1086-28-24 **Phanuel A Mariano\*** (phanu9000@sbcglobal.net), 120 Whitewood rd, Waterbury, CT 06708.

On the Coarse Geometry of L<sup>p</sup>: A Coarse Equivalence.

In recent years, coarse geometry has been on the spotlight because it was found to be useful in the progress of the Baum-Connes and Novikov conjectures. Coarse geometry deals with the large scale structure of a space as opposed to its small scale structure. This talk specifically studies the concept of a coarse equivalence of spaces regularly encountered in real analysis. We prove the existence of a non-separable space that is coarse equivalent to the separable space  $L^1([a,b],m)$ . (Received July 25, 2012)