

## Session – I

# **Deterioration of Monuments and their Preservation**

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## **INTRODUCTION**

- ❖ India is known for its rich, diversified, cultural properties
- ❖ Monuments – World heritage sites, National monuments, State monuments
- ❖ UNESCO, ICOMOS, ICCROM, ICOM etc.
- ❖ Tamil Nadu is famous for temples, historical monuments, artistic sculptures, antique properties
- ❖ Increased Vandalism and destruction of monuments due to urbanization, implementation of development projects
- ❖ Need for conservation for benefit of posterity

## **Central Act**

- ❖ Central Government enacted the Ancient Monuments and Archaeological Sites and Remains Act, 1958 (24/1958)
- ❖ Manual of the Archaeological Survey of India, Volume I & II

## **Tamilnadu State Act**

- ❖ Tamilnadu State Enacted the Tamilnadu Ancient and Historical Monuments and Archaeological Sites and Remains Act, 1966 (25 / 1966)
- ❖ Tamilnadu State Enacted the Tamilnadu Ancient and Historical Monuments and Archaeological Sites and Remains Rules, 1971

## **MONUMENTS**

- ❖ Any Structure, Erection or any Tumulus or Place of Interment, or any Cave, Rock Sculptures, Inscriptions or Monolith, which is of Historical, Archaeological or Artistic Interest or any Remains there of Includes
- ❖ The Site of an Ancient Monument
- ❖ Such Portion of Land Adjoining the Site of an Ancient Monument as may be Required for Fencing
- ❖ Means of Access to and Convenient Inspection of an Ancient Monument



### **Activities of the Conservation Section**

- ▶ Identify and Declare the Monument / Site
- ▶ Protection / Conservation Measures
- ▶ Education, Publicity, Propaganda
- ▶ Public Private Participation eg. Vittala Temple
- ▶ Co-Ordination – Government of India, other State Department District Administration, Local Bodies. Execution thro PWD
- ▶ Secure Adequate Funds Flow thro Finance Commission
- ▶ Provide technical consultancy advice in Committees eg. Heritage Conservation Committee, Tender Evaluation Committee, Structural Stability Committee etc.

### **Deterioration**

Monuments undergo Different Types of Deterioration, which can be Broadly Classified into three groups i.e. Physical Chemical / Biological and Man-Made Factors.

[Eg. 1.Tirumalai Nayak Mahal, Madurai

2. Thadagapuriswarar Temple, Madam, TV Malai Dist.]

### **CONSERVATION**

#### TIRUMALAI NAYAK PALACE

- ▶ Minister's Dome
- ▶ Minor Domes
- ▶ Swargavilasam
- ▶ Kalyana Mahal
- ▶ Corridor Vault Roof
- ▶ Pooja Room
- ▶ Palliyarai
- ▶ Harem
- ▶ Natakasalai
- ▶ Granite Flooring
- ▶ Sculpture Yard

#### THADAGAPURISWARAR TEMPLE

- ▶ Main Gopuram
- ▶ Pillared Vasantha Mandapam
- ▶ Palliyarai
- ▶ Yagasalai
- ▶ Restoration Of Compound Wall

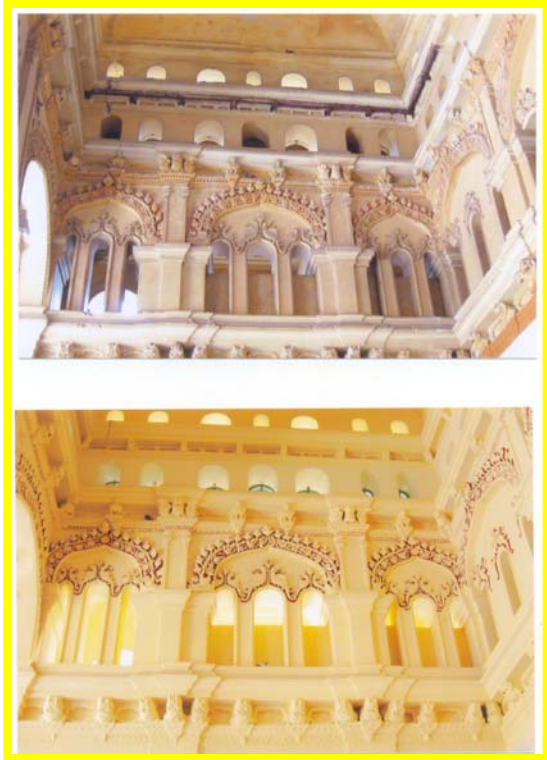
TIRUMALAI NAYAK MAHAL MADURAI



BEFORE



AFTER



NATAKASALAI



CORRIDOR



CORRIDOR



MAIN GOPURAM



A VIEW OF MANTAPAM



BEFORE



AFTER

THADAGAPURISWARAR TEMPLE

## AIM OF CONSERVATION

- ❖ To Preserve and Reveal the Aesthetic and Historic value of the Monument.
- ❖ Create Awareness to Safeguard the Monuments which are the Historical / Cultural Properties of India.
- ❖ Protect for the Lasting Benefit of Posterity.

## ANALYSIS OF HISTORICAL VALUE

- ❖ The Age to Which they Belong
- ❖ The Materials used in their Construction
- ❖ Sound or Unsound Condition of Structure
- ❖ The Historical Event or Events Connected with Each One of them and their Exact Location.

## RESTORATION & PRESERVATION

1. Identify the Failures
2. Improve the Stability.
3. Improve cohesion of the Materials.
4. Give consideration to the Aesthetic Effect.

## FACTORS

CAUSING DAMAGES	REMEDIAL MEASURES
<ol style="list-style-type: none"><li>1. Saline Action on Walls &amp; Stone Sculptures</li><li>2. Roots and Vegetation</li><li>3. Trouble caused by Animals and Bats</li><li>4. Negligence</li><li>5. Humidity</li></ol>	<ol style="list-style-type: none"><li>1. Removal of Salt &amp; Protection from Salt Action</li><li>2. Eradication by Regular Cleaning</li><li>3. Closure of Openings</li><li>4. Regular Maintenance</li><li>5. Monitoring Preventive Measures</li></ol>

## GENERAL CRITERIA

DO'S	DON'TS
<ul style="list-style-type: none"><li>❖ Documentation by Still Photos &amp; Videos</li><li>❖ Supporting Inner Structures by Centering</li><li>❖ Numbering in order before Dismantling</li><li>❖ Reversibility of Process</li><li>❖ Restored in Pre - Treatment Order</li><li>❖ Recessed Pointing</li><li>❖ Use Chemicals for Leaky Roof</li><li>❖ Uproot / Eradicate the Vegetation Plants using Blow Lamp</li><li>❖ Remove Scaffolding Properly</li></ul>	<ul style="list-style-type: none"><li>❖ Change Original Place and Colour</li><li>❖ Blind Replication</li><li>❖ Restore the Decayed Portion</li><li>❖ Demolish the Religious Edifies</li><li>❖ Using of Heavy Machineries</li><li>❖ Panchavarna / Multi colour</li><li>❖ Sand Blasting and Heavy Force of Water Blasting</li><li>❖ Varnishing the Inscriptions</li></ul>

**POINTS TO BE FOLLOWED**

- ❖ Blind Replication is to be avoided.
- ❖ Religious Edifice should not be dismantled.
- ❖ Using Pure Cement Mortar is to be avoided.
- ❖ No Modern Materials to be Substituted under any circumstances.
- ❖ Experienced Contractor should be engaged
- ❖ Conservation work to be undertaken as per archaeological principles.  
i.e. Conserve, do not renovate
- ❖ Any New Findings Noticed During The Work Should Be Reported To The TNSDA
- ❖ Chemical Treatment may be Introduced Against Removal and re Providing of Weathering Course for the Leaky Roof.
- ❖ Proper Documentation to be made at all stages including photos and reports

**SUGGESTIONS**

<b>DO'S</b>	<b>DON'TS</b>
<ul style="list-style-type: none"> <li>❖ Providing Rain Water Harvest</li> <li>❖ Information Board about the Temple their Historical Values</li> <li>❖ Up Rooted the Vegetation Plants</li> <li>❖ Using the Same Construction Materials During Work</li> <li>❖ Day to Day Cleaning</li> <li>❖ Retaining Water Table</li> <li>❖ Chemical Cleaning Process</li> </ul>	<ul style="list-style-type: none"> <li>❖ Avoid Painting and Cement Particles Over the Valuable ins. Paintings, etc.,</li> <li>❖ Avoid Huge Construction Activities near the Temple</li> <li>❖ Introducing New Materials</li> <li>❖ Stacking Debris</li> <li>❖ Permit Bore well Adjacent to the Structures</li> <li>❖ Sand Blasting</li> </ul>

**CHEMICAL CLEANING OIL ACCRETIONS**



Before



After



Before



After

KEELAKADAMBUR

CHINNAYAN KULAM – CHINNAYAN PETTAI



BEFORE



AFTER



Before



After

KATTABOMMAN FORT - PANJALAMKURICHI



44 BRITISH SOLDIER'S TOMBS - OTTAPIDARAM



BEFORE



AFTER



Before



During

T.N.MANDAPAM – AZHAGAR KOIL

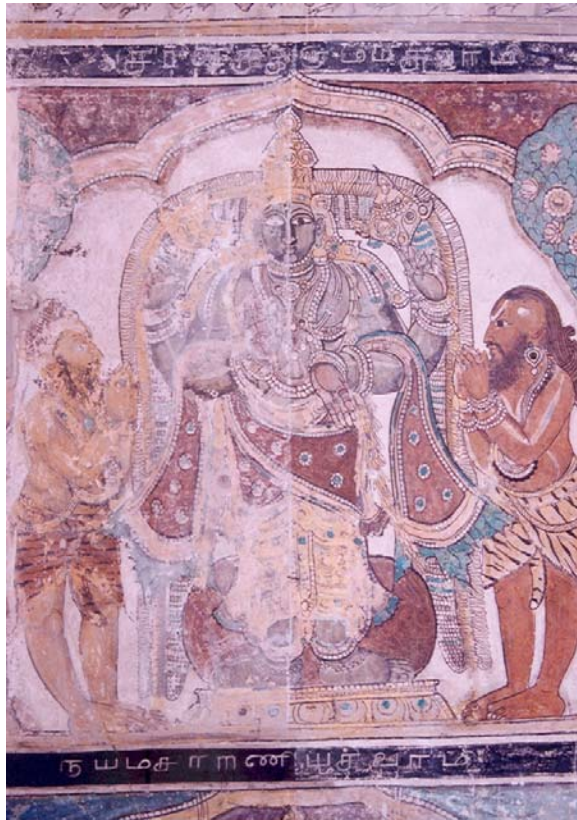
Before



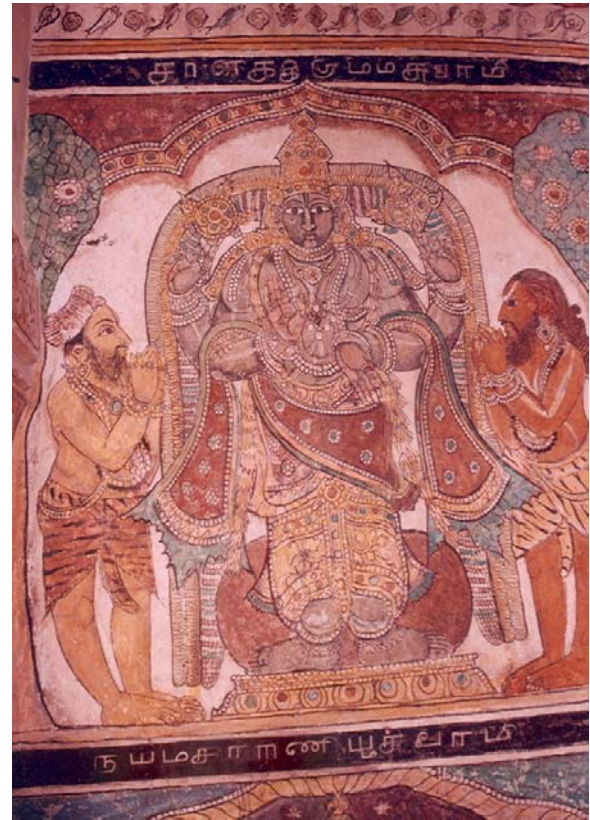
After



**NAYAKKAR MANDAPAM – THANJAVUR PALACE**  
Structural Conservation.



Before



After

**MURAL PAINTING CONSERVATION**



Before

After

### **STRUCTURAL CONSERVATION**

#### **CONCLUSION**

- ▶ Need for sustained campaign thro' media publicity, exhibition, seminars, and education down to village level
- ▶ Provision of adequate funds
- ▶ Training of personnel
- ▶ New Technology to be adopted
- ▶ Exchange of best practices
- ▶ Strict enforcement of heritage Act/Rules
- ▶ Effective co-ordination among the agencies

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