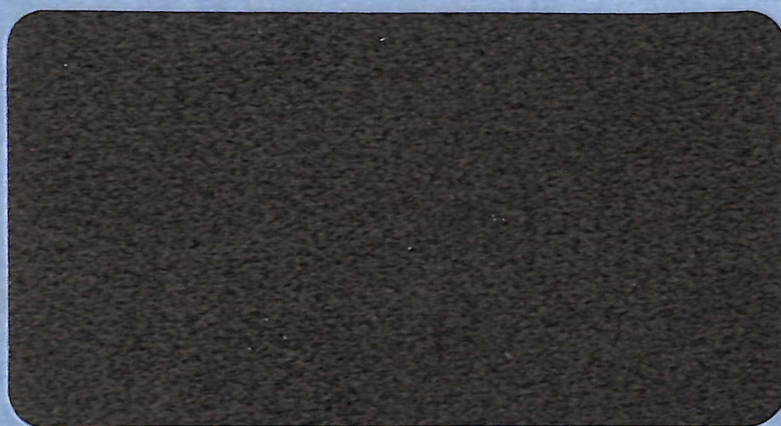




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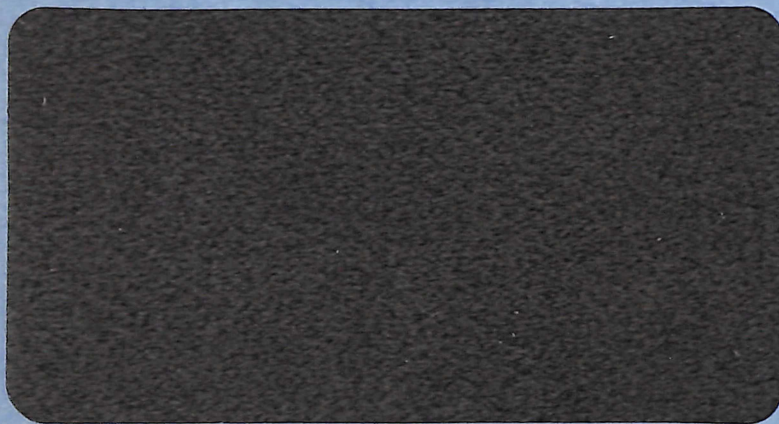
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AN ETERNAL UNIVERSE

by

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## ABSTRACT

We present a new generalized solution of Maxwell-Einstein equations (which are non-minimally coupled) which leads to some fascinating aspects of the Universe. The Cosmos has no singularity due to the coupling of longitudinal electromagnetism with space-time. It contains the Milne-Schucking cosmos as a limiting case. Our model contains a free parameter (the longitudinal electromagnetic field) which allows one to fix the density of highest compression of the Cosmos.

Alternatively the parameter allows one to adjust our cosmos to the presently observed Hubble constant and the deceleration parameter.

The model seems to be a viable candidate for our real cosmos as it allows one to extend the time scale of the Universe to arbitrarily large values i.e., it is able to provide the necessary time scale for the origin of life. We speculate that the entropy is finite but intelligence in the Universe may be infinite.