Journal of Basic and Applied Engineering Research

p-ISSN: 2350-0077; e-ISSN: 2350-0255; Volume 3, Issue 11; July-September, 2016, pp. 977-980

© Krishi Sanskriti Publications

http://www.krishisanskriti.org/Publication.html

Asset Management Plan for the City of Hyderabad– Study of Open Spaces in Greater Hyderabad Municipal Corporation Area

A. Jalender Reddy¹ and D. Vijay Kishore²

¹Dist. Town & Country Planning Officer, R.R.Dist, MA-Economics, M.U.R.P. ²Architecture, SPA Hyd, Ph.D., M.U.P.

Abstract—Over the decades of urbanization remarkable advancements and developments have been made in the field of the Municipal Asset Management or Infrastructure Asset Management. However, there is a significant demand to extend the scope and capacities of these Assets in order to ease their management and to have sustainability in the development of these infrastructure. The present paper outlines the global scenario of Infrastructure Asset Management in the states and current practices of Hyderabad city. Upon a brief research it was observed that the foreign states were adopting individual Asset Management Plans for all the categorized Assets. The main objective of this paper is to present the importance of a specific asset management plan for the parks and open spaces in the urban areas. Unlike the global scenario, many cities in India do not have an individual Asset Management Plan for the maintenance of Parks and Open spaces. Indian cities only has a single complex Asset Management Plan which covers all the assets at a broader scale. Having an Asset management plan at a micro level not only eases the planning of the asset but also helps in its acquiring, management, revitalization and many more. A comparative study of Hyderabad City with the foreign states have been done to show the deficit of Parks and Open spaces Asset management.

Index Terms: Municipal Asset Management, Infrastructure Asset Management, Asset Life Cycle, parks and open spaces, Urban Area, Hyderabad.

1. INTRODUCTION

Municipal Asset management is also known as Infrastructure Asset Management which generally deals with integrated, multi-disciplinary set of strategies in sustaining public infrastructure assets. Public Infrastructure Assets and facilities usually includes Water Treatment Facilities, Sewer Lines, Roads, Utility Grids, Bridges, Railways, Ports, Parks, Public Spaces, Solid Waste, Telecommunications, Mass Transit, State Schools, Public Housing, Hospitals, etc. Generally, the process focuses on the Asset maintenance, rehabilitation, and replacement of the assets. The process focuses on maintenance, rehabilitation, and replacement.

International Organization for Standardization (ISO 55000), defined Asset management as the "Systematic and coordinated

activities and practices through which an organization optimally and sustainably manages its assets and asset systems, their associated performance, risks and expenditures over their life cycles for the purpose of achieving its organizational strategic plan" (iAM, 2008).

Asset Management plays a crucial role in helping organizations to reduce the capital costs, total costs of installing and operating their assets, to improve the operating performance (i.e., reduce failure rates, increase availability, etc.), to reduce the potential health impacts and safety risks of operating the assets, in minimizing the environmental impacts, in Maintaining and improving the reputation and regulatory performance of the organization, Reduce legal risks associated with operating assets.

2. INFRASTRUCTURE ASSET LIFE CYCLE:

Institute of Asset Management (IAM) United Kingdom classified Infrastructure Asset Life Cycle into 4 categories. "Acquiring" an asset covers a whole set of information on its planning, designing and procuring. Proper understanding of these activities decides whether the asset fits appropriately in to the purpose or not. "Commission" usually takes care of the activities like installing, creating or building the asset and conforming its functionality. It has been observed that the incidences of failure after its installation are higher. It is directly bounce back to the need of commissioning stage in the life cycle to look over the initial operation of the assets. "Operating" an asset during its functional life cycle. During an asset's operating phase it should be monitoring, maintenance, refurbishment and potential upgrade to meet any change in condition or operational requirement. For many assets, operating phase will be decades long. It can even be centuries. Usually engineers are most familiar with phase. "Disposing" phase is the most overlooked phase. As discussed above, assets can last beyond a human lifetime and so it will be difficult to plan and consider its disposal when it is so far into the future. Asset Management teaches us that we ignore any stage of the asset life cycle at our peril.

3. GLOBAL SCENARIO OF INFRASTRUCTURE ASSET MANAGEMENT PLAN

To understand the global scenario pertaining to infrastructure Asset Management Plans, City of Norwood (Massachusetts, USA), City of Knox (Australia), Falkirk Council (Scotland, UK), and South Africa (Africa) were studied. The observations from these case studies were as follows:

City of Norwood, Massachusetts

The City council of Norwood develops four Major asset management plans, which set out how the Council intends to manage its key assets development and management. The four asset Management plans are:

- 1. Buildings Asset Management Plan proposes the strategies for the development, management and maintenance of the city's buildings. The plan reviews the lifecycle requirements of infrastructure for the effective management, inspection and replacement. It also talks about the financial status and its projected forecasts of expenditures for a span of 15 year.
- Civil Infrastructure Asset Management Plan sets the strategies for the management of transportation network along with water tables and its maintenance. It also talks about the financial status and its projected forecasts of expenditures for a span of 20 year.
- 3. Stormwater Asset Management Plan sets the strategies for stormwater drainage network's maintenance, management and its development for a span of 20 years. The plan involves new works to enhance the existing drainage network and outlines the lifecycle requirements for the effective management and replacement.
- 4. Recreation and Open Space Asset Management Plan outlines city's recreation and open space assets. These assets include park furniture, tennis courts, playgrounds, irrigation infrastructure and other elements including artworks, monuments and plaques, bins, barbeques, bike racks and flagpoles.

City of Knox, Australia

Within the city of Knox, various strategic plans where planned and implemented periodically. Of these plans, the city includes the Asset Management Plans for Bridges, Buildings, Carpark, Drainage, Footpath and Shared Path, Open Space, Playground, Road Asset and Strategic Asset Management Plan.

Falkirk Council (Scotland, UK)

By adopting a motto of," Better Assets, Better Services" the council intended to improve the effective management of assets in maintaining and enhancing the council assets. To achieve this the council classified the assets into 6 types and strategies were given accordingly.

The six assets for which the council maintains the asset management plans were, Property, Open Space, Roads Infrastructure, Housing, Fleet and ICT.

Republic of South Africa, Africa

Comprehensive Municipal Infrastructure Plan (CMIP) of South Africa gives a Capital Works Programme for new works, upgrading and renewals of assets along with their maintenance strategies, risks and priorities, existing budgets, financial allocations, and tariff implications now and into the upcoming future, and the republic worked on the improvement of management practices.

Comprehensive Municipal Infrastructure Plan includes the planning of Roads and Stormwater, Water, Sanitation, Waste Disposal, Electricity, Community Facilities and Municipal Buildings Infrastructure Asset Municipal plan (IAMP).

Community Facilities includes the Parks, Recreation and open spaces as sub categories in detail.

From all the case studies it is observed that most of the foreign cities are adopting various asset Management plans for classified Assets individually instead of one complex Asset Management Plan which talks about all the Assets in a single Management Plan.

Not only Classified Asset Management Plans, it is also observed that at the Global Scale, Parks and Open Spaces were given a greater importance and an individual infrastructure Asset Municipal plan (IAMP) was given in all the case studies for the parks and open spaces. This shows the significance of parks and open spaces with in the city.

4. LOCAL SCENARIO:

Hyderabad, Andhra Pradesh

Before the division of State, till the year 2008 it is observed that the important functions of Urban Local Body (ULB) for the good service delivery to its people were the Creation, management and maintenance of amenities and other assets. The purpose of Asset Management plan is to help organizations utilize and effectively manage the assets. The 124 ULBs in Andhra Pradesh controls the Lands, Buildings, Roads, Bridges, Plant and Equipment worth several crores, whether funded through internal revenue, Central or State Government grants or borrowings, held for the common good. The 74th Constitutional amendment brought pressure on revenue budgets to fund capital infrastructure investment and the municipal functionaries are under pressure to improve the infrastructure facilities. Good asset management can also help the ULB in the achievement of sustainable development, which is part of its obligatory functions.

Asset Classification and Compilation

Andhra Pradesh Municipal Asset Management Manual dated 2008 broadly classified Assets into two sub categories of

"Movable Assets" and "Immovable Assets". Register of Tools and Plant contains all the particulars on Movable Assets and the Register for Immovable Properties contains particulars of all the immovable assets owned and held by the municipalities. The municipalities are supposed to maintain separate registers for each item as per the "ANDHRA PRADESH MUNICIPALITIES ACT, 1965".

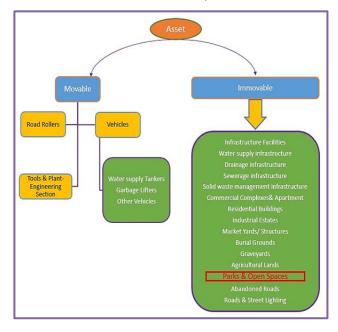


Fig. 1: Asset classification in terms of movable/immovable (Source: Andhra Pradesh Municipal Asset Management Manual, 2008)

Unlike the Global Scenario, it is observed that there is no particular Asset Management Plan for the development and maintenance of Parks, open spaces and recreational centers or for the Open spaces as such. Not only in the case of Hyderabad city but the same situation is observed in almost all the Indian cities.

Inventories

In order to make a list of all the assets owned/held by a municipality, it is important to know the details of the various assets as well as the responsible sections for the creation, recording, maintenance and their preservation.

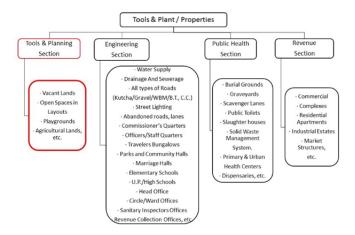


Fig. 2: Section wise Asset classification, Tool & Plant Properties.
(Source: Andhra Pradesh Municipal Asset
Management Manual, 2008)

5. CONCLUSION

Unlike the global scenario, many cities in India do not have an individual Asset Management Plan for the development and maintenance of Parks and Open spaces. It also highlights that the state of Telangana has only one consolidated Asset Management plan which contains the information of all the assets in general. Not only the states of Telangana and Andhra Pradesh most of the Indian cities has only has a single complex Asset Management Plan which covers all the assets at a boarder scaled. It shows a huge gap in database which is supposed to be addressed and huge scope of equal magnitude to develop individual Asset Management plans. Having an Asset management plan at a micro level not only eases the planning of the asset but also helps in its acquiring, protecting from encroachments, development for optimum utilization, management, revitalization and many more. A comparative study of Hyderabad City with the foreign states have been done to show the deficit of Parks and Open space Asset management.

REFERENCES

- [1] (2008). Retrieved from IAM, The Institute of Asset Management, the professional body for whole life management of physical assets: https://theiam.org/knowledge
- [2] Davis, R. (2008). An Introduction to Asset Management. Chester: blah d blah design ltd.
- [3] Plans & Strategies. (2015). Retrieved from your knox online: http://www.knox.vic.gov.au/plans
- [4] Sagar, M. V. (2008). Andhra Pradesh Municipal Asset Management Manual. Hyderabad, Andhra Pradesh: Centre for Good Governance (CGG).
- [5] (2010). Public Open Space Strategy. Christchurch City: Christchurch City Council.

	Global Scenario				Local Scenario
Category	USA	Africa	UK	Australia	Hyderabad
Open Space Asset Management Plan	✓	✓	✓	✓	×
Organizational Set up For the Parks & Open spaces		√	√	√	×
Organizational body to take care of Parks & Open spaces		✓	✓	✓	×
Frequent Updating of Status on Parks & open Spaces		√	✓	✓	×
Regulatory Provisions for Parks and Open Spaces	✓	√	✓	✓	✓

^[1] Asset Management Plans. (2015, january). Retrieved from City of Norwood Pynehum & St Peters:

^[2] http://www.npsp.sa.gov.au/about_council/strategic_planning/ass et_management_plans