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## The Antiphysical Review

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Founded and Edited by M. Apostol

32 (1999)

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ISSN 1453-4436

**Against and above  
the "Condensed Matter Physics"  
and  
the "Theoretical Physics"**

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What we measure are physical phenomena, what we understand are their mathematical representations; all this we call matter, or matter and fields, and their ultimate nature is the logical thinking on universal subjective perceptions, *i.e.* science; we also call all this our world, or our natural world; the possibility of these universal subjective perceptions, the possibility of the logical thinking and of the mathematical representations reside in themselves, and, consequently, they are nothing; something which does not derive from, or originates in anything else, is nothing; we use to say that science, and the world, originate in God, but God originates in what? science and the world are therefore identical with God, and they are nothing; they are precisely what we ourselves are, and we do not know this, and it is also impossible to be known further. In particular, matter, particles and fields, space and time, motion, the measurement principle, both quantal, statistical and relativist, are nothing. They are, however, structured by logical thinking; the logical thinking is absolute and unlimited, and, consequently, self-contradictory and, to the ultimate rigour, non-operative and self-blocking; thinking upon the nothingness can only be impossible, in the ultimate end; it could only be made possible by scientific conventions, *i.e.* clear and provisional statements whose consistency and consequences are to be analyzed; all the science is therefore an enormous hypothesis, whose consistency remains to be checked; and the science object is the study of its own limits.

This is why I shall analyze below two of the most used, and abused, and too frequently too fiery promoted, syntagma: "condensed matter physics" and "theoretical physics".

Matter being nothing, it does not therefore exist, as long as we can not say what it is; something which does not exist can not possibly be "condensed", and we could not possibly be doing "physics" about something which does not exist. We need a convention about employing this term, and this convention, by the very nature of any convention, must be reasonable in order to be acceptable; and also by its very nature such a convention must be limited, it could not possibly cover everything. The theory of gases could not possibly enter the "condensed matter physics" field, for instance, because the gases are dilute, not condensed; and the field must necessarily include the most dense and "condensed" bodies, which are nuclear and sub-nuclear matter, star matter and various plasmas; on the other hand, thermodynamics would not logically belong to this field, as it deals with temperature, and the "condensed" bodies occur naturally at low, and very low temperatures, and especially at zero temperature; the "condensed" bodies are said to be made of a large number

of particles, but how large? how many particles? nobody can say it exactly, and as long as we do not know what we are talking, we can not possibly be talking. Is the "condensed matter physics" "statistical physics" or "statistical mechanics"? If it is, none of them are something, and there would be a great confusion. And if we have distinct words for these fields they must be distinct to some extent; similarly for their relation with the "many-body, or many-particle, physics". Do the above fields include theory? if they do, why are they called "physics", or "statistics"? what else, beside theory, and to what extent, do they include? As long as we do not know all this, we must refrain to speak about them, because we would speak nothing.

Physics is an empirical science, *i.e.* it measures and understands what measures; as such, physics is necessarily theoretical, and since understanding is universal, the "theoretical physics" should be universal; anything universal is about everything and nothing, and again it can not say clearly and precisely what is it about; the "theoretical physics" is as such underdetermined in itself; something undetermined should not be talked about, because it is impossible to; it can not possibly be done. More appropriate in this respect would be the theory of this or that experiment, the theory of motion, or of mechanical motion, etc. The theory is always the theory of something about which we have data, *i.e.* about which we have empirical knowledge, and the sense and meaning of any theory is to organize these data, to delineate principles, to provide tools of talking about and understanding them, and, as an ultimate goal, to make us used with a new realm of empirical knowledge. That the "theoretical physics" does not know what it is, one can see by perusing what those who declare themselves "theorists" do; they do nuclear physics, field and particles, "mathematical physics" (the latter being something which is completely undefined, because it possesses no empirical data; "mathematical physics" is a sort of philosophizing with unknown tools about something unknown; it is an undefined state of spirit, rather than a profession, it does not answer problems, nor raise problems; when decent, it answers and poses exercises in known matters, and as such it brings nothing new; when out-of-place and improper, it claims to deal in matters which do not exist); and many others; theorists talk everything with everybody, and as such they can not possibly tell what they are and do, what they are experts in, what is their expertise field. Most of them recently deal even with setting up computers networks, advise and teach on how one can do one's own internet homepage, or particular formats (*e.g.* .html, .pdf) of electronic files, and teach on electronic "editing and authoring"; this is not physics, these are endeavours.

No one can decently say this is this or that field of scientific research or teaching, and for this reason one or other is not allowed in, because these fields are not at all distinctly determined, and such a sentence implies a confusion, and would mistake the fields for persons, and viceversa; to identify oneself with, and substitute oneself for a field of scientific research or teaching is illogical, and this would not be a clear statement; as such it can not possibly be accepted as a convention, because it produces confusion, and can not possibly be understood; and what is not understandable must be rejected, as dangerous for everybody; why such a non-sense would be dangerous even for that person who would profess it? simply, anyone who does not understand something will get confused for this reason, will lose the self-control, will not be free and will be unhappy; what one could properly say would be this or that person could not possibly be allowed formally in this or that socially organized field of research or teaching, since this or that person has not the desired qualifications.