General Relativity and Quantum Cosmology

Polarization Diffusion from Spacetime Uncertainty

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(Submitted on 25 Jan 2010)

A model of Lorentz invariant random fluctuations in photon polarization is presented. The effects are frequency dependent and affect the polarization of photons as they propagate through space. We test for this effect by confronting the model with the latest measurements of polarization of Cosmic Microwave Background (CMB) photons.

Comments:	4 pages, 1 figure
Subjects:	General Relativity and Quantum Cosmology (gr-qc);
	Cosmology and Extragalactic Astrophysics (astro-ph.CO); High
	Energy Physics - Theory (hep-th)
Report number:	Imperial/TP/10/LP/1
Cite as:	arXiv:1001.4545v1 [gr-qc]

Submission history

From: Lydia Philpott [view email] [v1] Mon, 25 Jan 2010 21:30:49 GMT (26kb,D)

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