

Quantum Gravity Gauge Field Theory

Thomas Lee Elifritz
The Archimedes Group
221 East Main Street
Marshall, Wisconsin 53559
elifritz@charter.net
(608) 345-8891

February 2, 2017

Abstract

The gravitational axion hypothesis previously proposed as *cosmic* QCD axions, or Peccei Quinn axions with additional low energy standard model couplings, is reduced to mathematics using a modern gauge field theory cast in the form of topological quantum field theory known from condensed matter physics. In order to maintain contact with discernible reality the principle components of such a theory will be a spin-2 boson called a graviton, and a spin-0 boson called the axion, along with standard model physics.