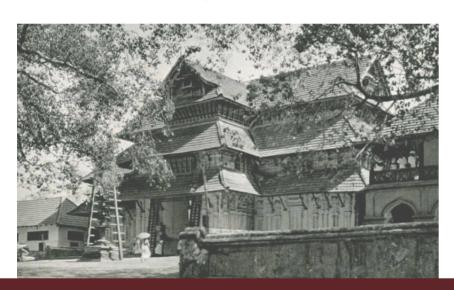
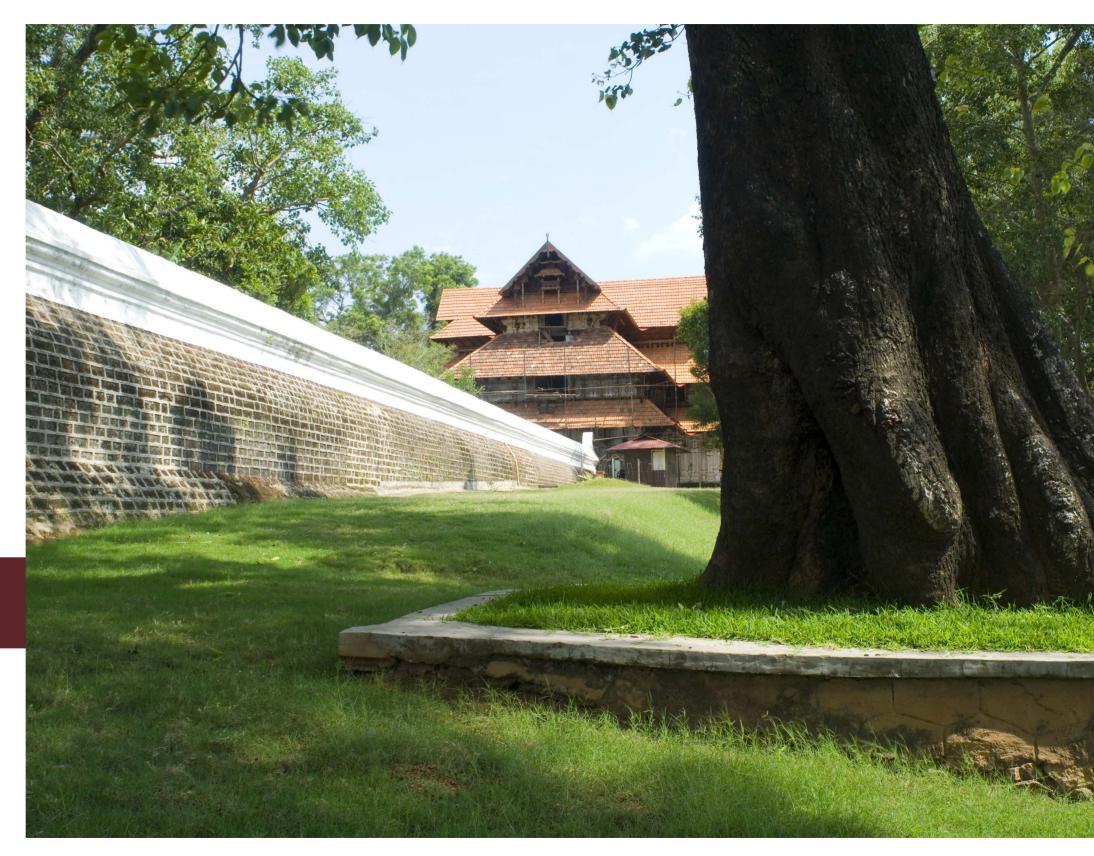
Retreading a Legacy



The restoration of Sree Vadakkunnathan temple won the 2015 UNESCO Asia-Pacific Award for Cultural Heritage Conservation

he holistic restoration of Sree Vadakkunnathan temple was done by a team comprising of more than 300 craftsmen and experts. The overall project co-ordination was under the guidance of Ar. Vinod Kumar MM, the Principal Architect at dd Architects, a firm based out of Thrissur. The aim was to revive a living religious heritage site using a combination of indigenous knowledge of vernacular building techniques, elaborate ritual protocols and contemporary conservation practice. This exemplary initiative was bestowed



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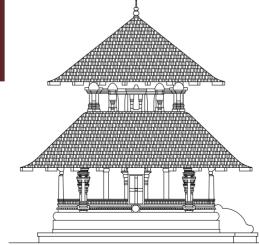
THIS PAGE Simhodaran and after restoration

with the UNESCO Asia-Pacific Heritage Award of Excellence in 2015.

Vadakkunnathan temple complex reflects the traditional architectural legacy of Kerala. An assessment of the Vadakkunnathan temple complex in the 1990's showed that no major repair works have been recorded for more than 100 years. A large percentage of the temple complex is constructed of wood and as it is a perishable material and due to the lack of periodic maintenance, the temple was in a state of disrepair.

MAJOR GOALS AND OBJECTIVES:

One of the primary objectives of this project was the consolidation of the structure so as to make it safe for the visitors. Employing local skills and practices, keeping the original materials and reusing the old as much as possible became important here. Balancing the conservation principles put forth by the protecting authority and those prescribed by the traditional treatises, respecting the age old practices and rituals was a significant



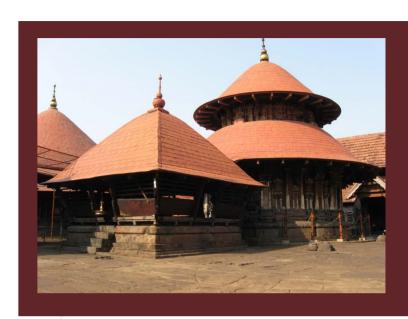
THIS PAGE shrine before and

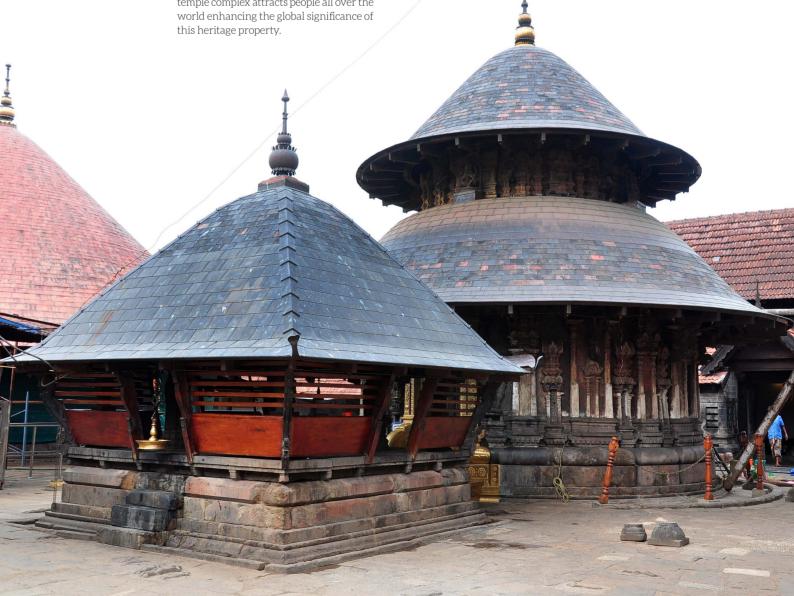
objective in order to ensure that the authenticity and integrity of the temple complex was maintained.

The walls of the Vadakkunnathan temple are decorated with excellent mural paintings belonging to different time periods; the earliest belong to the sixteenth Century CE. The elaborately carved stone and wooden sculptures and the mural paintings also convey many stories of the past and contribute to the historic significance of the structure.

CULTURAL AND SOCIAL SIGNIFICANCE:

The Vadakkunnathan temple complex located right in the heart of Thrissur had been serving as a nucleus for the urban centre to grow and develop. The "Pooram" festival being an important cultural event of Thrissur and closely related to the temple complex attracts people all over the this heritage property.





dd ARCHITECTS

Ar. Vinod Kumar MM established dd Architects in 2002. dd is a leading design intensive architectural firm in Kerala and over the years have many accolades for their works. The studio encourages architects, craftsmen and young minds to interact, share and develop creative expressions. The team believes that materials and buildings have a form of life and that beauty in architecture can be achieved through certain harmony between the structure, nature and its occupants.



THIS PAGE Rishabhan before and after Including the fortified wall outside, there are a total of three enclosures. Inside the innermost enclosure are the three shrines dedicated to the presiding deity Vadakkunnathan (Siva), Sankaranarayanan (both Siva and Vishnu) and Sree Rama. The walls of each of these shrines are decorated with mural paintings depicting stories from Hindu mythology. The three shrines have a Namaskara Mandapam (Halls where devotees of a certain caste can prostrate oneself in respect for the Lord) in front of them. Apart from these, the

innermost enclosure also consists of two ancillary deities, a thidapally i.e. the kitchen where prasadam (food to be distributed as religious offering) is prepared and a space for circumambulation. The innermost enclosure is immediately surrounded by the intermediate (second) enclosure; the exterior of which holds hundreds of metal lamps on wooden posts called the Vilakkumadom.

In between the outermost and the second enclosure, there are various other smaller shrines dedicated to the Hindu Gods like Krishna, Nandi, Ayyappan, Simhodaran and Vettaikaran. In addition, there is also a *Koothambalam*, a performance theatre of







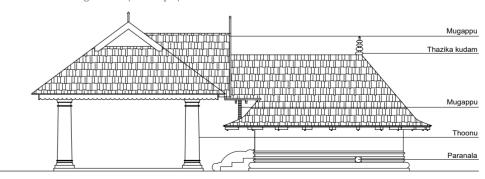
THIS PAGE Ayyappan Shrine before and after impressive scale which is the largest of all structures in the temple complex. A circumambulatory path of stone can be found all around these structures. One can also find trees and garden patches with high cultural, religious and mythological significance in this space. The outermost fortified wall is surrounded by a large maidan (open space) meant for the annual Pooram which, in a way, acts as a buffer to the historic temple complex.

CONSERVATION PHILOSOPHY:

THE TRADITIONAL CONCEPT OF JEERNODHARANA:

Vadakkunnathan being a Hindu temple in Kerala has got many metaphysical



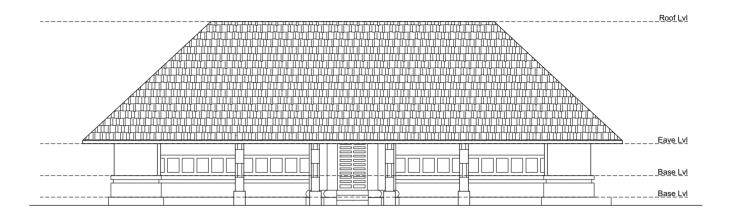




layers of meanings attached to it. Hence, conserving the intangible values associated with the heritage entity became equally important as that of the physical structures. Continuing the existing pattern of rituals and beliefs related to the building activity and conservation, (Jeernodharana) as per the regional texts and oral traditions, were found to be more logical than adhering to the western guidelines and charters. However, the entire conservation work was carried out adhering to the theories and principles of conservation as far as possible.

PRINCIPLES FOLLOWED:

Measures have been taken to keep the old works undisturbed and to reuse the old materials within the possible limits. The conservation works carried out is such that it retains the authenticity and integrity of





the prevailing architecture. In all cases, non destructive methods were adopted for the cleaning of wall surfaces and masonry.

The indigenous knowledge systems of the local craftsmen have been best utilized in all the restoration works executed. These workers have developed specific tools and even minor machineries of their own which are suitable for the conservation works. In cases where the entire roofing system was to be removed or dismantled, all the parts were numbered accordingly in a standardized format and were kept back in their original position after necessary repairs.

All kind of repair works including dismantling and removal of various







Goshala krishna after lime works

AROVE Goshala krishna before restoration

architectural elements have been carried out without causing any damage to the murals, paintings and sculptures in the temple. Since time immemorial, "vaastu" has been a traditional scientific practice in adherence to which the temples of Kerala have been constructed. In case of conservation of the Vadakkunnathan temple complex, a reputed vaastu professional was consulted in all major stages to ensure that the conservation works strictly adhered the science of vaastu. The integrated approach to conservation adopted in the Vadakkunnathan temple complex makes use of indigenous skills of more than three hundred expert craftsmen from various areas of expertise.

CONSERVATION METHODOLOGY:

PREPARATORY PROCEDURES:

The unit of measurements (Kol) used originally while constructing the building was reintroduced in the conservation works rather than imposing the metric system found today. These measurements needed to be followed with utmost care as even the smallest module is linked directly to the larger structure. Every stage of the conservation work was punctuated by appropriate rituals prescribed in the treatises. These rituals were attended by all the stakeholders and in a way functioned as a venue to share comments and observations on the conservation work

ADOPTION OF THE GUILD SYSTEM:

The ancient guild system, which is still practiced in parts of Kerala, was adopted where the carpenters, masons and blacksmiths worked

FACT FILE

PROJECT

OWNERS

ARCHEOLOGICAL PROTECTION/GUIDANCE

MAIN DONOR

ABOVE RIGHT

Not just the

structure but the

murals were taker

care in the process

of conservation

Local artisans

and workers were

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restoration

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BELOW

PROJECT CO ORDINATOR VASTU CONSULTANT

RESTORATION OF SREE VADAKKUNNATHAN TEMPLE

COCHIN DEVASWOM BOARD

ARCHEOLOGICAL SURVEY OF INDIA, THRISSLIR CIRCLE

VENUGOPALASWAMY KAINKARYAM TRUST

dd ARCHITECTS

: SREE KANIPPAYOOR KRISHNAN NAMBOOTHIRIPPAD

independently. The head craftsman of each of the guilds coordinated amongst the other guilds and communicated the decisions to fellow members.

The belief of seeking permission of the tree before cutting it reveals the traditional wisdom of our ancestors and their concern to ecology. There are specific rules to be followed while cutting and using the wood for carpentry works which are mentioned in the traditional treaties like Silparatnam and Thantrasamuchayam texts. The roof structure was assembled in the work shed prior to its actual assembly in the building to ensure perfection. As the carving work of a single element was done by various workers, utmost care was taken to follow the same scale and proportions of the original while carving out these patterns.

A research work was undertaken to track down the origin of the traditional materials that were used alongwith its pattern, ingredients, technical specifications and territorial linkage of these materials with other subcontinents. This revealed many interesting facts, enhancing the educational value of the temple in relation to the conservation works.



LIME

Since a long time in the global history of civilization, lime and lime products have been continuously used. In India also, lime has been used as a construction material since time immemorial. The use of materials and techniques employed in their original construction is said to be the most effective method for repairing and maintaining the traditional masonry. In recent times, the field of preservation of historic buildings using lime has generated much interest. Moreover, lime is a material which allows the building to breathe and also offers high degrees of thermal insulation and condensation control. Being a living historic structure since centuries, it was indeed important to use an organic material such as lime for the conservation work of Vadakkunnathan Temple. Due care was given in preparation and application of lime mortar and specific techniques were employed in the plastering and sculpturing work using lime.







THIS PAGE Velyambalam; Extensive woodwork and reinforcement of wooden members has been used in the conservation

COPPER

Copper plays a significant role in the traditional architecture of Kerala. In Vadakkunnathan Temple, copper is not only used in the roof structure but also for the finial panelling for wooden doors and also as a covering for the rafter ends of the roof structure and its ornamental Mugappu (Gable), protecting it from the vagaries of weather.

A method for reusing the old copper plates was developed by the indigenous craftsmen as a part of minimum interventions and maximum reuse of the old material. The purity of copper

was tested frequently during the course of the conservation works to ensure that the best quality of copper was used.

A new method of installation which involved fastening the copper tiles to the wooden board using a copper clip and nailing was developed in the conservation work of Vadakkunnathan Temple. This method had an advantage of being leak proof as there were no holes formed on the copper tiles. A temporary work shed was created just outside the premises of the temple complex. Saw dust and wood pieces from the construction work in the temple were used as fuel to heat the old copper tiles.

WOOD:

Wood being a material that is abundantly used in temple conservation was given due significance throughout. The procurement of this traditional material was carried out using a pre-planned methodology.

Vadakkunnathan Temple is not only just a marvel in stone and wood but it has substantial features that are woven with the lives and heritage of the locale it is situated in. This extensive conservation project involved more than 15 contactors of various expertise and have contributed towards making it one of the high-profile restoration works carried out in the nation.