of nature and natural systems design, the intuitive collective consciousness of humanity, and each person one encounters, from a place of essential, heart-centered being.’ You can interpret this definition (at least, within Triple I-S we do so) in such a way that we as mankind are making the evolutionary step from procreation to cocreation, from giving birth to physical babies to creating and cultivating Seeds of Wholeness (‘sacred brain children’).

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Figure 1: Our crisis as a birth (Barbara Marx Hubbard, 1993)

According to Hubbard (1998), the fulfillment of the self-interest of the individual concurrent with the fulfillment of the self-interest of the whole (group, planet, universe) is at the core of the cocreative process. After millions of evolutionary years we are facing an unprecedented crisis. We perceive it as a birth. All we have to do is enter the evolutionary spiral. Driving force in this evolutionary spiral is ‘designing intelligence’ (see figure 1, core), not to be confused with Intelligent Design (ID), the controversial and deterministic concept of the Creationists, in which there is no room for evolution, only for God as The (only) One Creator.

For us, cocreation is an inclusive concept (see figure 2). You only can become a ‘master’ in cocreation as you know in depth the lessons of co-operation, competition and conflict, as well as of survival. That asks for intrapsychic as well as interpersonal insight and healing, with attention for, and acceptance of light sides as well as shadow sides.

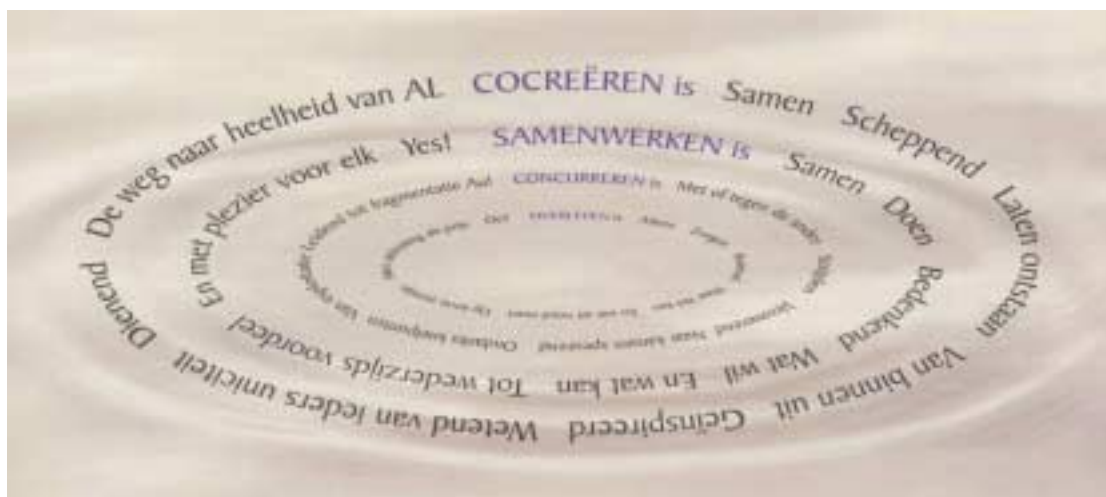


Figure 2: the concept of cocreation is inclusive (Stijkel, 2003)

Cocreation Sciences

After years of experiences as foundation with practical cocreation processes and projects we decided to make the abstraction step from cocreation to cocreation sciences, a science in which pattern recognition in individual and societal cocreation processes will be linked with

other scientific insights, especially from the field of *transition sciences* as well as from *consciousness research*, instigating the evolution of sustainability, especially as formulated in The Earth Charter (2000). The Earth Charter is the product of a decade long, worldwide, cross-cultural conversation about common goals and shared values, starting after the VN Rio conference in 1992. The drafting of the Earth Charter has involved the most open and participatory consultation process ever conducted in connection with an international document. Thousands of individuals and hundreds of organizations from all regions of the world, different cultures, and diverse sectors of society have participated. The Charter has been shaped by both experts and representatives of grassroots communities. It is a declaration of fundamental principles for building a just, sustainable and peaceful global society in the 21st century. It seeks to inspire peoples a new sense of global interdependence and shared responsibility for the well-being of the human family and the larger living world. It is an expression of hope and a call to help create a global partnership at a critical juncture in history: the emerging global civil society.

Cocreation as a science has an inclusive nature since it embraces experiential, intuitive, and appreciative forms of knowing ('wholebody science') and circulates between individual and intersubjective group learning processes. In 1997 we formulated with our network 'Spirit in Science' our principles for that inclusive way of knowing (see figure 3). The transdisciplinary field of Cocreation and Cocreation Sciences transcends current natural and humanistic sciences. The idea of 'transdisciplinary research' is used to point out to a range of research practices in which knowledge from different social and academic actors is integrated. It can be seen as a new form of learning and problem solving that helps in meeting the complex challenges of society today. In the Charter of Transdisciplinarity as it was adapted at the First World Congress of Transdisciplinarity in Portugal, in 1994, and modified in 2002, the principles of transdisciplinarity are elaborated more (<http://perso.club-internet.fr/nicol/ciret/>).

Principles of Triple I-S

(Further) development of inclusive science specifically involves the promotion of:

- Broadening of the epistemological and ontological basis of science:

to be *open* to new perceptions, insights and experiences; to be *critical*; and to conscientiously evaluate ideas and output in terms of its contribution to the quality of life.

- A broad social basis:

to develop both within a discipline, interdisciplinarily as well as transdisciplinarily; and, as far as possible, to assess theories and their applications, which derive from science, to ensure that cognitive, experiential, emotional, intuitive, and spiritual aspects play an equivalent role. This involves creating a climate within science and society whereby the indicated inspirational and anomalous practice of science and its applications are recognized and encouraged.

- Expansion of the methodological foundation of science:

the discovery and development of the philosophy of science and the design of methodological insights, which can support the relevant theories and applications.

- Attention to ethics:

responsibility for the maintenance of the highest possible scientific and ethical standards, so that science serves the quality of life of the individual and society.

- Respect for people and nature:

serving the developmental process of the individual and society in an atmosphere of equality, connection and respect for the other and the environment. This involves being open and sensitive to the views of others and the prerequisites of our natural environment.

Figure 3: Basic principles of Spirit in Science/Triple I-S (1997)

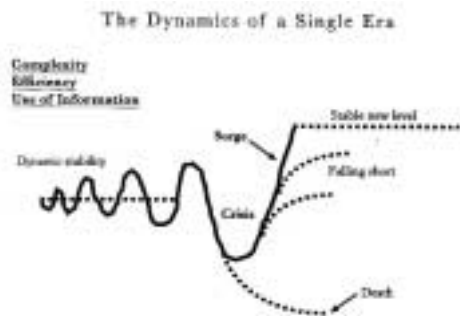
So, Cocreation Sciences is a value-driven design-science in context, that originates from the constructivist notion that reality as it is to us is the result of *conscious* creation processes in the past, by (human) nature, and allows for change and re-design by conscious individuals and societal actors for future generations. These creation processes can be sustainable and peaceful by nature, adopting the guidelines of biomimicry (no beat, heat or treat methods, as described by Janine Benyus, 1997) as well as the values of cultural creatives (Ray and Anderson, 2000), following the developmental (consciousness) stages in man and organisation, as described in Spiral Dynamics (Don Beck & Christopher Cowan, 1996), in the principles of living systems (Elisabet Sahtouris, 2000), in the learning organisation (Peter Senge et al, 1995, 2004), and in Spiritual Capital (Zohar and Marshall 2004; about using our rational, emotional, and spiritual intelligence to transform ourselves and corporate culture).

As a practical science, cocreation sciences not only include experiential, intuitive and appreciative ways of knowing, combined with intersubjective group learning (as in inclusive science in general), but also include experiential ways of creating, individually or as a group: cocreation alternated through reflection. Keys in this process – besides implementing and taking responsibility for this ever-growing consciousness – which in itself is *consciousness* and especially *self-consciousness*, on individual as well as group level, and how this can be developed at the level of giving meaning to one's life and communication on this meaning, are: "Who am I?", "What are basic values for me?" and "What is my contribution to you, my environment and this world at this time"? Emotionally charged topics as making transparent the views on 'God as Creator' and 'Cocreation with the invisible world' are also open to be included and to be embedded in e.g. (trans-)religion studies, as well as in old wisdom traditions. System borders between co-operation and cocreation will be highlighted and elaborated. Also the notion of 'glocal' (a word coined by Elisabet Sahtouris that expresses a permanent switch between the scale levels of global and local) will play a role, combined with a search for the reciprocal bottom-up and top-down route. We also take into account Ashby's law: only variety beats variety. And the biologists Maturana and Varela (1987) have emphasised in *The Tree of Knowledge* a central co-creative principle on living systems as autopoietic systems that self-organise into being, where the organism as a whole creates and transforms its own being and differentiates itself from its surrounding environment on a continual basis.

One of the pillars of cocreation sciences is *Transition sciences*, and is about moving within a system from dynamic stability into a crisis where the same system could die, fall short, or stabilize at the next level. Rotmans (2001) describes these transitions as "*transformation processes in which society changes in a fundamental way: transition management involves sensitivity to existing dynamics and regular adjustments of goals to overcome the conflict between long-term ambition and short-term concerns*". Learning by doing and doing by learning how to work... What remains is learning by learning and this is the very thing that we explored in depth with the students and participants for the program in Cocreation and Cocreation Sciences in their practical projects (see Verschuur and Stijkel, 2006; Bosman 2006).

Ervin Laszlo (2002) describes in figure 4 the risks and potentials in transition processes. Periods of relatively dynamic stability will necessarily be alternated by crises that could lead to a higher order, a new period of relatively dynamic stability, but could also lead to death,

sooner or later, because of inadequate coping strategies. And coping strategies ask for alert consciousness.



Figur 4: The Dynamics of a Single Era (Ervin Laszo, 2002)

Consciousness research is the other pillar of Cocreation Sciences, and is done through the three eyes of knowledge, that of matter, mind and spirit, as described by the integral philosopher Ken Wilber. Wilber distinguishes “three eyes of knowledge”:

1. *the eye of matter* (the world through our senses; natural sciences)
2. *the eye of mind* (the world through the intellectual: sense-making, interpretation, logistics; social sciences)
3. *the contemplative eye of spirit* (the transcendence; opening through meditative education; spiritual science).

According to Wilber, spiritual science has its own domain of experience with its own forms of research methodologies, own rules and own exactness. The virtue of Wilber is that he always, besides distinction, also recognises the unity in those three approaches. The (common) *essence of the scientific procedure* in all these three forms is according to him:

(1) meet the prescriptions; (2) observe what happens; (3) check the outcome with other well-qualified researchers. Ken Wilber considers those three domains of knowledge in its essence also as three domains of individual evolution: everyone starts his or her development in the physical-sensorial domain, next goes to the mental domain, and finally, for example by meditation, enters the spiritual/transcendental domain. All people have more or less access to these three knowledge spheres, three spheres of being. Those three spheres can be called in diverse ways, like subconscious/conscious/supraconscious; prerational/rational/transrational; prepersonal/personal/transpersonal. In this way Wilber tries to come to an all-inclusive worldview in which science and mysticism or science and religion will be reconciled.

In fact, Wilber was not new with his idea about reconciliation of science and religion. Einstein also stressed the importance of ‘cosmic religiosity’ in doing science (Publ. New York Times Magazine, 7 november 1930): ‘to encourage the experience of Oneness, to allow the mystery of the overwhelming unfolding order in nature and environment; to maintain this experience, and to pass this experience and knowledge on people who are able to learn that’.

Summarizing, in our postgraduate training we integrate knowledge from those three eyes of knowledge, but focus on experiencing the third eye of knowledge [see the parallel in the name of our institute (Triple I-S)], the eye of spirit. In doing that, we make use of old and new wisdom traditions and practices, and exercise new forms of knowing by meditation, silence, sound and art, but also e.g. by inviting a medium and trying to look at that information with fresh eyes, with an attitude of alternating openness and (respectful) critical sense. Figure 5 summarizes the characteristics of cocreation sciences.

COCREATION SCIENCES

- Whole body science
- Focus on consciousness at all levels
- Value driven: 'sustainability /quality of life'
- Design in context, transdisciplinary
- Process oriented - goal searching
- Peaceful - rebalancing feminine values
- Including new forms of knowing, with an open and critical attitude

(From: Stijkel 2003; presentation conference 'such is life')

Figure 5: the characteristics of cocreation sciences

Self-inquiry: diving into your driving forces

Who am I, and what is my world gift? What are basic values for me? What is my contribution to you, my environment and this world at this time? Creating without knowing who you are and why you are doing what you are doing is a dangerous enterprise. The risk of being driven by your emotional reactions or by projections is always there. So, the transformative inner journey from reaction to creation can sometimes be felt as an alchemistic process, looking with 'the eye of spirit' deeply inside.

Let me take you into my (dynamic and transforming) driving forces. When I was a teenager I recognized our society in the left poster/image of figure 6: "If we have to pollute our amniotic fluid for our economy, we would do that"; I promised the environment that I would help to stop that development. After years of scientific and societal (participative) action work in 1995 I defended my transdisciplinary thesis: "On managing reproductive risks of occupational exposure to chemicals", in which I questioned the current way of standard setting for the workplace, discussed the interpretative space in several standards, and proposed more transparent and sound procedures based on two principles from the 1992 Earth Summit with its Agenda 21: (1) *the precautionary principle*, and (2) *the principle of equal rights and equal opportunities* (the middle image from figure 6), and made so explicit that also natural sciences are necessarily value-driven. Later on I realised that not only the world outside needs to be taken into account, but also the world inside us. As long as we are not aware of our Pain, Passion, Peace, Pleasure and Power, we are unconscious creators of our outer world. A more conscious attitude concerning *in*vironmental issues would be more appropriate to deal with environmental issues. Our presuppositions about ourself, the other and our environment influence the way we solve the problems we meet. Is there only the Darwinian notion of 'survival of the fittest', in self-interested beings, homo economicus, or do we also believe in the potential of an interdependent, harmonious world in which we are more and more conscious participant and evolving cocreators? And so I came to the right image in figure 6. The last ten years I followed that inner path and came to the conclusion how important it is to make contact with our deeper driving forces and to communicate on that, in scientific as well as in societal contexts. And so we did in our postgraduate program, with our conversation on our five individual, *personal Ps*: Passion, Pain, Peace, Power and Pleasure.



Figure 6: My own journey through science and society, expressed in three metaphors

In the process of societal innovation and design, starting from the notion that man is above all also a social being, we recognized five new “We” key-words, in Dutch indicated with five Vs: Vrijheid (‘freedom’), Verbinding (‘connection’), Veiligheid (‘safety’), Vertrouwen (‘trust’), Verantwoordelijkheid (‘responsibility’). New practices are necessarily embedded in old practices and for that reason we have seen, more than once, how important it is in these emergent new practices to work with clearly established social commitments and social contracts, besides inspiring ‘Cocreators Agreements’, as developed by The Geneva Group Agreements, Boulder CO, 1985. 19 Agreements that all begin with the word “I”; for example about “deep listening”: I agree to listen respectfully to the communication of others and tune into their deepest meaning; and about “take responsibility”: I agree to take responsibility for my creations, my reactions, my experience and my relationships.

Summarizing: self-inquiry, diving into your driving forces, not only opens to (1) *inclusionality* (not only attention to light sides but also for dark sides), or to (2) *rebalancing* (for example between doing and being), but also opens to (3) *transformation* (as Zajonc also described in his contribution to Moving Worldviews). The transformation of ‘reaction’ to ‘creation’ is a huge one, being the result of such a deep diving process. For example, typical (human/animal) emotional reactions/responses like 3F: “*fight – freeze - flight*”, absolutely helpful in survival or competitive situations, can be transformed through deep inner work (insight and/or healing; more or less alchemistic in nature; e.g. by methods as unwinding, or EMDR) into a more intelligent 3F-response, coming from ‘higher’ emotions: *fire – free- fly*; responses that are more helpful in co-operative and cocreative contexts. From only focus on ‘needs’ based on self-interest towards focus on inclusionality, with sacred ‘seeds’ (see figure 7), in which self-interest and common interest are rebalanced.

REACTION	CREATION
Fight	Fire Sacrificing our egosystems Creating space <i>Dying</i>
Freeze	Free Cultivating a YES, a welcome in my frontyard Filling the space <i>Living</i>
Flight	Fly Sacration, searching for a culture for living and loving Fulfilling the space <i>Loving</i>

Figure 7: A 3F-Transformation process

And so we learned: the journey of consciousness will never end, nor the field of consciousness research. But it was, and it will be, a sacred, healing journey; and we learned above all that the role of consciousness (development) will need to grow more and more, in order to meet the huge challenges of current era. Let's make that quantum leap together...

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