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Revival of hauz khas lake of Delhi India -An approach to water resource management in urban environment

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Time is playing out a requiement for urban lakes. The process of city building can also be called as the process of urbanization of the watershed. Growing urban impediments, diversion and drainage of storm waters and the use of natural storm water channels for sewage disposal, reclamation for other purposes, polluting human activity on the shoreline, are the changing catchments characteristics responsible for the decline of urban water bodies. Sustenance of urban lakes is an essential component of urban environmental plans in order to augment raw water availability and nourish depleted aquifers. Furthermore, there is a need to recycle urban wastewaters to curtail environmental stress caused by dumping 'waste' into natural eco-systems. Lastly, the humanizing effects of natural environments amongst the stressful psychological effects of the urban jungle are just beginning to be appreciated. These thrust areas are now finding expression in a pioneering project to revive the historic Hauz Khas Lake in the heart of South Delhi. The 700-year-old Lake, developed by the Khalji Sultans, was fed by trapping the storm water generated in the Southern Ridge in an embankment from where it was diverted to the Hauz. It was last seen full after the floods of 1958. With availability of potable water from distant rivers and by taps to households the Hauz fell into a state of disuse and storm waters were diverted and no longer find their way here. Any attempt to fill the Hauz with storm waters, as in the past, is fraught with the danger of transporting polluted water flowing in the storm water channels into the Hauz. Furthermore, given the shallow depth of the Hauz, its limited storage capacity, 80% rainfall being limited to three months monsoon season, and mainly because of the porous strata, the Hauz is estimated to dry out as a result of seepage and evaporation losses within a month of its being full if not regularly replenished to neutralize

the losses. It may also be appreciated that most urban lakes in India are not natural features but artificial constructs resulting from the damming or diversion of a natural watercourse. Over a period of time they become a part of the local ecotype. Here, attention is drawn to the fact that every lake presents certain unique features originating from its catchments and bio-geographical region. Hauz Khas, thus, is a case where no comparison is possible with pre-management era as the lakebed was dry for over 4 decades.