

D. Chakalov. *Psychological Time Arrow: Anticipation and Synchronicity*. Talk delivered at a meeting of members of the Scientific and Medical Network, organized and hosted by Mrs. Claudia Nielsen, North London Group Coordinator, on Thursday, May 30, 2002, 8~10.30 PM.

Network, No. 79, August 2002, p. 34.

Abstract

We experience time as a constant flow of perceptions endowed with an arrow: we remember our past and can only anticipate our future. One way to deal with this peculiar introspection is to deny its reality and to model the brain as some computing machine (e.g., S. Hawking, *A Brief History of Time*, Bantam Books, 1988, pp. 163-164). Alternatively, we can explore the possibility that our subjective time arrow does have a physical basis, being a mental reflection (*qualia*) from some objective physical phenomenon providing an arrow of time in the human brain. Crucial to this idea is the notion of 'potential reality' in the human brain: a set of possible brain states which can be anticipated, hence allowing the brain to choose one of them to be its **next** state along the arrow of time. Possible implications for the phenomenon of synchronicity will be presented, with emphasis on its psychological mechanism operating in a "vertical" structure of the human psyche (self-consciousness, sub-consciousness, and unconsciousness). For more information, please see author's web site at <http://members.aon.at/chakalov> .

May 30, 2002

What is this talk all about?

The aim of this talk is to outline a broader framework for mind-brain relations, which would incorporate all empirical evidence which seems to support two incompatible viewpoints, materialistic (epiphenomenalism) and dualistic. I will employ the proposition due to Pauli and Jung about ONE reality being explicated in two complementary forms, matter and psyche¹, and will suggest a mechanism for their joint evolution along a hypothetical 'universal time arrow' (hereafter UTA) endowed with potential future and irreversible past, separated by an instant 'now'. The putative UTA will be constructed in such a way that it could match the psychological time arrow (hereafter PTA), under the assumption that the latter is a mental reflection (*qualia*) of the former. Hence we can conjecture about potential states of the **brain** along UTA, which have their mental reflection as potential mental states to choose from by a voluntary act of choice. We can choose one of these mental states along PTA to become our *next* state simply by 'imposing our will' on the corresponding potential state of the brain along UTA to be the mandatory future outcome of the brain processes. Hence the brain has no other choice but to take the path leading to its fixed future state, that same brain state whose mental reflection was anticipated and desired by us, and was chosen to be our goal. Figuratively speaking, if we picture the brain as a car, and the *potential* brain states as a steering wheel, then the human mind is the driver utilizing UTA/PTA mapping. It is important to stress that the potential states of the brain along UTA and their mental reflection along PTA do not permit any backward-in-time signalling or any causal pathologies, and can model effects such as anticipation and synchronicity, as well as Sheldrake's morphic resonance.²

¹ Atmanspracher H. and Primas H. (1997). The Hidden Side of Wolfgang Pauli. *Journal of Scientific Exploration* 11, 369-386; cf. Sec. VI, *Matter and Psyche as Two Aspects of One Reality*, p. 381.

² Sheldrake R. (1989). *The Presence of the Past. Morphic Resonance and the Habits of Nature*. New York: Vintage, p. 306: "Second, the assumption of the hypothesis of formative causation that morphic resonance takes place only from the past may be wrong. It may emanate from the future as well, or even instead."

Structure of the talk

1. Preliminaries.

1.1. Who I am: name, address, contact info.

1.2. What this talk is NOT.

It is not about defending a thesis but rather a presentation of a working theory, a 'map' which, if correctly constructed, could show us the way of enhancing human performance. Hence this 'map' is nothing more than a tool, and I will greatly appreciate all critical comments and suggestions.

2. Introducing potentialities

Why is our brain *not* a computer? Briefly, because our brain and mind operate with *potentialities* along UTA and its mental correlate PTA – a spectrum of possible states of affairs, one of which will happen if we chose it to happen, in which case the rest of potentialities will not "collapse" but will 'stay tuned' for possible actualisation in the future.

NB: We can physically see/observe/measure only the state of the brain in the past, and hence the potential brain states along UTA can not be seen/observed/measured with any inanimate device. We can only *feel* their mental correlates along PTA and experience them as being displayed as a spectrum of potentialities to choose from. Example of potentialities: consider a ball pen and name all possible usage of it, starting with 'writing' (very likely). All of them are simultaneously presented to the human self to choose one usage of the ball pen. Other examples are given in 2.1-2.5 below.

2.1. Platonic ideas as the source of knowledge and understanding: they don't change nor decay, and are doing their job in 5 billion human brains, say.

2.2. **No inertia of our thoughts**: they 'fly', change directions, stop, and accelerate like a UFO drive.

2.3. Extended 'now': CS theatre and the human self 'watching' the scene – two things kept together "at one time".

2.4. Non-computable functions: understanding logical paradoxes, not like a Buridan donkey. Example: Cretan paradox "all Cretans are liars". No need for a long and complicated proof like the one provided by Penrose, based on Goedel's theorems.

2.5. Human conscience as an omniscient statement evaluator: the mechanism which identifies what is 'good' or 'bad' is based on moral values.

Summary: (1.) The ontological status of brain potentialities along UTA is not that of fixed physical reality from classical physics. (2.) We feel our mental potentialities along PTA and operate with them simultaneously on two 'layers', speakable (=information) and UNSpeakable (=Platonic ideas). Examples for Platonic ideas: translating a saying from one language to another.

3. Implications to psychology: anticipation and synchronicity

Three-layer model due to D. Uznadze. The 'entry point' of anticipation, synchronicity, and Shel-drake's morphic resonance is the UNSpeakable layer of Platonic ideas. It is neither in the past nor in the future light cone, if we try to think of the Platonic realm in terms of Special Theory of Relativity. It belongs to the realm of potentialities and is a special kind of reality, *potential reality*. **I will not try here to explore the implications of the potential reality for quantum physics and quantum gravity**, and will refer the reader to a brief outline at my web site at <http://members.aon.at/chakalov/dimi.html> .



Dimi Chakalov <dchakalov@gmail.com>

Psychological Time Arrow: Anticipation and Synchronicity, 30 May 2002

Dimi Chakalov <dchakalov@gmail.com>

Wed, Aug 24, 2022 at 11:54 AM

To: Claudia <cn@claudianielsen.uk>

Dear Claudia,

I hope you are fine.

Twenty years ago, you invited me to speak at the meeting of members of the Scientific and Medical Network in London on 30 May 2002. One of the attendee was a man of my age or younger, who recorded my entire talk with his camcorder. He did not present himself nor asked for permission.

Do you happen to know him? Perhaps I can contact him and ask whether he keeps the video file from 30 March 2002. As I wrote on p. 2 in the expose (link below), "I will not try here to explore the implications of the potential reality for quantum physics and quantum gravity."

http://chakalov.net/May_30.pdf

But, as far as I can remember, I did mention some *very* important ideas, which are now proven experimentally:

<http://chakalov.net/text.pdf>

Would you be interested to watch my latest video presentation (see the link above)? I very much hope to include footage from my talk in your house on 30 May 2002, for the record. Recall the hypothesis by Max Planck from 1900 about light quanta: nobody paid any attention, until it was used by Albert Einstein to suggest the photoelectric effect in 1914. Likewise, I suggested a new force of Nature -- the fifth force (link above). But did I say anything about the physics of Life on 30 March 2002?

All the best,

Dimi