CONSERVATION & MANAGEMENT OF HISTORIC BUILDINGS-

Lund University (Housing Development & Management) Swedish International Development Cooperation Agency (SIDA)



PROJECT: RESTORATION, UPGARADING & MAITANANCE PLAN FOR LAMU MUSEUM

FINAL REPORT – march 2010

Compiled &Presented by; Alex K. Jimbi – Conservation Officer & Architect, Lamu World Heritage & Conservation Department-Kenya

Acknowledgement

I wish to thanks to all those who have contributed to the success of work carried out during this mission of Advanced Training Program- Conservation and Management of Historic Buildings, Department of Housing Development and Management, Lund University Sweden.

Also special thanks are dedicated to Dr. Kerstin Barup, Dr. Matts Edstrom, Eric Johansson and Ms. Marwa Dabaieh for their professional support, upright decisions and inspiration.

But also I wish to send a message of thanks, respect and cooperation to the other professionals and the entire team with their contributions in the field of Conservation, Chemistry, Engineering and planning.

TABLE OF CONTENTS

1. INTRODUCTION

- a) Abstract
- b) General information of Lamu museum
- c) Site & Building description
- d) Values of the site
- e) History of Lamu museum

2. TECHNICAL ANALYSIS OF LAMU MUSEUM

- a) Walls & elevations
- b) Roofs , floors & stairs
- c) Floor slab drainage
- d) finishing's
- e) electricity
- f) Surrounding site

3. S.W.O.T ANALYSIS

- a) Strengths
- b) Weaknesses
- c) Opportunities
- d) Threats

4. PROJECT PROPOSAL & EXECUTION

- 1. Exterior restoration of facades
- 2. Interior plaster & wall decorations
- 3. Replacement of new roof
- 4. Replacement of wooden ceiling supports
- 5. sealing of cracks & plaster work
- 6. Electrical works
- 7. Rectification of drain system
- 8. Landscaping of surrounding site

5. STRATIGIES FOR FUTURE USE OF THE BUILDING

6. MAINTANACE PLAN

7. RESULTS & CONCLUSION

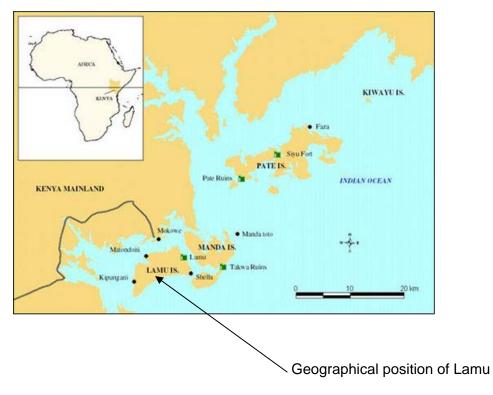
1. Abstract

The history of Lamu archipelago is the history of Indian Ocean trade market, which brought multiples of influences across all continents. Because of the port, Lamu town remained a significant trading entry port until the late 20th century.

Lamu town is one of the oldest historic towns in Kenya and East coast and at the same time it still retains most of its fabric impressive traditional houses but also the culture of its people who are predominantly Muslims.

The town has survived into the 20th century due to several fortunate circumstances and the isolation of the area and inadequate infrastructure facilities in the island has prevented many irreversible changes associated with modernization.

Lamu has either been transformed by uncontrolled developments or abandoned as a result of economic decline as many other historic cities around the globe.



a) General information about Lamu museum

Lamu museum is one of the few outstanding buildings and its architectural significance lies in the 1st grade of verandah houses. The house has architectural elements which merit special attention for the contribution and character of the town.

Lamu museum is located in the seaside at the new dhow harbors of Lamu old town. The building was singled out as one of the best preserved structures in a detailed but incomplete 1975 inventory of historic buildings.

The structure was built in 1893 present's example of Arabs and European influence verandah architecture as you enters the town of Lamu.

The Lamu museum ownership currently rests with the National Museums of Kenya which has full possession of the entire plot and is responsible for its maintenance and protection under the Antiquities and monuments Act Laws of Kenya. However, before the National museums of Kenya acquired and guzzeted the building in 1971 very important individuals in the history of Lamu and beyond lived in this house.

Lamu museum derives its mandate through the Act of parliament which provide for the management and development of the museum and its connected purposes.

The building houses offices for the Curator, Accounts department, storage exhibition lounge which displays Swahili artifacts.

b) Site & building description

The site constitute of different components that include the house, an open space with garden in front of it with two cannons. The northern side of the museum is a mosque and madrasa on the southern side is a catholic church. The house has advantage of the two main streets that is the seafront promenade which boarders the sea wall and the usita wa mui or bazaar street to the east.



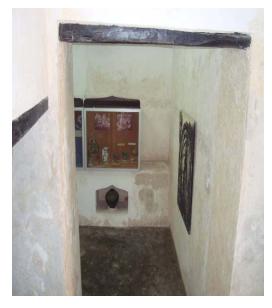
Approaching lamu museum from the jetty



The Lamu museum from the seafront



has coral wall approximate 500mm thick bonded in lime Mortar mix.

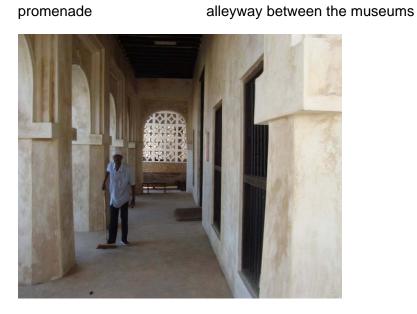


The wooden lintel above opening





Surrounding buildings along the sea



Verandah with pillars & archways



Ethnographic displays



Illustrations of Interior wall decorations

c) Values of the site

- Historical value: Lamu museum site is unique in Lamu in that it has a long history which can be documented back over 117 years .it housed most of the 19th century explorers and early colonial administrators who passed through Lamu.
- 2) Social value: the site has a landmark for different group of people.
- 3) Architectural value: Lamu museum has intrinsic values for instance the combination of traditional Swahili and the Arab architectural styles.
- Economic value; presently the site is a tourist venue, Arab artifacts and Swahili culture is exhibited. Also the size of the house plus its environ presents potential for revenue regenerating activities.
- 5) Use value; the fact that different groups people are using some parts of the building gives it a use value.

e) History & location

Lamu Museum is the second largest building in Lamu old town, second to the Lamu Fort. It has two- storey trapezoidal plan measuring 37.5 meters in length by 17.5 meters in width.

Lamu Museum building, which was originally owned by a man known as Abdallah bin Said al- Busaidy, was completed in 1892. It exemplifies the finest characteristics of veranda building style of the 19th century on the seafront, which is a radical departure from traditional stone houses of the earlier period.

The veranda is a unique freestanding stone arcade on the ground floor tied to the main structure with wooden beams. Its upper level has carved a teak of columns and railings. At the centre of the building handsome ogee arches surround a grand covered courtyard.

While the exterior walls have large windows with ogee niches too, all ground floor exterior doors have superbly carved frames and centre posts and the main door is further embellished with brass studs carved by the legendary Lamu woodcarver Mohammed Kijumwa. The first floor has a number of galleries that today exhibit various aspects of

Swahili social life. These galleries include; the Siwa gallery, the Whitton gallery, the Bonni, Pokomo and Orma galleries, the Maulidi gallery and the Maritime gallery.

Today, the Lamu Museum houses the first Ethnographic Collection including the second century, rich collections of material culture of the Swahili (especially jewellery and woodwork collections), the traditional Swahili Siwa and the recently installed Swahili bridal display.

Technical analysis of the building

Lamu museum is one of the buildings built to last, but like many old buildings everywhere they must be inhabited and periodical maintained if they are to remain in good condition.

Observations made on the structure were as follows:-

1) Walls and elevations:-

Despite the massive thickness of the walls some traces of water infiltration and environmental factors such as weather has posed serious threats to both the interior and exterior finish of the structure.

It is also notable that wind and rain splashing against the walls erode plaster surfaces.

Improper applied plaster hastened the deterioration and eventual plaster has crumbled off leaving masonry core walls exposed.



Cracks on wall surface.



Deteriorated plaster work

2) Roofs, floors & stairs:-

Most of the hardwood beams are still intact on the first floor however at the second floor most of the beams are affected and decayed as a result of inadequate slope and cracked plaster finish of the roof where water permeate and seeps into the masonry creating dump conditions at the end of wooden joists.

Roofing sheets covering the wooden balcony at first and second floor were rusted due to the harsh climate from the sea.



Moisture surfaces under stairs. Rotten wooden ceiling joists.



Corroded iron sheets and rafters attacked by termites and humid. 3) <u>Floor slab drainage</u> Poor drainage had also affected the floors and stained the walls due to dampness infiltrating into the building at floor slab level. Also rainwater pipes and spouts were missing in some places.



Stained walls due to infiltration.



Cracks on the second floor slab.

4) finishing's:-

In general the structural components of the entire building are not badly damaged; however both the interior and exterior plaster work has deteriorated due to age and also environmental conditions leaving the core walls exposed.



Deteriorated plaster work on the exterior walls

5) Electricity

The electricity facilities and ducts are exposed in a disordered manner. Some of the cables are hanging loose on the wall surfaces.

There is no sufficient lighting system in the entire building, making some of the unventilated exhibition spaces humid and dark even during the day.



Control load unit centre

6) <u>Surrounding site</u>

The surrounding site is unkempt with offensive dirty materials and also on one side there is a blocked open drain which has poor slope thus causing unnecessary blockage and stagnation of grey water on the pavement.

The front garden requires some leveling and landscaping has to be upgraded, also the main entrance to the museum building has to be raised and paved with cabro blocks.





S.W.O.T Analysis

STRENGHTS

- Prime location on Lamu Island and focal point of Lamu Stone Town
- important tourist attraction on the Island
- Unique heritage site depicting the mixed cultural history of East Coast.
- No competition in the island
- International interest and a world heritage site
- Community support.

WEAKNESSES

- Inadequate site interpretation
- Non availability of conservation materials.
- Poor environmental conditions of the collections.

OPPORTUNITIES

- Underexploited assets
- Improved appreciation of the heritage of Lamu and its history by the community and thus increased number of visitors.
- Highly committed and motivated staff.

THREATS

- Decline in tourism sector
- Over depending on foreign tourists.

Project Proposal

The first priority taken was to stop further deterioration of the building and instill preservation and maintenance plan to avoid damage to the original fabric.

Categories of contractors.

- 1. Building technicians.
 - To check structural stability of the house.
- 2. Local masons and artisans.
 - To carryout the rehabilitation works.
- 3. Carpenters.
 - Construction of ceiling and roof work.
 - Finishing and restoration of woodwork.
 - Fixing of frames and furniture.
- 4. Electricians.
 - Installation of electricity and lighting.
- 5. Plumber.
 - Installation of sanitary equipments.
- 6. Painter.
 - Wall finishing and restoration of plaster and painting.

The execution of the rehabilitation work was done as follows;-

1. Exterior restoration of facades

The construction materials of the museum (coral, lime) plaster which had deteriorated over time was hacked off and comprehensive work done by replacing new plaster and finished smooth with white cement.

2. Interior plaster and decorations

The interior plaster was peeling off as a result of poor workmanship and use of inappropriate plaster ratio was completely removed and new plaster of lime and white cement replaced.

The interior wall deco at the entrance was sealed of minor cracks.

3. Replacement of new roof.

The entire roof covering balcony at first floor was leaking and also the timber supports had been affected by termites and suffered effects of dry rot due to alternate periods of wet and dryness.

All roofing sheets and wooden rafters were replaced and treated with wood preservatives.

4. Replace wooden ceiling supports.

All affected and decayed ceiling joists had to be replaced with sawn and treated wooden joists.

5. Open drain system.

The drain had not properly been constructed and at some points it was blocked leading to spilling of dirty waste water on the pavement.

The drain was cleaned and reconstructed; also its slope was adjusted for easy flow of grey water and rain water collected by rain gutters from the roof.

6. Plaster and crack repairs.

Minor cracks were noticed on the floors and walls during the inspections. most of them had resulted from lack of periodic maintenance.

Minor cracks on the wall surface were stitched and replastered with a mix of lime and white cement.

The floor cracks was scraped off completely and replaced with new cement sand screed.

7. Ground floor verandah repairs.

The entire plaster work had deteriorated giving the entrance hall ugly face it was recommended that the peeled off plaster be replaced with white cement and lime mix plaster which gives better life to the inner core of the walls and also prevent seepage of water through the walls.

8. Electrical works.

Most of the electrical works had not been properly done initial. It was decided to redo the entire electrical conduit and all overhanging cables embedded inside the walls.

9. Surrounding site.

Initial the entire surrounding was unkempt with the garden also not properly landscaped. The overgrown trees and grass was dressed and new lights installed. the pavements were also cleaned and repaved .

Development strategies for future use of the building.

The general objective of the development plan for the lamu museum is to improve the interpretation of the mixed history of the Heritage site as the core example for the entire East African Coast.

The building has large space which can accommodate more than one activity.

Ground floor and second floor space.

The current space immediately right of the entrance hall will be refurbished and furnished to accommodate visitors' centre, since this area is easily accessible.

The visitors centre will also contain the following:

- a) Orientation to the Lamu old town conservation and other historical sites within the Island.
- b) Introduction "gateway" concept to Lamu world heritage site which will be facilitated by means of brochures and video max 5min.
- c) Existing museum shop and ticket booth will be improved and also sale lamu publications and products made by lamu craftsmen e.g. leather sandals and others.
- d) This will also be an entry and starting point for cultural/historical walks in the old town.
- e) The existing toilets at this level will be improved with toilet facilities.

f) This space will also provide a space for site interpretation giving a brief overview of the Lamu history and the prosperous settlement along the East African Coast and trade with overseas countries, the first hostile environment for Arabs and Portuguese. This will be achieved by use of leaflets and panels on the walls.

Also general interpretation of the issues common in different historical periods of Arabs and Portuguese, the significance of the sea, harbor in relation to the old town.

This will be achieved by means of graphic panels, whereby different graphic symbols will be used to distinguish between different occupations.

First floor space

Presently the first floor space is used for storage and display of museum collections and Swahili culture, a few Arab and Portuguese artifacts.

However, there is congestion and perhaps some of these artifacts can be accommodated in the second floor since the main office operations are housed in the old fort museum.

At one time there was a Chinese wreck in the area referred as "SHANGA' and now that the Chinese government is willing to carryout some marine excavation, it is viable to have a lounge and storage within the museum to display these artifacts and remains from the ship wreck.

Since there is more space in this floor things will be reorganized and perhaps interior designs are put in place and fittings and fixtures of wooden shelves designed for this purpose.

Computers are also some of mandatory equipments that should be made available for collection data base and related documentations work. Such inputs will enhance easy retrieve of in formation by visitors, scholars, researchers, collection managers and also promote the culture of Lamu to its local people.

MAINTANACE PLAN

As an organization the Lamu museum is also included in the state corporation Act of 1987 revised which gives the Museums some certain degree of autonomy from the civil service.

The museum's main functions and responsibilities are defined under the National museums Act (1983) and the Antiquities and Monuments Act (1983) respectively. Apart from the range of activities and collections, at both the central and regional museums, the the central museum is also responsible for preservation of various museums all round the country which are considered to be national significance.

Lamu museum being one of the renowned institutions in the country , the National museum of Kenya falls under the portfolio of Ministry of Home Affairs, National Heritage ,Culture and Social Services.

One of the core activities of the ministry is to allocate yearly grant for the preservation and maintenance of the museum buildings.

The National museums of Kenya also gets donor fund but in the recent years it has reduced the size of budget deficit which is regarded as constraint development.

As a part of the revamping exercise the museums have embarked on series of programs to try to increase the level of internally generated revenues with a view of being self reliant in preserving and restoration of the museum buildings.

All the museums country wide receive a grant for maintenance which is determined by the size and activities taking place.

Prior to receive the grant for maintenance ,a technical team comprising of Architect , Building technician , Conservation Officer and also employed is a permanent mason who has fully knowledge of the stone and lime construction has to prepare to inspect and identify all the problems for maintainace.

RESULTS AND CONCLUSION

To establish proper management system

The Lamu museum in collaboration with other departments within the region should clarify who will be directly responsible for the regular maintenance and conservation of the museum.

It is viable to have in place a management committee who will be responsible in coordination and assist in the development strategy.

This committee should comprise representatives from the Lamu community besides the manager of Lamu world heritage site, conservation office ,archeology/ collections department and an Exhibition Officer.

A technical committee comprising of Architect, construction technician and craftsman will be set to conduct periodic inspections in order to maintain the status of the interventions and solutions applied during the whole process of restoration.