

AGPhil 10: Alternative Ansätze II

Time: Tuesday 16:30–18:00

Location: SPA SR22

AGPhil 10.1 Tue 16:30 SPA SR22

Beyond Quantum Gravity and Its GUT Extension: Problems Still Open in Comprehending Our World — ●CLAUS BIRKHOLZ — D-10117 Berlin, Seydelstr. 7

QG opens totally new horizons. Its group-theoretical approach is triggering the theoretician to reconsider his aged arguments having led into the current state of stagnation in fundamental physics. A "New Physics" is avoiding the short-cuts of the old one.

The current string models "beyond" the "standard" model are blamed to be "irrelevant" for physics. QG/GUT are shown to represent "string" models as well, but working ones, in accord with experiment. Their "exotic" force type is suspected to trigger the creation of black holes and, possibly, new organic structures.

The Copenhagen interpretation is corrected to respect irreducibility. Then, physics will be totally deterministic, with its "parallel-world" scenarios becoming mere fiction.

The crucial new challenge is to reconcile "motion" with a static, deterministic world. A key role might play the human notion of a "memory", which is unilaterally directed towards past events.

For more information on QG and GUT see www.q-grav.com.

AGPhil 10.2 Tue 17:00 SPA SR22

Physics of the Hilbert Book Model — ●HANS VAN LEUNEN — Heerbaan 6 Asten 5721LS Netherlands

The Hilbert Book Model is the name of a personal project of the author. The model is deduced from a foundation that is based on quantum logic and that is subsequently extended with trustworthy mathematical methods. What is known from conventional physics is used as a guideline, but the model is not based on the methodology of contemporary physics. In this way the model can reach deeper into the basement of physics. The ambition of the model is rather modest. It limits its scope to the lowest levels of the physical hierarchy. Thus fields

and elementary particles are treated in fair detail, but composites are treated marginally and only some aspects of cosmology are touched. Still the model dives into the origins of gravitation and inertia and explains the diversity of the elementary particles. It explains what photons are and introduces a lower level of physical objects and a new kind of ultra-high frequency waves that carry information about their emitters. It explains entanglement and the Pauli principle. Above all the HBM introduces a new way of looking at space and time. Where contemporary physics applies the spacetime model, the HBM treats space and progression as a paginated model.

AGPhil 10.3 Tue 17:30 SPA SR22

One interpretation for both Quantum Mechanics and General Relativity — ●EWOUD HALEWIJN — Voorburg, Netherlands

In reconciling General Relativity with Quantum Mechanics, it is challenging to resolve the combined mathematical equations and to find an interpretation that makes sense ontologically.

Such an interpretation has been developed by quantizing descriptive components in both the theories and other views. The resulting micro-components have been re-integrated within the scope of known gaps between science and *the real world*. The odd peculiarities in these theories have been made look *normal* by fully untraditionally answering fundamental questions.

The interpretation is suggesting that we define time as a discrete operator and its eigenvalues as constraints on space-time manifolds, in order to reconcile the mathematical equations. Outside the mathematical arena we suggest reconsidering the concepts of Black Holes, the Big Bang, the epistemological problem of perception in philosophy and the supposed clash between scientific and the spiritual worldviews.

It is concluded that developing one consistent ontological interpretation for both theories is possible. It is a weird story, but it is making powerful suggestions for reviewing some of our fundamental convictions.