# CONCEPTUAL NOTE ON ENVIRONMENTAL IMPROVEMENT OF SHANISHINGNAPUR DEVSTHAN

## 1. INTRODUCTION

### 1.1. BACKGROUND

Shani-Shingnapur is a famous pilgrim center near Ahamednagar in Maharashtra, which is also known for its door less mystery. Shani-Shingnapur is situated on **Latitude** 19° 31' 60N and **Longitude** 74° 55' 60E and **Altitude** 479 meters. The unique feature of Shani-Shingnapur is that there is neither any image of specific deity nor any particular idol, but there is a stone pillar, which is supposed to embody the image, which is worshipped with deep respect and reverence.

**CLIMATE:**

Temperature: Min. 16 degrees Celsius, Max. 43 degrees Celsius.

Average Rainfall :- 450 to 600 mms.

Biogeographic Zone - 6 B (Deccan Peninsula - Central Plateau)

Major Floral Species - Neem, Sissoo, Babul, Bor, Tarwad, Henkal, Dongri, Kusali Pavanya, Sheda, Marvel etc.

### 1.2. IMPORTANT EVENTS

There is routine programme, which are fallowed on daily, monthly, and yearly as per Indian Calendar

- Everyday at 4.30 am and at 6.30 pm common prey (*Aarti*)
- As Saturday is the day of god Shani Maharaja, many people visit the temple.
- *Shani Amavasya, Shani Jayanti* and *Gudhi Padwa* are major yearly occasions.
- Every year on *Ashadi Ekdashi* there is *Palkhi sohala* to Pandharpur.
- In the month of *Chaitra* there is *Harinam Saptah* (Seven days ceremony) and *Dnyaneshwari Poojan* which includes fallowing programme daily
    - 4.00 am to 5.00 am *Kakada Aarti.*
    - 7.00 am to 8.00 am *Dnyaneshwari Parayan* (Reading)
    - 3.00 pm to 4.00 pm *Sangeet*
    - 4.00 pm to 5.00 pm *Pravachan*
    - 5.00 pm to 6.00 pm *Haripath*
    - 8.00 pm to 11.00 pm *Kirtan.*

### 1.3. THE STUDY OBJECTIVES:

The objectives of the study include:

- To survey existing management practices at religious places
- To identify major problems during festivals
- To identify measures taken by civic authorities, health authorities during periods of important festivals
- To assess the quantum of wastes generated during the festival periods and their management
- Suggest short and long term eco-friendly management practices for the specific area.

### 1.4. THE STUDY AREA:

The study area includes the Main Temple premises, village and 2-3 km surrounding the village.

## 2. CHARACTER OF THE PLACE

### 2.1. HISTORY OF THE PLACE

**The incident**

One day the cowherds who had gone to graze their cattle to nearby forest saw a five feet nine inches tall image of Lord Shani entangled in bushes. In trying to extricate the idol, a stick got pierced into it and blood started oozing out. The scar can be seen even now. The frightened villagers ran away and told the village elders about it.

One of the wise and spiritual persons of the village had a dream in which he was directed by the idol who revealed himself as Shani, to take him, install him and worship him properly.

**Installation**

The villagers offered prayers, took the idol and placed in an open ground where it has been standing for more than 150 years now.

**Miracles associated with the village**

In the village, Shingnapur, there never was a single case of theft, murder, cheating etc. The spiritual effect of all this was so pervading that in the surrounding villages also a very high standard of honesty is maintained.

The people of Shingnapur had witnessed in these 150 years so many miracles of Lord Shani they were mortally frightened of committing any crime of taking to any vice. This is a very significant fact because in the rich sugarcane belt of Maharashtra where Shingnapur falls, there are crimes committed in other places.

No one ever locked his house and everyone left jewellery and cash wherever he liked without any fear of it being stolen.

There are also stories of miraculous punishments, which cannot be verified.

The story often related about such miracle is one about some thieves who had gone to the village to commit theft in the house of a prosperous farmer. They stole a pair of bullocks and tried to run away in the darkness of the night. After spending many hours, (in running away) they discovered as soon as the sun rose next morning that they were right inside the village! Lord Saturn did not allow them to flee but instead created an illusion of an escape while they were only circling and circling in the village.

There are more than one Shingnapur in the state. Shani-Shingnapur is located about 50 km (31 miles), from Shirdi (the home of Sai Baba), which is about 300 Km NW of Bombay. The other Shingnapur is called Shikhar-Shingnapur has a population of about 10,000.

## 2.2. TOURIST/ HERITAGE OF THE PLACE:

Each Saturday, there are between 10,000 and 20,000 visitors. "Every other day, there are about 5,000 visitors. The Shani Amavasya, which comes two to three times in a year, is the most significant day for the temple. During such occasions, the visitors actually go up to three lakh. "Gudi Padwa, which is the Hindu calendar's New Year, and Shani Jayanti, which falls some time in May, also attract two lakh-plus visitors. School holidays; too see a rise in the crowd, the number sometimes touching 50,000 a day.

## 2.3. THE CHARACTER OF THE PLACE:

None of the structures (dwellings, buildings, etc.) have doors, they have only frames. Until quite recently, say about 5-10 years ago, the only bank branch out there was a rural branch of the State Bank of branch out there was a rural branch of the State Bank of India. Surprisingly, even this structure was devoid of doors! Even this structure was devoid of doors!

There is no crime (petty crimes included) in this village. If one leaves a suitcase anywhere, even on the streets, no one will pick it up. You will find it exactly at the same spot even a few days later - except of course if a dog or a cow develops an interest in it. It is said that if one commits a crime in this village, one goes blind or loses a limb.

The main feature of the village of course is the Shani temple. It is said to be the only "Swayambhu" (self-manifested on earth) and "Jagrit" (awakened) Shani idol in India, which probably would also mean in the world. A visit, a sincere prayer and an appropriate "daan" (charity) in the temple, is said to result in the beneficence of Saturn. The scope of this beneficence is said to be more than to remove or alleviate afflictions material attachments.

The Shani idol is a large black rock (probably of basaltic origin, a common rock formation of the western Deccan Plateau on which most of Maharashtra state rests). Hundreds of years ago, the rock was said to have reached the village, floating on the waters of the nearby river (I forget the name) and landed on the shores. A local cowherd discovered it and was shocked to see it "bleeding". The villagers were of course scared. The rock would not budge, even when 20-30 persons collectively attempted to move it. It is said that the rock then spoke, identified itself as the image of Shani Maharaj and said that only two people were required to move it - but these two people should be a maternal uncle-nephew combination. There was only one such pair in the village who were summoned and indeed the rock moved. Shani Maharaj then gave instructions for the "pranapratishtha" (installation ritual, which introduces breath or life force into idols) of the image and laid down the rules of social behavior in the village.

As is typical of most other temples in India, there of course are the usual mercenary transactions involved in ritual worship. However, these are far less blatant or aggressive than found in many other places.

The worship of the Shani Devata is also fallowed inn a special way. There are two types of worships.

**Worship**: General

There is not priest here. Anyone can worship. There is an ancient palanquin here where the padukas (footwear) of Shani Maharaj is placed. No woman is allowed to walk on the platform on which the idol of Shani is placed. (Remember how Shani wanted to remain a celibate but had to bow down before the orders of his mother)

**Worship**: Special

Three types of people are said to visit this place for special prayers:

- Those who have Saturn in their lagna
- Secondly, those who are passing through saadhe saati and
- Finally anyone who has been told astrologically that Lord Shani has to be propiated to overcome the problems being faced by them.

**Discipline to be followed in worshipping**

Men who worship are to follow simple rules of a hundred percent purity. They must bathe, wear wet lion clothe and worship only then. Many Hindu women used to follow such a discipline about five and more decades ago very regularly in their homes.

## 3. THE LAND USE AND DEVELOPMMENT OF THE PLACE:

### 3.1. LAND USE: -

Mainly agricultural land, along with residential land.

### 3.2. OBSERVATION ON PLANNED DEVELOPMENT:

The Devsthan trust is very active. They are giving many facilities to the pilgrims as possible as them. But this development is in unplanned manner, without any environmental point of view. They have developed the Mandir Premises in very good manner.

## 4. SOCIAL AND ECONOMIC ASPECTS

### 4.1. POPULATION:

The population of Shani Shingnapur is near about 3000. The population is distributed in the main village as well as nearby farm areas.

### 4.2. FLOATING POPULATION:

- Each Saturday, there are between 10,000 and 20,000 visitors.
- Every other day, about 5,000 visitors.
- The Shani Amavasya, which comes two to three times in a year, is the most significant day for the temple. During such occasions, the visitors actually go up to 3-5 lakhs.
- Gudi Padwa, which is the Hindu calendar's New Year, and Shani Jayanti, which falls some time in May, also attract two lakh-plus visitors.
- School holidays; too see a rise in the crowd, the number sometimes touching 50,000 a day.

### 4.3. ECONOMIC ACTIVITY:

The people of Shani Shingnapur are mainly engaged in the Agricultural activities. Another main occupation is the stalls of the worshiping material, commodities. Other business includes hotels and restaurants.

## 5. INFRASTRUCTURE

### 5.1. TRAFFIC AND TRANSPORT:

#### 5.1.1. Transport:

- Shani Shingnapur is situated nearly 40 km from Ahamednagar, 5km from Ghodegaon, which is on Ahamednagar-Aurangabad road.
- It is 65km away from shirdi.
- About 15 buses of State Transport and two buses of devsthan, which takes passenger between Shirdi and Shani Shingnapur. Also there are so many private passenger vehicles for Shirdi, Ghodegaon and other surrounding places also.

#### 5.1.2. Traffic:

- The traffic consists of Heavy Vehicles, Travel Buses, S.T. Buses, and Jeeps etc.
- There is problem of traffic jam due to the bad condition and narrow road near the Mandir premises.
- The seasonal traffic of the Sugarcane Transporting vehicles increases the problem.

#### 5.1.3. Road condition:

- The condition of the road is not good. The roads in 5 km premises from place are full with Potholes and puddles.
- He roads near the Mandir are also in bad condition along with garbage spilled all over the road.
- There are no proper signboards to guide the pilgrims.

#### 5.1.4. Parking:

- Trust has an organized parking place for 500 vehicles; also there is private parking place, which can accommodate 200-300 vehicles.
- But during Festival days'-like the Shani Amavasya-the line of vehicles are parked 1 km east of the Mandir.
- Existing place is not enough.

### 5.2. HEALTH CARE FACILITIES

- Recently trust has built a 10-bed hospital; initially the O.P.D. has started. Before that, no health care facilities were there.
- There is one primary Health Center at Sonai, 2 km away from the village.
- There is one Private Clinic in the village.

### 5.3. ELECTRICITY:

- The village is good connected with M.S.E.B. Electricity Supply; but the problems associated with the M.S.E.B. Electricity Supply were also noticed there.

### 5.4. WATER SUPPLY:

- The main water source is Mula Dam. There is nearly 3 km pipeline from Mula Dam.
- Drinking water system is inadequate.
- The village depends on the Trust Water supply for drinking water; the Grampanchyat doesn't have any water supply scheme.
- The water of Bore well is used for other uses.
- No facility for water treatment.

### 5.5. SEWERAGE NETWORK:

- Trust has their own underground sewerage network.
- The village has open drainage system without any proper management.
- All this drainage goes to the panas nalla; a stream now completely dry. This stream flows near by the Mandir.

### 5.6. HOUSING AREAS:

- Shani Shingnapur comes under the rural areas.
- Majority of the villagers live in the main village and in the nearby agricultural areas, into their own Farms.

## 6. ENVIRONMENTAL RESOURCES

### 6.1. PLANTATION:

- All the roadside and barren areas covered with monoplantation of *Vedi Babhul* (*Prosophis Juliflora*);one kind of weed. It gives bad look to the area. In the Shani Shingnapur areas there is very rare plantation.
- There are other species like Neem, Sissoo, Babul, Bor, Tarwad, Henkal, Dongri, Kusali Pavanya, Sheda, and Marvel etc.

### 6.2. PARKS/ OPEN SPACES/RECREATIONAL AREAS:

There are very less areas which can be used as the open spaces, or recreational areas also there is very less scope for planning the parks and open spaces and other recreational areas.

### 6.3. AGRICULTURAL LAND:

Major crops are sugarcane, jowar, Bajara, groundnut, pulses and wheat.

## 7. AIR POLLUTION

### 7.1. SOURCES OF AIR POLLUTION IN SHANISHINGNAPUR

- sugar factory that is located about 2km away from Temple
- Traffic on the near temple
- Open incineration of solid wastes

### 7.2. AIR POLLUTION

- The sugar factory releases tremendous amount of the gases and particulate matter in the air.
- As the Molasses released by the sugar factory in the panas nallah comes to the Shani Shingnapur gives horrible obnoxious odour, this gives bad image to the place.
- Traffic contributed to the air pollution. The exhausts of the vehicles release various hazardous gases in air; which affects the air quality. It responsible for various health problems.
- Large amount of garbage is incinerated openly that increase the problem.
- The dust particles also contribute the same.

### 7.3. EXISTING QUALITY

- It is very bad. Panas nalla produces very dirty odour, which is intolerable, whole surrounding is having that dirty odour.
- Dust particles are there in much more amounts.

## 8. WATER POLLUTION

### 8.1. DRAINAGE

- The Mandir trust has close underground drainage system. But village has open drainages. All this drainage goes to the panas nalla, which flows near to the Mandir.

### 8.2. WASTE WATER GENERATION

- Water used in village for domestic purposes.
- 1,000 liters of cooking oil are poured on the stone idol and then they flow into an underground pipe that leads to a collection center. On peak days, the temple can generate 3,000 to 4,000 liters**.** Along with this oil the water and detergent used to clean the *Chauthara* around the Shani idol and *abhishek* material goes to the collection center, Then at the collection center the water and oil is separated and water is directly disposed in the panas nallah. Even the coconut water contributes in small amount.
- Mandir bhojnalay: - in trust Bhojnalaya there are 1,000 to 1,500 peoples take meal we can understand the quantity of waste generated, which includes water used for washing the utensils, washing hands, and all the remaining food, is disposed in to the panas nalla directly.
- The wastewater coming from the septic tank of Trust toilet.

- Compulsory holy bath which all men visiting the place have to take generates a lot quantity of waste water.
- Sugar factory: - molasses produced in factory which is 3 km away from the place is disposed in to the panas nallah without any treatment.

### 8.3. SURFACE WATER QUALITY:

- Surface water includes only the panas nallah, which is in horrible condition it is totally converted into a sewer.
- Panas nallah is having tremendous amount of COD, BOD and other organic as well as chemical pollutants.

### 8.4. GROUND WATER QUALITY:

- The groundwater of the place is salty due to the calcarious soils. It is not potable only used for other uses.

### 8.5. WATER PROBLEM:

- The place comes under low rainfall areas; obviously there is water scarcity usually.
- The person uses the water from the wells, tube wells and hand pumps.
- The potable water is taken from the sansthan water supply scheme and manually carried to their homes.

## 9. SOLID WASTE

### 9.1. RESPONSIBLE AGENCIES

- Floating population
- Temple activities
- Local residents

### 9.2. WASTE GENERATORS

- Major contribution is floating population. Daily 6 to 7 tons of solid waste generated. It consists of garlands, flowers, coconut shells and coir.
- It also includes plastic bags and bottles in which oil is carried, as it is the one of the important worshiping material.
- At the same time waste from *bhojnalay* is another source of solid waste generation. It consists of mainly kitchen waste, remaining cooked vegetables, rice etc.
- Also the local peoples contribute small amount of the solid waste but they dispose it in their agricultural farms in the form of F.Y.M.

### 9.3. SOLID WASTE MANAGEMENT: -

- There is no any facility for management of solid waste; which produces in huge quantities daily. All the waste is dump on the bank of panas nalla openly.
- Even there are no dustbins.

## 9.4. CONCLUSIONS

- As waste is dump openly, near to the Mandir it give very bad look to the entire place.
- It create unhygienic conditions, peoples faced the problems like malaria, hepatitis. There is problem of mosquitoes and flies.
- Panas nalla became a dirtiest one, which produces very dirty odor, which is beyond the tolerance limit.

## 10. ENVIRONMENTAL MMANAGEMENT:

***FUTURE PLANS***

***a. About Religious –Tourism :***

Tourism has been considered a major issue by environmentalists as far as environmental damage to natural tourist sites is concerned. Poor planning of tourism schemes and alarming growth of the industry are major factors responsible for the damage. For example, the Dal lake, which was twenty-five square kilometers five decades ago, is only ten (or even less) square kilometers today, presumably due to tourist pressure and improper upkeep and maintenance.

Tourism is the only sector in which developing countries consistently run up a trade surplus. An estimated 65 percent of the roughly 200 million jobs created by tourism each year are in developing nations. On average, these countries rely on the sector for one-tenth of all export earnings but in some countries, tourism accounts for more than 40 percent of gross domestic product. **A few developing nations have been successful in trying to promote "eco-tourism" and integrate environmental concerns into tourism planning.**

**Tourism development has long been highlighted as a key to poverty alleviation and economic growth in the country. India, with such a diversified physiography, has much to offer by way of tourism; India's mountains, temples, forts, palaces, sculptures, paintings, monuments and archaeological ruins, the forts, beaches and wildlife etc. India has a rich cultural and religious heritage. People of different religion and faith live in the country and a large number of religious places are spread throughout the country. Overall, study indicated that religious tourism also plays a very important role in country's tourism activity and indirectly to the economy.**

**Tourists all over visit many of these religious places from India as well as abroad. In this study, the religious places on which we are focusing are very well known. If we really want to save these places, a strong, responsible action is needed to conserve and develop the places without upsetting the pilgrims' outlook about specific religious places.**

**For tourism to be socially and ecologically sustainable, governments, tourists, and civil society groups must push for systemic change in the way the industry operates.**

Earlier religious tourists were forced to use public transport and slept in lodgings owned by local people. Nowadays situation is different, they want better services, just like other mass-tourists: modern hotels, and air-conditioned buses etc. Tourism and Environment are mutually inter-related. While tourism requires a good natural environment, not to speak of socio-economic environment, for it to flourish, the existence of the latter pre-supposes, a controlled, disciplined and regulated tourism. Environmental degradation can lead to a decline in tourisms, while uncontrolled tourism leads to environmental degradation.

## 10.1. PLANNED DEVELOPMENT:

The development is in planned manner, but without any environmental point of view. There is need of development in environmentally planned manner.

Proper beautification of the area is necessary, it can be done by creating gardens, parks and plantation.

## 10.2. POPULATION:

The local population is less but the load of Floating population is tremendous, the village is not sufficient to take care of that population. There is need to develop the infrastructure like proper place to stay, restaurants for good hygienic food, proper roads for that load of floating population.

## 10.3. ECONOMIC ACTIVITY

To improve the economic activities of the local people, they should be made aware about the religio- tourism and made them engaged in the related activities. Also the infrastructure and training like can be given to the local people.

## 10.4. INFRASTRUCTURE

### 10.4.1. Transport:

As transport is very important for the religio- tourism. Pilgrims need good comfortable transport system, which need to be provided.

### 10.4.2. Traffic:

- The roads can be widened too cope with the increasing load of the vehicles.
- The sugarcane transport traffic can be diverted by bypass from entering the village

### 10.4.3. Road condition:

- Roads to reach the place are needed to be in proper condition for comfortable reach of pilgrims.
- Roadside plantation is necessary.
- Proper signboards are needed.

### 10.4.4. Health care facilities

- Proper health facilities should be provided to the pilgrims as well as villagers.

### 10.4.5. Water supply:

- Water supply scheme along with water treatment plant is needed to the trust and also for the villagers

### 10.4.6. Sewerage network:

There is need of the closed sewerage system with sewage treatment plant is needed which will dispose the sewage without any pollution.

### 10.4.7. Plantation:

- All the roadside and barren areas covered with monoplantation of Vedi Babhul (*Prosophis Juliflora*);one kind of weed. It gives bad look to the area. In the Shani Shingnapur areas there is very rare plantation.
- There are other species like Neem, Sissoo, Babul, Bor, Tarwad, Henkal, Dongri, Kusali Pavanya, Sheda, and Marvel etc.

## 10.5.PARKS/ OPEN SPACES/RECREATIONAL AREAS:

- Surrounding areas should be acquired and used for the parks.
- The parks should be created and maintained properly.

## 10.6.AIR POLLUTION

- The obnoxious panas nallah need to be restored to.
- Roads should be made properly to minimize dust.
- Roads should be covered with the plantation.
- There is need of the control the air pollution from the Mula Sugar Factory.

## 10.7.WATER POLLUTION

- The wastewater of the village and temple should be properly treated to stop the water pollution.
- The release of the molasses in the panas nallah without any treatment should be stopped.
- The panas nallah can be restored by phyto-remediation. It will improve the ecology of the area in future.
- There is also scope for recycling of the used water for secondary purposes like irrigation and for gardens.

## 10.8.WATER PROBLEM:

- There is need of sustainable solution of the water scarcity problem, water can be provided from the Mula Dam.

## 11. SOLID WASTE

- As solid waste is one of the major threats to the place it is necessary to manage it properly. By proper separation of the waste as biodegradable and non-biodegradable waste at the source only.
- Further the waste can be disposed in proper manner.
- Biodegradable waste can be utilized by vermi-composting and non-biodegradable waste can be recycled through the authorized recyclers or used for land filling.
- The dustbins should be placed properly.

- **However, there is no limit on number of tourists increase but there is a limit that the environment can tolerate. Mass tourism brings with it hordes of people wanting to make quick money out of it without the much needed sensitivity.**

- **Hotels and lodges are constructed near temple area. Beside that many large-scale religious places have full fledge facilities for pilgrims / tourist of their own trust**. Their refuse leftovers and sewer water get into the nearby water body or to open fields; finally polluting water and land.
- Insensitive tourists may damage the rare flora and fauna of the ecosystem.
- While it is agreed whole-heartedly that attention should be paid to the development of tourism, it should be in conformity with the environmental requirements and must merge harmoniously with the overall action plan for conservation and development of not only waterbodies but also the other environmental factors.

- In this case Panas nallah is most awfully affected and major and immediate action is needed to improve the conditions. It get wastes from sugar factory as well as temple and village area.
- Unmanaged solid wastes disposal is one of the main causes of environmental degradation of localities. Increasing floating population is the leading cause of solid waste management problem. However, there is a lack of data on solid waste of the area.

- Stalls around the temple area have definitely added to the solid waste and wastewater problem of the area. Un-hygienic condition is another problem faced by the place.

- The cultural and social carrying capacity should be assessed, in order to avoid tourism development and visitor numbers that adversely affect local communities and their way of life and to determine the level beyond which the essential qualities that people seek in the tourist site would be destroyed by further touristic developments.
- Inadequate funds are the main problem in the application of the future plans.

***c. Project will focus on -***

- Action plan for improvement and conservation of nallah.
- Strict ban on throwing any *pooja* items and other solid waste into nallah.
- Drinking water system is needed.
- Need of Proper sanitary system
- Proper solid waste collection, treatment and disposal plan for whole religious place.
- Some ban on use of heavy amount of oil for Abhishek
- Better option for plastic bag for carrying oil is must.
- Use of biodegradable waste such as *Rui* garlands, flowers etc for some different and constructive purpose.
- Strict action on use of non-biodegradable wastes in pooja material etc.
- Beautification of religious place
- Public Participation and Environmental Awareness.
- Assessment of the cultural and social carrying capacity of the area.
- Modernization of the temple area.
- Facilities to attract more tourists

**Due to large floating population of pilgrims at Shanishingnapur, the available infrastructure is not sufficient to meet the requirements in order to accommodate the floating population, resulting in degradation of environment at these places. It is requirement to study the detailed environmental impacts of various activities at the religious place and to provide Environmental Management Plan (EMP) for the environmental improvement of the Shanishingnapur Devasthan, which will include various short and long term goals to solve the problem effectively and environmental friendly.**