Proposed Composite Location ID Code Needed for Asset management of Electric Distribution Networks

Ahmad M. Alkandari, Bader A Alkandari
College of technological Studies, PAAET, Kuwait
{alkandari1,alkandarib}@yahoo.com

Ayman Ahmad Sami[1], Ahmed Sami[2]
[1] Senior GIS Analyst Engineer, Openware
[2] Egyptian Electric Utility Regulatory Agency

Abstract— The absence of as built GIS map for low voltage (LV) electric network due to a very limited freeze period compared with the case of medium voltage (MV) electric network ,accordingly the location ID needed for asset management cannot be expressed purely spatial but the LV network topology should be incorporated with the spatial location ID of the related topologically MV network. As the LV network topology has a standard data model and generic naming conventions, accordingly the needed topological code can be created directly for each LV network elements and then the composite location ID can be identified simply for each element of electric network. The proposed approach is illustrated via selected case study.

***Index Terms*: LV network (end user network), spatial, topological parent and sons link, naming conventions, asset management, location ID**

IRJECE