

‘Cosmological red-shift’ may be a Combination of: ‘gravitational red-shift’ and ‘Doppler-shift’

Hasmukh K. Tank

Indian Space Research Organization,

22/693 Krishna Dham-2, Ahmedabad-380015 India

E-mail: tank.hasmukh@rediffmail.com

Date: 10th April, 2015

Abstract:

It is proposed here that: Just as, a photon, while experiencing the ‘gravitational red-shift’, does not lose its velocity, and chooses to lose its energy, in the form of frequency, so exactly, the photons emitted from the luminous bodies, like the receding galaxies, may be partly losing their energy due to ‘gravitational red-shift’; depending upon the ‘cosmic-gravitational-potential’ of a given galaxy. The ‘cosmological red-shift’ may be a combination of ‘gravitational red-shift’ and ‘Doppler-shift’. Thus ‘cosmological red-shift’ may not be wholly representing the ‘recessional-velocity’ of a galaxy. The recessional-velocity may be much lesser than it is currently believed.