



# Plausibility Pulse

*:a collection of works that address plausibility*

## Chris Groves

### **The Futures of Causality: Hans Jonas and Gilles Deleuze**

(a version of this paper will appear in *Causality and Motivation*, ed. Roberto Poli, Ontos Verlag, 2010)

To understand novelty, we arguably require a concept of the future which does not define it as fully determined by the past. In other words, we need an adequate concept of anticipation – one which does reduce anticipation to a purely mental phenomenon or ideal projection. To flesh out what such a concept might require, I examine Hans Jonas' concept of immanent teleology and Gilles Deleuze's concept of the virtual. While Jonas' concept is shown to be useful for understanding adaptive behavioural novelty at the level of the individual organism, Deleuze's is interpreted as having a broader analytic scope, applying to the creation of novelty across any number of different kinds of non-equilibrium systems. In both cases, the meaning of anticipation – and with it, causation – is widened in ways which evoke Aristotle's ambiguous notion of action.

### **Future ethics: risk, care and non-reciprocal responsibility**

(Published in *The Journal of Global Ethics*, 5 (1), pp. 17-31, with a response by Professor Robin Attfield, Department of Philosophy, Cardiff.)

Understanding anticipation requires that we understand something of what Spinoza called “love”, participation in the “essence of others”. This essay deals with the inadequacy of prevalent concepts of responsibility in the face of intrinsically unknowable technologically produced risks and uncertainties. The alternative understanding of responsibility outlined here relies on a concept of anticipation developed against the background of phenomenological and feminist concepts of care. Such concepts privilege an understanding of human beings that is primarily relational rather than individualistic, and show that responsibility is, in the first place, about actively connecting to singular futures rather than simply respecting some pre-given limit of separation. Care, by opening up for us an understanding of the diversity of values that are constitutive of a worthwhile life, also connects us to the future as the future of care. As such, it provides us with ethical resources that can guide us in the face of uncertainty, including general principles of action and the desire for institutions that can articulate them.

## Thomas J. Chermack

My preface to this list is thus: When I consider the concept of plausibility, nothing comes to mind in terms of a pivotal, or seminal contribution. My familiarity with “plausibility” is only in its use as a criterion for

assessing the utility of scenarios in scenario planning. However, as I think about plausibility and what it means, the following three references are important as I begin to formulate my ideas on the topic:

**Pierre Wack's *The Gentle Art of Re-Perceiving*.** This article is simply the most compelling case for scenario planning that has been written. Every time I read this article (and I read it often), I have a new insight about scenario planning and how it works. I have the privilege of access to a copy of Pierre's article prior to being edited and split into two different publications in the *Harvard Business Review*. Pierre's original writing is more informative in the sense that his personality comes across. There are many ideas in this article that relate to plausibility, though none are explicitly stated. In other words, the article provides clues to the persistent and curious reader. This original piece should be freely available to anyone interested in scenario planning, but I do not feel it is my prerogative to provide the article, as there may be copyright issues associated with the Pierre Wack Memorial Library.

**Joe Dispenza's *Evolve Your Brain: The Science of Changing your Mind*.** Dispenza was a featured commentator in the film *What the bleep do we know?* I have had several interactions with Joe Dispenza and consider his work on the brain and how to change personal habits, belief systems, and mental models to be the most practical. Further, Dispenza has a knack for boiling down complex neurological concepts to their essence and communicating their implications for everyday practice. The emerging research in neuroscience and quantum physics has much to offer the cutting-edge scenario practitioner. While not explicitly stated, Dispenza's work has profound implications for how belief systems are developed, modified, and changed, which in my mind, relates directly to plausibility.

**D.T. Suzuki's *Zen and the Art of Japanese Culture*.** It is interesting to note that very few Japanese authors have attempted to interpret Zen. Most texts on the topic have been written by Westerners. Some Japanese have merely commented that the very use of prose is to admit one's spiritual failure. I don't want to say too much about this book as it should be an individual experience for each reader. I can say, however, that it has profoundly affected my own understandings of things I may think I know.

### James D. Faubion

I have mentioned Hans-Robert Jauss, Stuart Hall and Pierre Bourdieu in my comments. Jauss's *Toward an Aesthetic of Reception*, Hall's *Representation: Cultural Representations and Signifying Practices* and Bourdieu's *Distinction: A Critique of the Judgment of Taste*, all seem to me to be essential reading.

I would add two other authors to my list. One is Walter Benjamin, whose early *Origins of German Tragic Drama* is a particularly sensitive analysis of a particular case of the dynamics of collective historical experience, class and status, narrative genres and the inflection of collective attitudes toward the form and substance of the historical process that attend--if incompletely--to the level of detail that a well-bodied approach to plausibility should further explore. Granted, it's a bit too literary for immediate application.

The other is Marshall Sahlins, whose *Islands of History* offers among other things a fascinating account of the "mythicopoetic" reception of Captain Cook upon his arrival in (and return to) Hawai'i that is rich in analytical tools and suggestions with which to approach the analysis of judgments of plausibility in less exotic anthropological times and climes.

## Vanessa Schweizer

**Morgan, M. G. & Keith, D. W. (2008) Improving the way we think about projecting future energy use and emissions of carbon dioxide. *Climatic Change*, 90, 189-215.**

This paper nicely summarizes what I referred to in my Plausibility Portrait as the “dangerous allure” of plausibility. It demonstrates the poor historical accuracy of long-term energy-related forecasts and explains the cognitive heuristics that make accurate scenario construction difficult. It argues that plausibility should be assigned to a set of scenarios (a space) rather than to a single scenario (a one-dimensional trajectory). It concludes that a necessary step for identifying the plausibility space is to identify the upper and lower bounds of quantities of interest.

**Selin, C. (2006) Trust and the illusive force of scenarios. *Futures*, 38, 1-14.**

Although I don’t agree with all of the implications of this paper, it discusses many dimensions of trust, which affects the perceived credibility (and hence perceived plausibility) of scenarios. It refers primarily to narrative scenarios constructed in a participatory process. However many of its observations on scenario trust and credibility also apply to quantitative scenarios (models). Trust is treated in five parts: (1) Trust in sources (the people who create the scenarios); (2) trust in content (data quality and assumption transparency); (3) methodological credibility (which varies by method and might be supplanted by trust in other domains); (4) trust in narrative (due to its familiarity to the scenario user); and (5) trust in dissemination (i.e., who presents the final scenarios and how). By considering these five dimensions of trust, the overall credibility of any given set of scenarios can be affected. Selin concludes that the question of trust is ultimately a question of persuasiveness, which is subject to the Aristotelian modes of ethos (belief in the character of the messenger/message), pathos (belief in emotional appeals made in the message), and logos (belief in the reasoning employed in the message).

**Weimer-Jehle, W. (2006) Cross-impact balances: A system-theoretical approach to cross-impact analysis. *Technological Forecasting and Social Change*, 73, 334-361.**

This paper introduces cross-impact balance (CIB) analysis, which holds promise as an approach to plausibility assessment. The CIB method can reveal many traits of a possibility space and is well suited to assessing scenarios with qualitative components. CIB analysis can be used either to identify internally consistent scenarios from scratch or to assess the internal consistency of already constructed scenarios. In either case, the CIB method decomposes scenarios into their constituent parts and requires an explicit account of how the scenario authors (or a scenario analyst) believe constituent parts influence one another. By systematically comparing all possible combinations of promoting and restricting influences, any assumed set of influences can be tested as a “self-consistent network of [system] influences.” (p. 342) Combinations that prove self-consistent (self-reinforcing) are deemed perfectly internally consistent and are considered the most plausible scenarios in the possibility space due to their stability.

## Federica Lucivero

**Nordmann, A. and A. Rip (2009). "Mind the gap revisited." *Nat Nano* 4(5): 273-274**

How can we say whether an expectation about an emergent technology is plausible? And how can we ground an ethical reflection on a plausible expectation avoiding speculations. These questions where started by (Nordmann and Rip 2009). In their article, they encourage the rise of a less speculative ethics. As they claim, too often ethics leaps ahead science: there is a gap between ethical enquires and actual technology development. In order to bridge the gap between futuristic ethical speculation and real technology development, the two authors demand ethicists and social scientists to confront the information they retrieve from different actors about the future of nanotechnology and to assess their **plausibility**. The two authors advocate the need of a "**reality check**" which should be prior to any evaluation of the technology with respect to ethical issues: they mention "the need to encourage discussions about quality of promises"

## Shirin Elahi

**Cvetkovich, G & Löfstedt, R L (eds) (1999) *Social Trust and the Management of Risk*. Earthscan Publications, London**

This is a collection of studies examining the issues relating to social trust. It deals with the question of how social trust should be defined, how trust judgments are made, the role of trust in democratic societies and how to manage risks in the absence of trust. What is interesting about trust is the implicit asymmetry in levels of power and control. The process of trust implies the relinquishment of decision control to the trusted party, so it involves risk for the trusting party. Trust implies choice – to trust or not to trust. It also involves an expectation about a relationship, albeit often an impersonal one. For this reason, issues of competence and fairness are so important.

**Slovic, P (2000) *The Perception of Risk*. Earthscan, London and Sterling, VA**

Slovic has spent his life researching the various characteristics that impact the perception of risk. At the core of his work is the psychometric paradigm, developed with Fischhoff and Lichtenstein, as a means to study societal risk-taking. This concluded that there were three critical dimensions in this regard, namely: dread (i.e. risks that are potentially catastrophic, hard to prevent, inequitable and threatening to future generations), familiarity (i.e. observability, immediacy of consequences) and the number of people exposed to the risk.

**Rescher, N (2009) *Ignorance: On the Wider Implications of Deficient Knowledge*. University of Pittsburgh Press.**

This book sets out lucidly and comprehensively the many sources and facets of ignorance. It discusses our human cognitive limits in depth, but what I found most interesting was that the discussion on acquisition of knowledge in the abstract divorced from the values placed upon knowledge or the context in which knowledge is derived becomes inefficacious. There is an inbuilt assumption regarding the neutrality of knowledge, so "while our cognitive limitedness as finite beings is real enough *there are nevertheless no*

boundaries – no determinate limits – to the manifold of discoverable fact.” Ideally, this book should be read alongside Ravetz, J (1990) *The Merger of Knowledge with Power: essays in critical science*. Mansell, London & New York

## **Keishiro Hara**

**P. Raskin, F. Monks, T. Ribeiro, D. van Vuuren, and M. Zurek, “Global scenarios in historical perspective,” in *Ecosystems and Human Well-being: Scenarios Assessment*, Island Press, Washington, 2005.**

This reference describes and summarizes major global scenario studies in terms of the structure of scenarios, such as time horizon, regions covered and focused dimensions. The reference can be useful in understanding various frameworks and approaches which have been adopted to envision and develop plausible scenarios.

**T. Morioka, O. Saito, and H. Yabar, “The pathway to a sustainable industrial society – initiative of the Research Institute for Sustainability Science (RISS) at Osaka University,” *Sustainability Science*, Vol. 1 (1), pp.65-82, 2006.**

This literature describes essential components and innovative approaches involved in sustainability science. It also provides the typologies associated with scenario studies, based upon intensive reviews of representative scenario studies. It summarizes various international scenario studies in terms of five global challenges: climate change, depletion of energy resources, degradation of ecosystem services, overconsumption of non-renewable resources and decoupling of industrialization from environmental pressure.