Questions and/or answers

Comments on chapter 10 of Leydesdorff (2021). The evolutionary dynamics of discursive knowledge.

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10.1 Monism versus dualism

• My argument in this study has been that the exchanges of and interactions among expectations ... shape a cultural layer with a dynamic operating as a feedback on the (human) carriers of this cultural evolution.

(p. 196)

10.1.1 Descartes' error

• Before Descartes everything present-at-hand for itself was a "subject"; but now the "I" becomes the special subject, that with regard to which all the remaining things first determine themselves as such. ([at p. 82], p. 69f.) (197)

10.2 The secularization of Alter

- [T]he domain which transcends the individual becomes a *second contingency* in which human beings provide meanings to things and events. ... [O]ne provides meanings by *partaking* in the social (re)construction of meanings among humans. (198)
- In my opinion, this second contingency of expectations is *the proper domain of the social sciences and humanities*. (198)

10.3 Habermas' knowledge interests

• Luhmann proposed "meaning" as the basic concept of sociology, ... (200)

10.4 Meta-biology and reification

• For example, a predator observes its prey by distinguishing and identifying it. As against biology, however, a distinction that is identified in a discourse specifies only *an observational category*. The value of the observation has still to be determined empirically, for example, by measurement ...

10.5 Towards a calculus of redundancy

• Whereas psychological (action) systems are supported by their carrying bodies, the codes in inter-human communications provide additional stability by structuring the communications from above (at the supra-individual level). The codes refer to horizons of meaning. Beyond stabilization in history, globalization can operate as a selection mechanism in a regime of expectations. (203)

10.6 Consequences for evolutionary economics

- The *key question* then becomes: to what extent are the directions in which science advances inevitable, and to what extent can these be molded by conscious policy. (Arthur, p. 73; italics added, L) (204)
- Forty years after this conspicuous form of pedagogics, Boulding had a 'glimmering' of an answer: 'What evolves is something very much like knowledge.' (ibid.) (204)
- I have argued in this study that *the complexity of the communication* evolves, and not the bounded rationality in the *behavior* of firms or other agency (Alchian, 1950). (204)

A. What is the relation between information and meaning?

- The information that evolves, when we meta-represent, is information about *how we represent.* (20)
- In my opinion, scholarly practices are intellectually structured by codes emerging in the communications. The codes operate as selection mechanisms by spanning horizons of meaning as selection environments. (210)

B. What is the nature of social theory?

- Furthermore, this study contributes to the construction of a relation between social theory, on the one hand, and the specification of a measurement theory in terms of information, redundancy, and meaning, on the other. (213)
- However, I have argued throughout this study that on top of the manifest relations, a second contingency of possible relations and expectations can be envisaged. (213)
- Codes in the communication add one more selection mechanism and make globalization at the regime level possible. (71)

C. What is the form of discursive knowledge?

- An increase in the number of options above the sum of the options in subsets can be measured as redundancy, that is the number of not-yet-realized options. (212)
- In my opinion, the sciences are socially constructed as discursive systems of rationalized expectations. Rationalized expectations are attributes of a discourse, i.e., relations among people.(55)
- The rationalization requires specific codes, which operate as feedbacks selectively structuring and regulating the claims of novelty. (18)
- With the coding of the communications, the medium has changed into discursive knowledge. (150)