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Dark Matter and Energy as Antimatter WAYNE LUNDBERG, Architect of Comprehensive Theory — A new interpretation of dark matter observations via gravitational lensing through galaxy clusters is proposed. Gravitational lensing studies of SDSS J1004+4112 by Williams and Saha (astro-ph/0412445) indicate that any dark matter contribution to lensing is smoothly distributed in space. All particle theories (i.e WIMPs) which propose to explain dark matter inevitably yield gravitational clumping. Note that string theory requires that matter at radii, R, less than the Planck scale, $\sqrt{\alpha'}$, is equivalent to matter at distance $D = \alpha'/R$. The proposed interpretation involves antimatter existing within anti-deSitter spaces to explain the unexpected smoothness. This proposal asserts that a (non-Hawking) black hole exists with an AdS space at its singularity. Antimatter interactions also explain Galactic Annihilation Fountain(s) and similar observed phenomena. Non-temporal matter is thereby defined as matter which exists in 4-space, either advanced or retarded wrt the present. A 'radical' form of cosmology is then developed in which the curvature tensor of Einstein's general relativity is treated as complex. FRW cosmology plus dark matter and energy results. Theories regarding the black hole "end state" and Seiberg's chronology protection lend support to this approach. Previous work (http://www-astrotheory.fnal.gov/Conferences/cosmo02/poster/lundberg.pdfhttp://www-astrotheory.fnal.gov/Conferences/cosmo02/poster/lundberg.pdf) to establish the architecture of a comprehensive theory is thus modified.

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