

THE CONTEXT

Merrelyn Emery (1993, 2018)

'The agenda for the Next Wave' details the convergence of the many problems which confront us, to the point where we have become aware that we face not simply an economic but also a cultural crisis; a crisis of western civilization involving a choice of design principle.

It traces and analyses western history, both ancient and modern in conceptual terms, specifying the choices we have made with their consequences as above. Our choices now are outlined and it is strongly argued that we must choose a coherent set which embody our humanity and our needs for an associative society if the west is to survive as a democratic culture or civilization.

If Fred saw that there was a sense of crisis in 1985, it is difficult to exaggerate the widespread perception of crisis that surrounds us today. It pervades seemingly every part of life from increasing levels of mental illness to huge levels of private and public debt to the corporate takeover of representative democracy to our almost total loss of genuine community to the effects of digital technology on our central nervous systems and ability to learn, and those of our young with its unknown long term implications for all.

The second paper documents 'ecological perception', one of the factors advocated in the Agenda paper. 'Educational Paradigms' elaborates this key element in the underlying rationale for the structures and processes advocated in the rest of the volume. The paper begins by examining the old paradigm, the assumptions and beliefs that for so long tied us to a mechanistic view of ourselves and defeated so many attempts at educational change. Experience has shown that while reform was only at the structural and processual level, it inevitably floundered. Only by moving the challenge to the more fundamental level of epistemology, our theories of how we learn and know, would we open the resistances and barriers to debate and hopefully change.

The basic challenges to the established paradigm entailed firstly separating the concept of object from that of the medium which conveys knowledge of it; or figure from ground. For example, radiant and reflected light are different media. Only reflected light conveys meaningful information to the human perceptual system. Secondly, Heider upped the challenge by hypothesizing that the environment was an orderly structure of information that we are adapted to directly know. Gibson confirmed the validity of this hypothesis by showing that we detect:

- the pattern and meaning of changes in the environment. From here the emphasis had to change from fragmented, discrete bit of sensory information, at best incomplete and unreliable, to direct, unmediated knowing, the product of a perceptual system. This system is attuned
- to the invariances or unchanging patterns evident in the constant flow of events and movement in the environment.

From this successful challenge to traditional assumptions has been derived a whole new epistemology or theory of how we know. We can see that we no longer need rely on a taxonomic hierarchy of things or abstract 'generic' concepts but 'serial genetic' concepts which are the product of continuously extracting meaning from perceived patterns. Both paradigms arrive at sophisticated theories of how the world works but those of the second paradigm are usually referred to as 'common sense' rather than scholarly knowledge. When used by the established academic elites 'common sense' conveys the devaluing of perception and the learning derived from it.

Emery goes from here to discuss with examples, the many changes this new paradigm will ultimately effect in our educational efforts. If we achieve meaningful, adaptive knowledge directly from perception, we are not reliant on mediators (teachers) and their extensive injections of abstracted knowledge. But if we are to pursue this line as part of the movement to revalue human potential and dignity, the move to a more democratic society, we need more practice in effectively using our perceptual system. The focus of the system changes from the transmission of information to educating perception.

This part of *Participative Design for Participative Democracy* argues the why of a new way, in detail. As spelt out elsewhere in this volume, it can be dangerous to try to practice something without understanding the reasons for and behind it. We have many examples of how that has gone badly off the tracks. History has also proven that it is insufficient to institute democratic organizational structures without an adequate level of epistemological change and understanding. Any quiet, educational democratic cultural revolution will flounder without this latter.

If we do not appreciate the reasons for the radical changes required, we will not change what is in our heads, or more accurately, attempt to come to grips with what our heads are into. This is a major rationale for participative approaches to change. Open systems methods of learning encompass both what our heads are into (a changing and uncertain environment) and how we must begin to use our perceptual system if we are to make the changes required. These two papers, therefore, detail the perspectives from both sides of the system/environment boundary.