





# Kaas Plateau: A World Natural Heritage

## **Table of Contents**

Foi	wa	ard	. 3
Ab	ou	t Report	. 5
	1.	Background of Kaas	. 6
	2.	Biodiversity Heritage	.7
	3.	History and Timeline	. 8
	4.	Overview of Year 2018	10
	4.1	Kaas plateau management committee	11
	4.2	2 Tourism	12
	4.3	Revenue Generation	13
	4.4	Revenue Allocation	14
	4.5	Community Development	15
	4.6	Activities and Initiatives	16
	5.	Interaction with the Local Individuals	17
	6.	Interaction with the Stakeholders	19
	7.	Progress and Challenges	23
	8.	Future Plans	25
	9.	Community Dialogue 2018	25
	10	.Recommendations	27
	11.	. Conclusion	28
	12	.News	29
		Reference	35
		Annexure	36

## FORWARD

## Mega Example of Mini-Site : Looming challenges

UNESCO's list of World Heritage Sites now boasts total of 1121 sites from 167 countries, including 213 World Natural Heritage sites. These include the inscription of 29 new sites approved by World Heritage Committee of UNESCO at Baku, Azerbaijan in July 2019.

Out of the 29 new sites inscribed, only 4 were under category of natural heritage and remaining were cultural heritage (with one as both cultural and natural). The total area covered by the World Natural Heritage sites is growing steeply. At present, it is 300 million hectares having nearly doubled in last decade. This is good news for conservation of nature.

Considering that the area covered by Kaas Plateau (one of the 39 serial sites of the Western Ghats, which was inscribed as World Natural Heritage in 2012) is only about 1600 hectares, its importance appears to be insignificant. But the mega example this mini-site has created in encountering the growing challenges and threats is simply amazing. That's what this annual report card reveals.

Kaas Plateau, northern most natural heritage site in the Western Ghats is in the close vicinity of high mountains. Just about 25 kms from the district city of Satara, which is 140 kms from megacity of Pune and 280 kms from India's financial capital, Mumbai, it is literally encircled by fast urbanizing habitats. The tourists from these cities, with their increased mobility, barge-in at the gates of the Kaas Plateau posing unparalleled threat to the sprawling carpets of fragile wild flowers of varied colours. The world knows 'wild fauna' tourism, but this tiny site is famous for 'wild flora' tourism.

The horde of tourists not only pose threat that endangers the wild flowers but it also risks the very basis of the 'outstanding universal value' of the Kaas Plateau, the criteria on which the site is inscribed by UNESCO.

The climate change associated with extreme weather events and potential danger of indiscriminate human intervention under the shadow of development, also pose the perils that menace the sustainable living of the local communities.



TERRE Policy Centre, recognising these threats have been tracking the progress of the sustainable management (or lack of it) of the site and publishing the Annual Report Cards (ARC) <sup>1</sup>right from 2013.

The methodology adopted by TERRE in preparing such ARCs is transparent, inclusive and consultative in nature. At the core of the consultation is the local community and Joint Forest Management Committee (JFMC) mentored by the Government's Forest Department. Led by young team of research experts and interns, Anuja Gurjar, Neha Potnis and Akshay Kulkarni, this ARC tracks the trends of over last 7 years, recognises the positive development mainly attributed to the hard working JFMC and local habitat, underlines the growing threats and makes well-thought out recommendations.

The team also benefitted from consultation with researchers, journalists, academicians, local NGOs, Forest Department and tourists. The resulting ARC, while appreciating the constructive efforts of the JFMC, also points to the challenges ahead.

UNESCO has the provision of adding the heritage site 'under danger' list, if the species are on the verge of extinction. Indeed for the same reason, the Island and Protected Areas of Gulf of California in the meeting in Baku was added to the 'List of World Heritage in Danger'.

There is an urgent need for raising awareness among the tourists and developing a network of the JFMCs of the 39 sites of the Western Ghats, starting with 4 sites of the northern cluster that are in periphery of 300 kms. Such network of JFMCs would help in sharing information and learning from successes and failures.

I hope this Annual Report Card, prepared by TERRE without any external financial help and with full voluntary contribution would help in continued progress of the sustainable living off the Kaas Plateau communities.

## Rajendra Shende

Chairman, TERRE Policy Centre

Former Director UNEP

<sup>&</sup>lt;sup>1</sup> The Annual Report Cards of previous reports are available on http://terrepolicycentre.com

## **ABOUT REPORT**

TERRE Policy Centre, coordinating organization of this annual report card 2018-2019 was instrumental in supporting the Government of India in getting UNESCO's inscription of the Western Ghats with its 39 sites as World Natural Heritage. Kaas Plateau is the northern most and the smallest of the 39 sites. It is also the most distinct among all other World Natural Heritage Sites in the world because of its unique universal value in the form of the endemic wildflowers.

TERRE Policy Centre has also been providing regular mentorship, guidance and consultation to the local community and the Government authorities for the preservation of the plateau without any external monetary support.

The Annual Report Card is an important document that tracks the progress of the management of the site and provides recommendation to conserve the site in the coming year.

The report recognizes the cumulative efforts of the Joint Forest Management Committee, Forest Division of district Satara of State Government, local community, researchers, experts and journalists.

The information shared in this report card was collated and compiled by TERRE Policy Centre during various communications and the visits undertaken to Kaas Plateau and villages in 2018 till June 2019.

## Annual Card was prepared under the overall guidance of:

Rajendra Shende, Chairman TERRE and Former Director UNEP

Dr. Vinitaa Apte, Founder Director TERRE

### Project Team:

Dinah Gengmei, Project Leader

### Supported By:

Anuja Gurjar, Akshay Kulkarni, Neha Potnis, Sai Kaushik Kodali, Sourav Dutta, Bhaskar Godbole



## 1. Background of Kaas

Located in the Satara district of Maharashtra state in India, Kaas Plateau (or Kaas Patthar, as it's locally known) is a hotspot for biodiversity in India's **Western Ghats**, also called as **Sahyadri** that sprawls about 1600 kms in length and 140,000 square kilometres area in total.

At the World Heritage Committee in Saint Petersburg, Russia in the year 2012, the Kaas Plateau, among 39 other sites became the part of UNESCO World Natural Heritage Site.

It is situated on the top of the hill, where the grasslands on the volcanic soil of few centimetres turns into a 'valley of flowers' during monsoon season, particularly from August to early October.

Geographically located at 17°42' - 17°45'N and 73°47' - 73°56'E in the Satara district of Maharashtra, it is situated at an altitude of 1200 metres and is approximately 10 sq km in area.

Kaas plateau is a "Rock Outcrop". Outcrop, in geological terms, is a portion of naturally formed bedrock or other landform protruding through the soil level. It supports unique vegetation and has abundant endemic species.

Kaas has been recognized as one of the hotspots of biodiversity due to its unique ecosystem and high degree of endemism, which is sensitive to external threats.

The threats arise not only because of insensitive tourism but also due to the indiscriminate development activities undertaken without proper environmental impact assessment. Poaching and biotic invasion due to excessive traffic, especially during the flowering season has endangered the natural habitat of the plateau. The climate change and extreme weather events add to these threats.

Unfortunately, the villages surrounding this plateau are financially underprivileged and the literacy level is also comparatively low. Though they have been aware of the World Natural Heritage Site status, they have just recently started to acquire more understanding about threat to its natural assets and environmental wealth that directly or indirectly contributes to their very livelihood.

TERRE Policy Centre, Pune along with the Forest Department of Satara District and Joint Forest Management Committee (JFMC) undertakes the initiative of keeping a community dialogue at local level to assess the progress and plans of various activities related to nature conservation and community development.



## 2. Biodiversity Heritage of Kaas

There are few stories behind: why the plateau is named as 'Kaas'. The Kaasa tree (*Elaeocarpus glandulosus*) is found in thick forests around the Kaas, therefore the plateau was named as 'Kaas'. In the regional language, Kaasa also means a lake. The major lake on the plateau could have been one of the reasons for the place to be named 'Kaas'.

The flora and fauna of Kaas is unique and endemic to the region. More than 850 species of flowering plants are reported in Kaas Plateau, out of which 624 species have entered the Red Data Book<sup>2</sup>, wherein 39 species are endemic to Kaas Region only.

The unique flora of Kaas, includes white Habenaria (ground orchids), bright yellow sonki (Senecio grahamii), Mickey mouse shaped Smithia, Utricularia (Seeta`s tears) and purple Aponogetan satarensis (Y-Tura). Aponogetan satarensis species is endemic to the Western Ghat region. Topali Karvi (Pleocaulus ritcheie) is found in abundance on the edge of the forests & cliff. Karvi has 250 species, out of which 46 are found in Western Ghats. Fauna of Kaas include, variety of amphibians, reptiles (Rat Snake -Dhaman), insects, butterflies (White Orange Tip, Common Silver Line, Blue Pancy) and mammals (Small rats to enormous gaur are among the most common and important mammals of Kaas).



Image1: Flora of Kaas Plateau



<sup>&</sup>lt;sup>2</sup> The **Red Data Book** is the state document established for documenting rare and endangered species of animals, plants and fungi as well as some local sub-species that exist within the territory of the state or country.

# 3. Timeline of Kaas Plateau since its inscription as World Natural Heritage

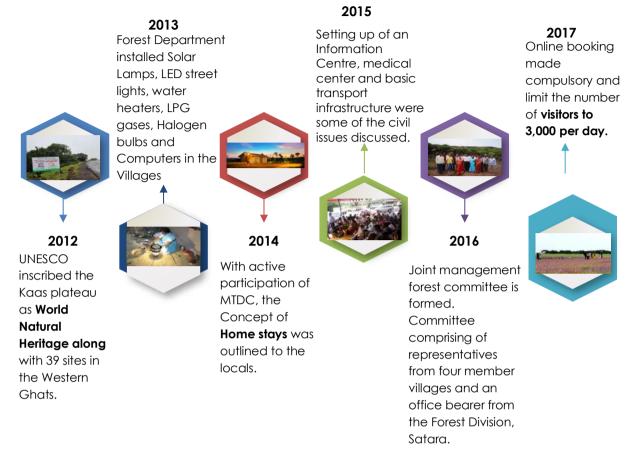


Image 2: Timeline of Kaas Plateau since its inscription as WNH site of UNESCO

**2012:** The workshop on Community Dialogue was organized by TERRE Policy Centre (Pune-based NGO) and Ranwata (Satara-based NGO) in Satara city, not far from the Kaas Plateau. It included local village heads, forest officers, government representatives, experts from UNESCO, Bombay Natural History Society (BNHS) and number of NGOs and news media. Series of meetings by the forest committee and the local communities to develop the plan of actions were held, even before the inscription by UNESCO for the Kaas Plateau, particularly on conservation techniques, monitoring the tourists and inclusive management by the local communities. UNESCO later inscribed the Kaas plateau as World Natural Heritage along with 39 sites in the Western Ghats.

**2013:** Plan of Implementation was prepared by the local forest committees and village Panchayats. An interactive event, first of its kind after the



inscription by UNESCO was focused on encouraging active participation between the villages and the Forest department. As a result of this dialogue, the Forest department helped in the installation of solar Lamps, LED street lights, water heaters, LPG gas connections, halogen bulbs and computers in the villages surrounding the plateau.

**2014:** The 2014 Community Dialogue was a continuation of the established participatory process and bottom-up approach. The dialogue was focused on how ecotourism could be leveraged for the development of local community. With active participation of Maharashtra Tourism Development Corporation (MTDC), the concept of 'home stays' was introduced to the locals. They were given guidelines and professional training on 'How to manage home stays?'. Developments in skill building, education and concepts on sustainable living were also discussed as priorities.

**2015:** TERRE along with representatives from the Forest department, other NGOs, MTDC and the local community assessed the progress and reflected upon the discussions that took place in 2014 with required follow-ups.

The overall objective of this event was to evaluate the progress and efforts undertaken for the conservation of Kaas as World Natural Heritage site and plan for future activities with active involvement of organizations working at the grass root, state, national and international levels. Setting up of an information centre, medical centre and basic transport infrastructure were some of the civil issues discussed. Biodiversity conservation, maintenance of the cleanliness and natural beauty of the area, continued agricultural productivity in the area through enhanced pollination, nutrient cycle and biodiversity and development of the communities around the Kaas plateau remained at the heart of the discussions.

The villagers showed their anxiety for the loss of their agricultural land that may happen due to expansion of Kaas lake.

**2016:** Joint Forest Management Committee (JFMC) was formed. Committee comprising of representatives from four member-villages of Kaas, Ekiv, Atali and Kasani, and an office bearer from the Forest Division of Satara were identified as the anchor-engines for Kaas Management. JFMC has been responsibly contributing the most in preserving the plateau since then. Community discussed the impact of increasing the level of Kaas lake on the sustainable livelihood of the villages.

For tourists above 12 years of age, the entry fee for maximum three hours on weekends and public holidays was decided as INR 100 per individual,



and on week days as INR 50. In addition, the Committee also decided to apply vehicular fee of INR 10 for two wheelers, INR 50 for four wheelers and INR 100 for all big vehicles including, mini-buses for minimum four hours of parking. \*1 USD ~ INR 70.

**2017:** JFMC witnessed a structural reform with majority view that allowed the inclusion of two more villages i.e. Pateghar and Kusumbimura as members of the committee. Thus, the number of members increased from 11 to 18, with 3 members representing each member village. A president and a chairperson were elected democratically within the members of JFMC. In order to maintain gender balance and provide equal opportunities within the community, JFMC decided to include at least one female representative from each of the six villages.

The committee also ensured that local communities achieve a sustainable livelihood from the tourism activities around the plateau. The JFMC in association with several other organizations and local residents organized capacity building initiatives like training for tour guides, waste management camps, crowd management and parking to maintain the serenity of the plateau throughout the year. Decision was taken to increase the level of Kaas lake to feed more water to Satara city.

## 4. Overview of year 2018

In the past 7 years, trampling of flowers by visitors and littering of plasticware has disturbed the unique flora and fauna affecting the aesthetics of the plateau. Once the sprawling beds of colourful flora of wild flowers, the famous Kaas plateau was now witnessing less bloom in 2018. Additionally, due to rapid forest fire incidents in the month of December and January, significant damage were caused to the flora.

Sunlight and rain are the two depending factors for flowering. Lack of one or both of these necessities led to less blooming of flowers in the year 2018 and the blooming season delayed from August to September's second week. However, despite the delay, visitors were flocking the site, especially during weekends.

There is a tradition of welcoming guests in Indian culture. Keeping the Sanskrit dictum '**Atithi Devo Bhava'** (meaning, guest is akin to god) in view, 15 tourists from Japan were welcomed by JFMC members - Somnath Jadhav, Dnyaneshwar Akhade and Forest department.





Image 3: Tourists from Japan were welcomed by JFMC members

Restricting visitors' access through fencing, managing traffic, setting discipline through penalties and effective land-use management (95% land is under conservation and only 5% to be used as a public zone) are some of the efficient steps taken by JFMC in the Kaas Plateau. There is also engagement of the local community to make these conservation efforts sustainable.

**4.1 Management of Kaas Plateau:** The Forest department, Joint Forest Management committee (JFMC) and local villagers-turned-volunteers are working on conservation, security and maintenance of Kaas plateau.

This management of Kaas has been divided into following six sections and one head has been appointed for each section:

**Water supply:** A dedicated team is handling the water related activities. Water tankers are brought from Satara to supply water for toilets during heavy inflow of tourists to maintain hygiene and sanitation in the area. To reduce plastic bottle waste, 60 litre mineral water cans are kept for tourists during the flowering season.

**Waste management:** For sanitation, solid waste management and sewage waste disposal a dedicated team is appointed. Carriage comes from Satara for proper collection, disposal and treatment of solid waste.

**Security (Day and Night Shift):** Six people have been designated to guard the entire plateau of around 1,800 hectares. After the fire incidents in the plateau, the number of guards were increased to 12 for regular patrolling. Six guards in the day and six guards in the night have been assigned for the same.

**Guide:** Committee encouraged the local villagers to pursue employment opportunities, especially as tourist guides and maintenance team.



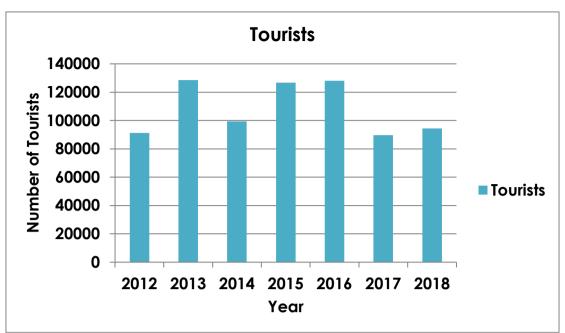
**Parking:** Parking of cars and other vehicles is not allowed on the plateau. Around 500 metres from the plateau, parking space is provided for all vehicles and the State Transport has provided mini buses that ferry the visitors to and fro from the site at a minimal cost. **Office:** A temporary facility is set up for administration, maintaining records, managing online booking data-list and solving the queries of visitors.

**4.2 Tourism:** Since the declaration of the Kaas Plateau as UNESCO World Heritage Site in 2012, hundreds and thousands of tourists are visiting this tourist spot. Consequently, this increase in the number of visitors has put plateau in the risk of being polluted and destroyed.

The Committee developed a special website for providing tourists with information pertaining to the plateau, as also for registering themselves for their next visit. Forest officials were keen on making online booking mandatory for all days. Currently, online booking is compulsory for Saturday, Sunday and Public Holidays. Officials allowed the sale of tickets on the site but restricted the daily number of visitors to 3,000 and in case of crowd or traffic jam, tourists are restricted at Satara city itself with the help of police and volunteers. The revenue generation was on the rise till 2016. In 2017, due to the unfortunate incident of landslide on the hilly road leading to the plateau, the season for tourism was shortened by 2 months. This affected the number of tourists and resulted into generation of lesser revenue.

In the year 2018, the plateau received online booking of 39000 visitors and counter ticketing of 53342 people.

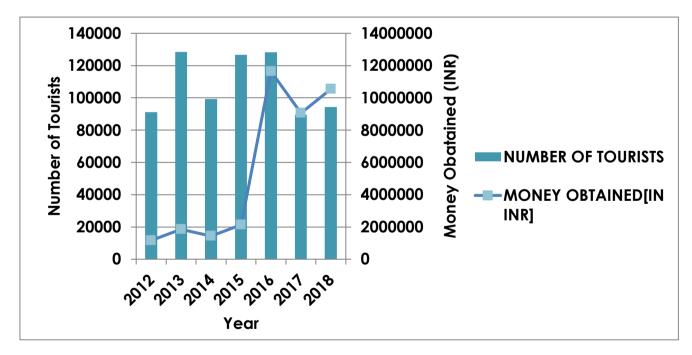




Graph 1: Number of tourists visited the plateau during 2012 to 2018

## 4.3 **Revenue Generation:**

The revenue generation from the year 2012 up to 2018 was as follows:



Graph 2: Number of Visitors vs. Annual Revenue



	Online visitors	Offline visitors	No of students	No of Senior citizens (Online)	No of Senior citizens (Offline)	Fines collected	Bus service	Books sale	Rickshaw service	Total Revenue Generation
No of visitors	39,868	50,614	3,905	2,746	6,863	16	ı	ı	ı	
Revenue	39,86,800	50,61,400	74,100	609'6		1600	12,48,990	1,67,500	3,780	1,05,53,779

Revenue generation during flowering season : 01/09/2018 to 31/10/2018

Image 4: Revenue Generation

## 4.4 Revenue Allocation:

The fees collected from visitors during the season is used for maintenance and salaries of the villagers working there under various responsibilities. In the year 2018, INR 6,00,000 was spent on developing space for parking. There are activities, which are planned and submitted for technical sanction from government. The total revenue obtained gets distributed in the following way:

1. 50% of the entire revenue is used for the development of Kaas Plateau

2. 30% of the entire revenue is used for the development of six villages that mostly includes, road repairs, water supply. It is also used for management as well as infrastructural needs of schools in these villages.

3. 20% of the entire revenue is saved as fixed deposit in the IDBI bank (Industrial Development Bank of India).



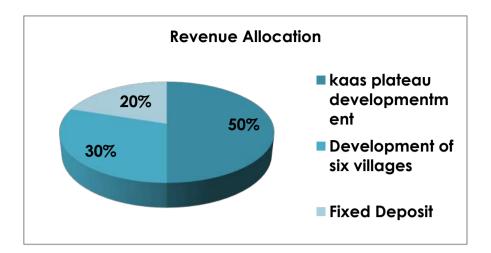


Image 5: Revenue Allocation

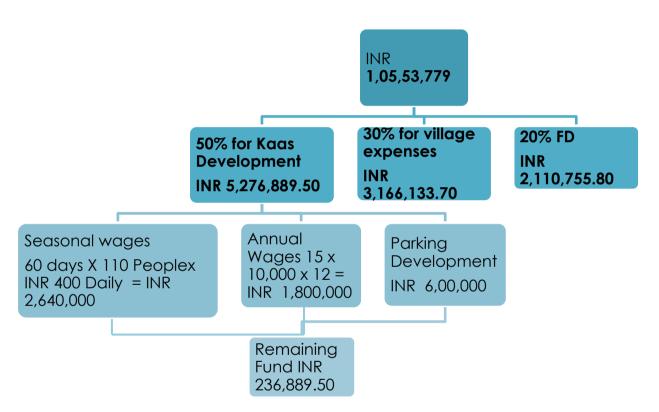


Image 6: Revenue utilization

## 4.5 Community Development:

Over the last five years, JFMC has supported member-villages to execute household and public welfare activities.

Gram Sabha of six villages presented their proposal to JFMC. Those proposals were sent to the Forest department. Since then, 30% of the revenue is used for development of six villages.



Before the start of the season, employment forms are filled up by the villagers and based on their skills and capacities, the work type (like, duties for the cleanliness, maintenance, tourist guides, patrolling, parking on the site, tourist guides) gets allocated. The upper age limit to work in Kaas for men is 70 yrs and women are 50 yrs. There has been an increase in the employment among the community members. During the season, approximately 100-140 local people are employed and 20-25 people continue to work during the off-season for the maintenance and patrolling. The daily wage of INR 400 is provided to them.

## 4.6 Key activities in 2018:

The following activities took place during the year 2018,:

1. Private vehicles were stopped on the plateau. Parking was made available at a distance of 100 meters from the Plateau. Bus facility for pick-up and drop was arranged at the minimal cost from parking place to Kaas plateau and vice-versa.



Image 7: Parking area for tourists

- 2. Workshops were conducted for all women in villages to make homemade food products to gain some additional employment by various non-profit organizations.
- 3. Mr. Milind Sawant<sup>3</sup> distributed computers to the Zilla Parishad Primary School, Ekiv village.



<sup>&</sup>lt;sup>3</sup> A businessman from Mumbai in Maharashtra state of India



Image 8: Distribution of computers

4. In the joint operation of the Executive Committee of Kaas Plateau and Forest department of Satara, free notebooks were distributed to the students of Primary and Secondary Schools of Zilla Parishad. Important messages are written on notebooks as general reminders to keep awareness instilled among the students.



Image 9: Distribution of free notebooks

## 5. Interaction with the local Individuals:

The TERRE-team visited the villages and had an informal interaction with the local people to understand their views on the growing tourism on the site. Following are the two key interactions:

## Ankush Ahire, Atali Village

Ankush Ahire is working as a driver for regular patrolling on the Plateau. His wife is an active member of JFMC. Both of them talked about their experience as JFMC members. He said the villages have benefited greatly because of the tourism. The tourists come here to witness the flowers and explore local food. Therefore, employment opportunities have increased and the villages are also getting visibility among the tourists. The JFMC meetings are conducted twice a month. Important discussions of the



meetings are then informed to the rest of the villagers for wider understanding and effective cooperation for its implementation.



Image 10: Talk with Ankush Ahire

## Sangita Gore, Ekiv Village, Sarpanch (Head of the village)

JFMC and local people are working for the maintenance, cleaning and security of the plateau throughout the year. There are dustbins and toilets provided on plateau for the tourists. The waste that is generated on and off the season is collected weekly and sent to Satara city for proper disposal, treatment and recycling.

Our ancestors have followed the traditional ways to conserve the biodiversity of the plateau. We should follow the same. Sangita feels that the fencing has restricted the movement of arazing animals, which may have resulted in the reduction of flowers during blooming season. This however cannot be fully agreed, as the committee has ensured that grazing is not restricted completely on the plateau.



Image 11: Talk with Sangita Gore



## 6. Interaction with the Stakeholders

Ever since, Kaas was declared as the World Natural Heritage site, the local community has received proactive guidance from various individuals and organizations for sustainable tourism and management. These collaborations. Following are the instrumental stakeholders who have been actively engaged in the protection of Kaas plateau:

## Prerna Agarwal, Independent Researcher (Recreation Ecology), Founder-Ecosphere Connect (a consultancy firm providing solutions for biodiversity conservation)

Prerna Agarwal has been doing her research work on the impacts of mass tourism on Kaas plateau since the year 2012. She has made a great contribution in regulating community-based tourism on Kaas plateau, such that the negative ecological impacts reduced. while are providing solutions towards alternative livelihoods to the local communities. By training the local villagers as eco-guides, helping set up homestays, and run sensitization programs, she has demonstrated that ecotourism can work through joint collaborative efforts. She has also developed a booklet for guides, which reflects the vast local knowledge regarding Kaas and its surrounding habitats.

According to her, the biggest challenge at hand is restricting the visitor numbers based on the ecological carrying capacity of the plateau, and regulating their movement strictly on the designated paths only. According to her study on visitor trampling impacts, some endemic species such as Utricularia purpurascens cannot tolerate even ten human passes, while most species are severely damaged by 500 human passes! If 500 people can cause such damage, the impact that hundred thousand visitors can cause every year is beyond imagination. She pointed out the catastrophic effect mass tourism will have on the soil seed bank and on the rare, endangered and threatened species if tourist numbers are not controlled. At the same time, certain invasive species have started growing on the plateau, posing a serious threat to the endemic species. Populations of endemic species like Cynoglossum malabaricum is fast dwindling. She further stressed the need to have long term scientific research to understand impacts of anthropogenic disturbances on populations of these unique habitats. One of the biggest challenge still existing is the Solid waste management in the new tourist spots mushrooming around Kaas plateau. Since, this is an area close to Koyna Wildlife Sanctuary, improper waste disposal can have serious effects on the wildlife of this region. Proper



regulation of tourist numbers, effective collaborations with authorised waste management stakeholders, smart outreach strategies and setting up of a research infrastructure to actively find solutions to the challenges ahead were some important recommendations shared by her. She added that though the functioning of the JFMC has improved significantly since 2012, a lot still needs to be done in terms of protecting the Outstanding Universal Value of this UNESCO World Heritage Site.

Her work was funded by the Rufford Foundation (Year 2012-13), Inlaks Ravi Sankaran Small Grants (Year 2014-15) and the Satara Forest Department (Year 2014-15).

## Somnath Jadhav, President, JFMC

While sharing his experience of working at Kaas as the President of JFMC, he said, "We have focused on three areas while working here. First, to protect the plateau. Second, to provide basic facilities to tourists like mineral water, toilets and provision of field guides to inform tourists about conservation of plateau. And third is employment generation for the local communities to work as tourist guides, guards, etc." The Deputy Conservator of Forests in the year 2017, Mr. Anil Anjnkar has honoured the committee for its excellent performance.

	ैयनभा	सक, सालारा वन विभाग, सालारा यांचे कार्यालय. तन ' गोवॉली रोपगाटीका धरिवर, सालारा ४४९९ ७०९ 😤 (०२९६३)३२७७५८ - फास्स : (०२९६२) ३२००५८ Latacd\$£0mail.com & https://www.mutaforest.com.im
		सातारा दि: २४/११/२०१७
		प्रसाणपञ्च
अल्प कालावर्ध प्रस्थक्षात अंगर स्वच्छतागूहे, नि वेतानाच आपण् ठेनून जैवविवि समितीच्या पदा आर्थिक शिस्त आपण व जैवविविधता सं प्राप्त फर्रुन द्या	गित आपण सन नाल देखींल आ नेपारा शेवस, प्र ग आयश्यक प्रम प्राययपा संरक्षणा पिका-यांगध्ये के पिशेष अभिनंबनी तरस पुष्प पठाशा वियनपुरक धोरण ाल या अपेक्षेसह	कास धठार कार्यकारी सहिते ' सी स्वापना झाली. अर्थय २०१७ च्या प्रयंटन इंगासारे नेटके नियोजन फेले च हं गललेत. पुरेश अध्येने व सोग दिकाणी प्रनी केलेती त्यांसी बरेश या पर्यटकांसाठीच्या शुविधा उपराल्य करू माण द परिशिक्ष गाईबस् व युरसा स्वकार्यी उपलब्धा माज देवतील विशेष लख्य युरसितंत. आपण आपस्या कलेरे कागावे वाटप व समितीच्या कामकाजामध्ये देवलेली 10 आहे. 10 प्रयंटन नियामनामध्ये रापुठे देवठील पर्यटक केहीत व ण असलंबून या जागतिक नैसॉरिक वारसा स्वकारा सेवर आपलगा वा बर्षीच्या उल्लेखनीय कामनिरी सुरस आपले
हर्दिक अमिनंदन		-#Mini
हर्दिक अभिनंदन		(अ.मो.अंजनकर) उपवनशंरक्षक, स्रातारा चन्त्रियान, सातारा

Image 12: Certificate of Excellence



Image 13: Talk with President of JFMC



## Vitthal Kadam, Member, JFMC

Vitthal Kadam from Ekiv village is an active member of KFMC. He said, in order to provide every village an opportunity of Presidency/Chairmanship, they have decided to draw lots to select the President and Chairperson.

There are 130 - 140 people working in Kaas Plateau on daily wages. JFMC members have created six sections (water supply, waste management, security, guide, parking and administration office) with the help of local people. One head has been appointed for each section wherein, 5-6 local people are deployed under his/her supervision for designated departmental works.





Image 14: Field visit and talk with Mr. Vitthal Kadam, Member of JFMC

## Asha Badapure, Member, JFMC

Asha Badapure, Member of JFMC (Kasani village) shared her experience of working in JFMC. She said workshops were conducted in the villages for all women on homemade food products to gain employment by the Forest Department and NGOs.



Image 15: Village Visit and Talk with Asha Badapure, Member, JFMC



Most of the villagers get employment during the flowering season. Families who own farms continue to work in their respective farms in off season. However, the man-animal conflicts have always been a challenge for them, especially with the pigs destroying their crops. The villagers are seeking solutions to this problem to sustain them during non-flowering season at Kaas.

## Shekhar Mohite, Sir Lal Bahadur Shastri College, Botany Department, Satara

He has described 12 months flowering period [month wise] in his book "Flowers of Kaas Plateau". He has noted the peak flowering period as 5th to 22nd September, the maximum flowering season being from August to September. There are no drastic changes on the plateau since its inscription as World Heritage Site. For the year 2019, the college (Sir Lal Bahadur Shastri College) is preparing the team of students (only males) as guides in English language during the blooming season. He also emphasized on the importance of allowing animal grazing to certain extent before the beginning of the season as it helps in the seed dispersal.

## Shailendra Patil, Local Journalist

Mr. Patil said that the villages of JFMC have problems of the stakes percentage with each village. Due to growing number of hotels, there is a huge problem of waste management. Air pollution is increased due to the burning of plastic for the stove usage for picnics/parties. The bypass road of Kaas plateau from Ghatai road to Kaas village is still pending for last 2 years due to political interference. Also, there is no police station/chowki around Kaas for any help in times of emergencies. JFMC helps to pay initial fees of LPG gas. He suggested that the deposit scheme for plastic bottles can reduce the problems of plastic on the plateau as well as the Kaas Lake.

## Dr. Bharat Singh Hada, Deputy Conservator of Forests, Satara

Under the guidance of Dr. Bharat Singh Hada, Deputy Conservator of Forests – Satara, JFMC is working with local people to identify challenges and seek solutions in various areas, such as additional employment opportunities for the villagers throughout the year and expanding the tourist sites.

He said as the designated parking space is provided for all tourist vehicles and the State Transport Department has provided mini buses for carrying tourists to the flowering site, 80 – 90 % pollution has reduced. We have tested the battery car on Kaas Plateau, but it is difficult to operate due to undulated roads. From next year, Forest department plans to start bullock



carts from plateau to Kaas Lake to provide traditional experience to the tourists. This will also help in preventing air pollution.

Dr. Hada strongly feels that there is a tremendous need to do structured and organized scientific research on Kaas Plateau. Many students and young researchers have been coming to get permission for study/research, who mostly submit partial reports, which does not give us any advanced information. For last three to four years, the growth of some species of flowering plants on the plateau could be on a decline or even new species could be growing, therefore a scientific research on the key issues under the guidance of experts will be on priority. The findings of the research would contribute to restore the unique universal value and touristic values of the place.

He emphasized that Forest Department with the help of JFMC and local people aims to continue in putting its huge efforts to conserve the plateau, which is a home to some rare, endemic and threatened species of flowering plants.

## 7. Progress and Challenges in the year 2018

## 7.1 Progress achieved:

- 1. The online booking is compulsory on Saturday, Sunday and public holidays. Authorities have allowed the sale of tickets at the onsite counter, but limit the number of visitors to 3,000 per day.
- 2. There are dustbins at regular intervals and 6 toilets on the plateau.
- 3. There are 32 water holes for animals on plateau.



Image 16: Water holes for animals at Kaas Plateau

4. This year, for the first time, the walkie-talkie was used to manage the tourists efficiently and avoided the chaos in the parking area.



- 5. Vehicles were not allowed on the plateau, and controlled nature trails were conducted on designated pathways in the tourist zones.
- 6. The number of tourists did not exceed 3000 on weekdays, except when people coming from long distance were allowed counter tickets for the visit.

## 7.2 Challenges yet to overcome:

- 1. There are alternative routes to reach to Kaas Plateau, which does not have security and checking post. This at times, have affected the number of tourists visiting the plateau and hence, no accurate data can be drawn.
- 2. Lack of employment in the off season.
- 3. During off season, even though there are dustbins and proper sign boards, small plastic waste such as fast food wrappers and chocolate wrappers are being disposed by tourists on the plateau.



Image 17: Plastic waste at Kaas Plateau

4. Recent popularity and sudden growth in tourism is at present the most serious threat, not only to the plateau but also to the surrounding areas. Kaas Lake is one of the major environmental issues in Satara District. Garbage of eatables and plastic bottles, plates, bags, etc has become common problems at Kaas Lake.



Image 18: Plastic waste at Kaas Lake





## 8. Future Plans of JFMC

- 1. Construction of pathways using jambha stone on the plateau to avoid people from slipping, getting hurt and also to protect the nearby plants.
- 2. Distribution of raincoats in the schools of member villages
- 3. Design temporary structure for providing shade to tourists during heavy rain
- 4. Design local food stall and souvenir stalls to generate employment opportunities for the local community. The revenue collected can be used for development of Kaas.
- 5. Increase the total number of tourists on plateau from 3000 to 4000 and limit the visiting hours for individuals to three hours in a day.
- 6. Create more home stay arrangements that will increase the revenue during flowering season (or in non-flowering season too).
- 7. JFMC is considering to charge INR 5 10 per individual for visiting Kaas Lake, which currently is an open access. This would help them to procure additional revenue and hence, depute the local villagers to maintain the lake clean and garbage-free.
- 8. Temporary tents can be built for the tourists to enjoy nature stay.
- 9. From next year, a bullock cart will be provided for the convenience of tourists to reach the plateau.

## 9. Community Dialogue 2018

Community Dialogue have been taking place under the leadership of TERRE since 2012, after the plateau was inscribed as a World Natural Heritage site. This annual event is organized to review and address the status of the issues faced by the community of Kaas, providing sustainable living for the conservation of biodiversity and economic development of the region.

The recent Community Dialogue<sup>4</sup> for 2018 in Kaas was organized at one of its prominent temple, Ghatai Devi Mandir.

Leaders and representatives from the Forest Department, Maharashtra Tourism Development Corporation (MTDC), Researchers, Academics, other NGOs and local media actively participated in the discussions and planning for the immediate as well as long term activities.



<sup>&</sup>lt;sup>4</sup> The Press Release of Community Dialogue 2019 is attached in Annexure



Image 19: Participants of the Community Dialogue for 2018

The communities from 6 neighbouring villages - Kaas, Ekiv, Atali, Kasani, Pateghar and Kusumbimura, all of which collectively constitute the Northern Cluster of the Western Ghats were the key participants of the dialogue.

Additional discussions also included the introduction and plans for contributions to SDGs and impacts of Climate Change on WNH and women's role in nature conservation.



Image 20: Rajendra Shende highlighting the objectives of the community dialogue





Image 21: Discussions initiated by the local community

## 10. Recommendations

- 1. Carrying capacity of public zone should be calculated to restrict tourists inflow and avoid human stress on the site.
- 2. The regular fees of INR 100 can be increased by INR 50 on weekends or small kids from 5 to 12 years can be charged with a minimal amount. This may aid in maintaining the tourists population.
- 3. Enhance understanding of World Natural Heritage sites and Kaas plateau among school students through poster exhibitions, essay competitions, etc to create awareness and consciousness to conserve the rich heritage that they have.
- 4. Local people believe that grazing and burning is important for more flowers on plateau and hence, these activities should not be stopped. However, since no baseline data is yet available, it is not prudent to make conclusions on the impact of these activities on the plateau diversity. There is in fact, urgent need for awareness and scientific research on these activities. It is important that local communities are well informed on the misconceptions for instance, grazing is undoubtedly crucial for grassland ecosystems. However, over grazing can be equally deteriorating on a long run.
- 5. There is a need to increase the strength of staff for better management of plateau. Additional staff should be deployed at Kaas plateau, Kaas lake, tourists spots during monsoon (June to November) for protection and conservation of the biodiversity.
- 6. A facility of first-aid centre should also be considered.
- 7. The Satara Hill Half Marathon, which is held annually in Satara attracting runners from all around India and elite athletes and running enthusiasts from all around the world, could be used as an opportunity to create mass awareness on Kaas as World Natural Heritage site and declaring it as 'no-garbage zone' for waste management.
- 8. Create self-sufficiency mechanism on site, for instance, instead of sending waste to landfill sites setting up of small recycling units of plastic



waste in villages or selling recyclable solid waste like old newspapers and plastic waste to recycling units/companies at reasonable rate will help them to generate more revenue.

- 9. Encourage the use of cotton bags, biodegradable plates, cups, and packing material on local food stalls and souvenir stalls.
- 10. There are numerous trekking and tour groups' offering camping packages for Kaas, Thodeghar, Sajjangad and surrounding places. It is the major threat to the rich biodiversity and natural habitats, as majority of them do not follow eco-tourism approach. Therefore, formulating eco-friendly policies in the context of trekking and camping could be very beneficial to empower the local people and also protect the biodiversity.

## 11. Conclusion

Though the Forest department, JFMC Local NGOs, researchers with the help of local people are taking efforts to conserve and protect the Kaas plateau, a long term mutual vision could serve in making this collaborative action more efficient.

Awareness among the local villagers is necessary to understand, enjoy and respect the beauty of Kaas plateau. Visitors also need to be sensitive about the vulnerability of such ecosystem while visiting the plateau, ensuring that no damage is caused by any of their activity.

A detailed scientific research needs to be carried out to understand the change in biodiversity over the years, i.e. species that may be no longer existing and species that could have invaded in the recent years. There should be a periodical observation for the invasion of exotic species on the plateau.

Waste management is another big challenge in Kaas. There should be a proper way of waste management that focuses not only on the disposal of the waste but solves the core issue of waste generation at the source. Kaas could be declared as 'No single-use plastic zone' to reduce and eventually stop the plastic pollution.



## 12. **NEWS**



# Scientists find rare freshwater diatom species at Kaas Pathar

By Himanshu Nitnaware, Pune Mirror | Apr 8, 2019, 06.00 AM IST



Ninastrelnikovia latertica (inset) was found in a pool on the plateau by researchers associated with Agharkar Research Institute (above) Finding could contribute to conservation of lateritic plateaus to save unique ecosystems

Scientists at Agharkar Research Institute (ARI) in the city have recently discovered a new freshwater diatom (algae) species, Ninastrelnikovia lateritica, from a temporary water pool located in the lateritic plateau of Kaas. This work was also published in Phytotaxa, a peerreviewed international scientific journal for botany. Kaas Plateau, also known as Kaas Pathar, is situated 25 km west of Satara and is famous for its rich diversity of flowers during the monsoon.

"The unique characteristic of Kaas is that it holds a different ecological system. Many micro-organisms and endemic, endangered plants and animals, live and flourish at this place in rainy months," said Karthick Balasubramanian, a scientist at ARI.

Researchers found that the new species is specific to laterite areas, which is an important discovery in that it will help in the conservation of laterite plateaus and their biodiversity. "Such spots already face the threat of urbanisation. We stand to lose unique biodiversity even before we fully discover it," informed Surajit Roy, a postdoctorate fellow (SERB N-PDF) at ARI, who was a part of the finding and study, wherein 'the ecology of diatoms in rocky pools of the Western Ghats' are being researched. This project is funded by the Science and Engineering Research Board (SERB).

Roy found the rare monospecific genus Ninastrelnikovia in 2014, and also traced its presence to North America, Sumatra, New Jersey, Brazil, Namibia and Laos. The first species was found in 1937 in Indonesia.

"Last year, a group of Russian and American scientists discovered the second species of the genus in Laos and Vietnam. Shortly after, we are also able to find a third from the Western Ghats. This connects the missing link to understanding the biogeography of these unique microbes," Roy said.

Kaas Plateau is visited by thousands of tourists between June and October every year for its beautiful landscape. "There are many pools, streams, rivers and other small water bodies that become home to biological life. These small ecosystems are completely different from other water systems," added Balasubramanian.



## **Business Standard**

## Less blooms on Kaas plateau worries authorities, visitors

#### Press Trust of India | Satara January 28, 2018 Last Updated at 11:35 IST

Once a bed of colourful flora, the famous Kaas plateau in Maharashtra is now witnessing less blooms, worrying officials, tourists and nature lovers alike.

The plateau, recognised by the UNESCO World Heritage Committee as a heritage site in 2012, is home to around 350 flowering plants, including some rare and endemic species.

With the flowering already going down, a couple of fire incidents last month in the area, causing a damage to the flora at the site in Satara district, has now set off alarm bells for the administration.

The state government has thus decided to take up a slew of measures, like better guarding of the place and inviting researchers to study why this picturesque site in the Western Ghats is losing its blooms, which were a big tourist attraction.

According to forest officials, human negligence, possibly lit cigarettes, could have caused the twin fires that gutted a portion of the world famous plateau recently.

"The forest department, along with a joint management committee of forest officials and local villagersturned- volunteers, has now decided to take certain safety measures to avoid incidents which could endanger the flora of the Kaas plateau," the range forest officer, Sachin Dombale, said.

He said those guarding the plateau have now been provided hand-held pressure water sprayers.

"The plateau does not have big trees or plants. It is actually a grassland, so even if the grass catches fire, it can be doused with the help of these sprayers," he said.

Earlier, six people used to guard the entire plateau of around 1,800 hectares. After the fire incidents, now 12 people are manning it in the day and six at night, he said.

Now, the visitors are frisked at the entry gate of the tourist site and are not allowed to carry inside combustible items like cigarettes, matchbox or lighters, he said.

Somnath Jadhav, the president of the joint committee, said they have also started putting up "firebreaks" along the roadsides.

"For the firebreaks, we burn the vegetation and grass in five metres of area along the roadside, so even if someone throws a combustible object, there won't be a fire," he said.

However, due to unavailability of power supply in the forest area of the plateau, they have not been able to

put up CCTVs for keeping a watch.

"But, we are now thinking of using solar panels to address the power issue, Jadhav said.

He said the gram sabhas of five villages (the locals of which are part of the committee), have also decided to put forth their proposals to safeguard the plateau and conserve its biodiversity and flora.

One of the committee members said the state government should provide funds for proper maintenance of the site.

"We have to depend on the fees collected from visitors during the season, which is only for two months (September and October), to pay for the maintenance and salaries of the people working to guard the place," he said.

"We seek government's attention, cooperation and funds so that this plateau of flowers can be conserved," he said.

Jadhav said for last three to four years, the growth of some species of flowering plants on the plateau is on a decline, thereby calling for a study to find out its reason and restore the beauty of the place.

"We are now planning to write to various universities in Maharashtra to send some researchers and students of botany to study the reason behind this," he said.

"We are making all-out efforts to conserve the plateau, which is home to some rare, endemic and threatened species of flowering plants, as it would then also lead to an increase in the number tourists at the site," he added.



## 'Kaas Plateau' is inviting you! And the best time to visit here is now.

Last Updated Aug 25, 2018 Q 0



September's first week is the best time to see 'Maharashtra's Valley of flower' as entire plateau covered by various beautiful

flowers blanket. The forest department has announced that the 'Kaas Plateau tourism season' will be started from 1 September. The forest department had recently organized a meeting to plan and manage tourists.

It is one of the most beautiful places in Maharashtra that deserves your visit. Kaas plateau's flowers not blown yet due to the continuous raining from last one month, but now flowers are taking fresh bloom. So the first week of September is a good time to visit here. At other times of the year, the plateau is covered with soil and grassy patches. So don't miss the season, just pack your bag and leave.

The 'Kaas Plateau' (Kaas Pathar) is situated 25 kilometers away from the Satara and 280 kilometers from Mumbai. It is also known as 'Maharashtra's Valley of flower'. It is famous for various seasonal wildflower bloom in August and September of every year. It becomes a UNESCO Natural Heritage Site from 2012 and after that, it becomes very famous among tourists.

There are more than 800 varieties of flowering plants, shrubs and many species of butterflies. Flowers here rarely rise more than a foot. Over 10 square kilometers area is covered by colorful flowers, which make very unique and attractive to this place. It is the sight to experience the beauty of nature.

The state government has announced a plastic ban. Earlier on the plateau, the forest department had imposed restrictions on the plastic use of tourists. Forest officials will be more alert and take action against the tourists. Tourists will be checked near the entrance. Therefore, the forest department has urged the



18 JANUARY 2018 Last Updated at 9:32 PM | SOURCE: PTI

## Human negligence likely cause of Dec fires at Kaas plateau

f 💟 👂 in 8

Pune, Jan 18 Human negligence, possibly a cigarette butt, could be the cause of two fires that ravaged a portion of the world-famous Kaas plateau in Satara in December, forest officials said today.

The plateau, a UNESCO World Natural Heritage site since 2012, attracts visitors from across the globe who come there to see hundreds of varieties of flowers growing over a 1.800 hectare area.

"On December 21, a fire broke out at a portion of the Kaas plateau not frequented by tourists and an area of around four hectares was damaged. The fire was successfully doused by the forest officials along with local residents," a forest official from Satara division said.

He said that a case under the Indian Forest Act, 1927 had been registered against unidentified persons

The second instance of fire was on December 30 and it destroyed an area of six hectares and a case had been registered in this incident as well, the official said.

"We suspect that the fire were caused by human negligence or someone might have set the area on fire on purpose. There is also a possibility that a discarded cigarette butt started the fire," he said.

# Slushy paths on Kas plateau now paved with red bricks for safety

Sandip.Dighe @timesgroup.com

Kas (District Satara): Mud bricks now line the most walked on paths on Satara's Kas plateau

The Kas Plateau's Executi-ve Committee (KPEC) has laid the red bricks called 'chirachi dagad' in Marathi for tourists to walk on safely. The paths are slushy after the rain and visitors often tend to skid and slip. The work will be completed in two phases by 2021.

The plateau is a blodiversity hotspot known for its seasonal wild flowers and species of endemic butterflies. On an average one lakh visitors come to see Kas's flowers every year in August and September.

Range forest officer R M Pardeshi of Medha forest range told TOI, "These pathways are

\*31 July 2019

> The plateau is about 25km from Satara city and 145km from Pune >It is under the Sahvadri subcluster A UNESCO heritage site since 2012

being constructed as per the UNESCO norms. The committee has not used cement for the work. These bricks are installed on unpaved roads so that se nior citizens and children will not fall at the spot.

We identified the risklest and most frequently used paths. Last year, over a 100 tourists, mostly senior citizens and children, fell. When there is no proper laid down path, and to



of the Western Ghats types of flowers, shrubs and grasses > Orchids bloom for a period of 3-4 weeks in September

> avoid skidding, many tourists enter the main fields and trample upon the flowers. Hence, the mud brick tracks were laid." Somnath Jadhay presi dent of the committee, told

TOL. "The flowers will become extinct if wedonot takeenough care of the plateau. Visitors should not be allowed to walk into the fields. The committee's guards and forest department

officials need to manage crowd effectively," Rajendra Shende, former director of UNEP and chairman of Technology Education Research Rehabilitation for Environment

#### Online booking from Aug 10

The Kas Plateau Executive Committee (KPEC) will start online booking from August 10. This booking will be only for September: We are planning to open the biodiversity hotspot for tourists on August 16. Tick-ets will be given at the site," Somnath Jadhav said.

Visitors can now park about 2km from the site and go to the plateau by buses arranged for backpackers. "Many tourists would park along the roadside which led to traffic congestion in the area. We have now earmarked a parking area," Jadhay added.





प्रभात सातारा, शुक्रवार, दि. १ नोव्हेंबर २०१९ 3

कास पठार पर्यावरण केंद्र व्ह

डॉ. संदीप श्रोत्री: वनव्यवस्थापन समिती व तेरे पॉलिसी सेंटर यांच्या वतीने कास परिसरातील लोकांची सभा

सातारा, दि. ३१ (प्रतिनिधी)- कास पठार परिसरातील जैवविविधता टिकवण्यासाठी खूप प्रयत्न करण्याची आवश्यकता आहे. जैवविविधता हेच या पठाराचे वैशिष्ट्य आहे आणि ते टिकवण्याची आपणा सर्वांची जबाबदारी आहे. त्यामुळे कास पठार हे पर्यटन केंद्र होण्यापेक्षाही पर्यावरण केंद्र झाले पाहिजे, असे मत कास पठार परिसराचे अभ्यासक डॉ. संदीप श्रोत्री यांनी व्यक्त केले.

वनव्यवस्थापन समितीने गेल्या काही कास संयक्त वनव्यवस्थापन समिती आणि पुणे येथील तेरे पॉलिसी वर्षांत परिसतत चांगले काम केले सेंटा यांच्या संयुक्त विद्यमाने कास आहे. यापुंहे अधिक दक्षतेने काम परार परिसरातील गावातील लोकांची करण्याची गरज आहे. पर्यटकांची संख्या दरवर्षी बाढते आहे. या

प्रगती साधण्यावरोवरच पर्यावरण

जपण्यासाठी प्रयत्न करण्याची गरज

आहे.' कास परिसरात बारमाही

अभ्यासक व लोक आले पाहिजेत

असे श्री. हाडा यांनी सांगितले. या

जपण्यासाती

सभा बुधवारी घाटाई मंदिरात झाली, डॉ. श्रोत्री बोलत होते. तेरे पॉलिसी सेंटरचे प्रमुख व आंतरराष्ट्रीय पर्यावरणतज्ज्ञ डॉ. राजेंद्र शेंडे, उप बनसंरक्षक भरतसिंग हाडा, प्रा. संध्या चौगुले, 'प्रभात'चे निवासी संपादक श्रीकांत कात्रे आदी प्रमुख यावेळी उपस्थित होते. कास पटार फक्त फुलांचे पटार

परिसराचा विकास साधण्यासाठी नसून येथे दुर्मीळ बनस्पतींसह ब जैवविविधता प्राणी आणि पर्यावरणाची साखळी वनविभाग सातत्याने प्रयत्न करत मजबूत आहे. ती टिकवली तरच आहे. मात्र, केवळ वनविभागाने ठिकाणी जगातील पर्यटक व काम करून विकास साधणार नाही. अभ्यासक येणार आहेत, असे शासनाच्या विविध विभागांनी सांगून डॉ. श्रोत्री म्हणाले, 'स्थानिक समन्वय साधून या ठिकाणी चांगली

प्रभात

स्थानिक कार्यकर्त्यांनी गाईड किंवा होम स्टे उभारन आपली आर्थिक

श्री घाटाईदेवी मंदीर

सातारा ः कास परिसरातील घाटाईदेवीच्या मंदिरात खुधवारी कास विकासाच्या अनुपंगाने झालेल्या समेच्या बेळी स्थानिक कार्यकर्त्यासमबेत डॉ. राजेंद्र शेंडे व त्यांचे सहकारी.

कामे केली पाहिजेत, असे त्यांनी आहे, असे मत श्री. कात्रे यांनी व्यक्त सांगितले. कासला युनेस्कोचे बर्ल्ड हेरिटेज म्हणजेच वारसास्थळ म्हणून मान्यता मिळाल्याने जगभरातील अभ्यासक येथे येत आहेत. मात्र, पर्यावरण साखळी जपण्यासाठी या भागातील बांधकामे तसेच पर्यावरण टिकण्यासाठी जे आवश्यक आहे अशा गोष्टींवर नियंत्रण आणण्यासाठी काही विशिष्ट निकष असमे गरजेचे

केले. या परिसरातील विकासासाठी महिलांचा सहमाग बाढवण्यासाठी साताऱ्यातील हिरवाई संस्थेमार्फत मदत केली जाईल, अशी हमी संध्या चौगुले यांनी दिली. , पंतप्रधान नरेंद्र मोदी यांनी

सातारा येथील भाषणामध्ये कास फुले व वनराई धबधबा याचा उल्लेख करुन पर्यटन विकसित करण्याचे संकेत दिले, त्यानुसार कास पठाराची वैशिष्ट्ये संवर्धित करण्यासाठी काय केले पाहिजे व स्थानिक नागरिकांचा सहभाग वाढवण्यासाठी काय योजना आखाव्यात, यासाठी आजच्या सभेचे आयोजन करण्यात आले आहे, अशी माहिती डॉ. रावेंद्र शेंडे यांनी प्रास्ताविकात दिली. संयुक्त वनव्यवस्थापन समितीचे अध्यक्ष वजरंग कदम यांनी प्रमख पाइण्यांचे

कासची फलेच नव्हे तर इतरही जैवविविधता दुर्मीळ आणि सबोदनशील आहे. ती जपण्याची गरज आहे. हे काम स्थानिक ग्रामस्थेच चांगल्या पद्धतीने करू शकतात. कास परिस्माच्या विकासासाली सर्वांनी एकजटीने प्रयत्न करण्याचे आवाहन जावडेकर यांनी केले ग्वागत केले. माजी अध्यक्ष

एकजुटीने प्रयत्न

करा : जावडेकर

सभेच्या निमित्ताने ग्रामस्थांसाठी

दिलेला संदेश चित्रफितीद्वारे

यावेळी दाखवण्यात आला

केंद्रीय पर्यावरणमंत्री प्रकाश जावडेकर यांनी या

सोमनाथ जाधव यांनी सूत्रसंचालन केले. सभेनंतर डॉ. शेंडे व त्यांच्या सहकाऱ्यांनी ग्रामरथांशी संवाद साथला. प्रेरणा आगरवाल यांनी या परिसरातील जैवविविघतेचा अभ्यास करन केलेल्या संशोधनाची माहिती यावेळी दिली.



00

## लोकमत

## पष्प प ठार पय पयावरण कद्र बनव :

ग्रामस्थांशी संवाद । युनेस्कोला अहवाल देणाऱ्या पथकाची भेट

लोकमत न्यूज नेटवर्क

पेटी : 'जागतिक वारसास्थळाच्या यादीत समावेश झालेल्या कास पुष्प पठारावर दरवर्षी लाखो पर्यटक भेटी देत असतात. हे कौतुकास्पद आहे; पण हा परिसर पर्यावरणाच्या दृष्टीने समुद्ध आहे. निसर्गाचे वरदान लाभलेले आहे. त्यामुळे कास पठार पर्यटन केंद्राऐवजी पर्यावरण केंद्र बनवणे गरजेचे आहे,' असे विचार ज्येष्ठ पर्यावरणतज्ज्ञ डॉ. राजेंद्र शेंडे यांनी व्यक्त केले

जागतिक वारसास्थळाच्या यादीत समावेश झालेल्या कास पठार परिसरात तेर पॉलिसी सेंटर पुणे येथील जागतिक स्तरावरील पर्यावरणतज्ज्ञ, शास्त्रज्ञ, युनेस्कोला रिपोर्ट पाठवणारे डॉ. राजेंद्र शेंडे तसेच त्यांच्या पाच सदस्यीय पथकाने भेट दिली. यावेळी या पथकाने कास पठार कार्यकारी समिती सदस्य, ग्रामस्थांना पर्यावरणविषयक मार्गदर्शन करून



कास पठाराला दरवर्षी तेर पॉलिसी सेंटर पुणेचे डॉ. राजेंद्र शेंडे व त्यांच्या पथकाची भेट होते. या भेटीवेळी संपूर्ण कास पठाराची पाहणी करून त्याचा निरीक्षण अहवाल यनोस्कोला पाठवला जातो. यावेळी वनसंपदेचे रक्षण व संरक्षण, संतुलित पर्यावरणाच्या दृष्टीने कास पठारावर आणखी कोणत्या पर्यावरणपुरक सुविधा देता येतील, याचे ते मार्गदर्शन करतात.

- सोमनाथ जाधव, कास पठार कार्यकारी समिती सदस्य केले.

संवाद साधला.

दरम्यान, केंद्रीय पर्यावरणमंत्री प्रकाश जावडेकर यांनी व्हिडीओ चित्रफितीतून कास पठार समिती, सदस्य, कर्मचारी ग्रामस्थ, निसर्गप्रेमी यांच्याशी संवाद साधत मार्गदर्शन

त्यांच्यासमवेत दिना. उपवनसंरक्षक डॉ. भारतसिंह हाडा, डॉ. संदीप श्रोत्री, श्रीकांत कात्रे, संध्या चौगुले, सहायक वनसंरक्षक विश्वास भडाळे, मेढ्याचे वनक्षेत्रपाल रंजनसिंह

#### जावडेकर यांचे चित्रफितीद्वारे मार्गदर्शन

लोकसहभागातून वनसंपदेचे रक्षण व संरक्षण होत असल्याने कास पठार कार्यकारी समितीच्या कार्यक्षेत्रातील सहा गावांतील ग्रामस्थांचे कौतक जावडेकर यांनी व्हिडीओ चित्रफितीद्वारे केले. निसर्गाचा तोल न बिघवडता निसर्गाशी एकरूप करणारी अशी व्यवस्था आहे, असे व्हिडीओ चित्रफीतदारे जावडेकर यांनी बोलताना सांगितले. त्यातून त्यांनी समितीच्या कामाचे कौतुक केले.

परदेशी, कास पठार समितीचे अध्यक्ष बजरंग कदम, उपाध्यक्ष आशाताई बादापुरे, सोमनाथ जाधव, ज्ञानेश्वर आखाडे, पांडुरंग शेलार आदींसह सर्व समिती सदस्य, सहा गावांचे ग्रामस्थ मोठ्या संख्येने उपस्थित होते.

# कास पढारावर पर्यटकांचे लोढे थांबवावे लागती

Hello Satara Page No. 9 Nov 03, 2019 Powered by: erelego.com

#### संदीप राक्षे

सातारा, दि. १३ - कास पठाराच्या धारण क्षमतेइतके पर्यटक दरवर्षी येऊ लामले आहेत. आता ही क्षमता पणं झाल्याने पर्यटकांचे लॉरे धोपवाचे लागतील. त्याचवरोबर कासच्या पृष्प वनस्पतींची बीज बेंक करावी. पठारावर माहिती केंद्रावरोयरच पर्यटकांना शिस्तीचे भान करून देण्याची व्यवस्था आवश्यक आहे, अशी निरीक्षणे नोंदवली गेली आहेत. पर्यावरण तज्ज्ञ डॉ. राजेंद्र होंडे यांनी 'प्रभात' शी बोलताना ही माहिती दिली.

प्रभात कि

अख्याल तवार करता आहे. प्यायकाच्या ताढ्यण काच परिणाम पठाराकर होतो, याची निरीक्षणे या अख्यालाल मांडवती आहेत. तानेच कारस पठाएचा प्रात्मीय अभ्यास करणाऱ्या अन्यानकाची मंत्रोडी हा अहवाल तथार करताना विचारात घेण्यात आहंती आहेत.

पुणे येथील तेर पॉलिसी सेंटरचे डॉ. शेंड प्रमुख संचलक आहेत. या सेंटरने कास पठाराचे वार्षिक प्रगती पुस्तक तवार केले आहे. तसेच

हा अङ्ग्राल 'कुनेस्को'च्या वर्ल्ड हेस्टिव समिती, भग्रताचे पर्यावरण मंत्रालय तसेच विविध पर्यावरण राज्यांना पाठराला जाती. तेरे ायाय प्रयाशिष वयांगि प्रवेशता जोता, तर सेंटरने २०१८ या वर्षासाठी हा अत्रवात तथा केला आडे. डॉ. रावेंद्र डॉड बानी आंगिलले की, कासला एक सिसर्च सेंटर अस्तवे, त्यागण्ये इरूप अभ्यासकांच्या अनुभवाचा लाग करन पेतला पाढिने, परंटकांचा लोग खुप वावलोय, प्रत्यक्ष पठाराला घेट देतन २०१८ मा वर्षांचा अहवाल तवार केला आहे. फ्रांटकांच्या लोडगांचा सध्या तो ९४ हवारांपर्यंत गेलेला आहे. प्रत्येक जागेची भार सहन करण्याची एक धारण क्षमता

#### माहिती केंद्र उभारण्याची गरज

ज्येष्ठ पर्यावरण तज्ज्ञ राजेंद्र शेंडे यांचे निरीक्षण, कास पठाराची पर्यटक क्षमता संपली

भारता कंद्र उभारण्याची गरव जम्ममा वाणाव्या परंतनेका प्राहेतेकारों एक मालिती केंद्र उभागने, परंतन प्रथम शा केंदाकर देवीत. त्यांना वन्त्रपतिच्या पाहितीसरों परंतापत बर्तन करों आव पाहले, करें पाहले, त्यां कह मंग्रे आरंदीमब्बरी मालिती मा केंदामले रुण्यात घेरत. प्रताराध उपयाना विनियेग इसेन्द्रिकत आहते, परंत्रकां तुर्हिप्पा, पार्वस्था संपर्ध वाधर करण्यात प्रपारा विनियेग इसेन्द्रिकत आहते, परंत्रकां तुर्हिप्पा, पार्वस्था संपर्ध वाधर करण्या करात व्याप्त प्रतिक्र प्रतिक्र प्रवादा करण्याता ते त्यापत प्राप्ताची कर्म काठांगे, प्रताराध करात व्यवस्थापताल पर प्रापा, अशा पुरुषाही डॉ. डॉड यॉनी केल्वा, कातव्या व्यवस्थापताल युपारणा करण्याता आपन्छी बाज आहे. वन विषायाने परंत्रकांथ्य व्यवस्थापताल प्रुपाला रायांव्या, व्यास्यव्यापतात तर्क्य आति माहेतरांवा सत्याग वाधवाचा, अला अंग्रेखाही रायंत्रे व्यक्त केल्या.

असते. ही धमता 'कास'ता काठोकाठ पूर्ण झाली आहे. पाणुडे मुट्टोच्या दिवशी पर्यटकांचे येषारे तोंडे बोखल्पलाठी त्यांचे योग्य विधोयन करून सोमवार ते शुक्रवार तो विधागूत कसे वेतील हे पालवे तागेल.

पायान नागल. पटालावर असलेल्या काठी वनस्पतींच्या प्रवासी दरायेका अधिक बेळा पावरळी नुवजल्या गेल्वास त्या वनस्पती नष्ट स्रोताठ. तर काठी प्रवाली ५०० बेळा पावदळी तुवजूमझे त्यांना कोणताडी योका

पोइचत नाही, पर्यटकरेना या जनस्थती ओळखणे पोइस्त नाई. परंदरकांग या सरफली कोठळला कठीण आते. पासुठे नक्सलीती उनामी ओळखाप्यारेखा सोणतीरी स्नास्त्री यास्टळी पुरस्तती जागार नाई. वाची काकजी प्याप्ता गालापा आते. प्रराजार साध्याचा परंटरकांमचे पर्यास्त्रा पर्याप्तास्त्र पूर्वने विश्वानी करानी तनोत. अन्यथा याचे वर्षातेल. 'या प्रतायस सुंदर मुठे ते तोती.' आता विशिष दुर्देवनी सिक्षणा लागेल, अली भौती जॉ. सेंद बांनी व्यान्ड केली.



TERRE

## 34

## References

- 1. Kaas Plateau official website https://www.kas.ind.in/about.php
- 2. Community talk with local villagers.
- 3. Talk with JFMC members and President.
- 4. Talk with local reporters.
- 5. Communication with DCF, Dr. Hada.
- 6. Previous annual reports of TERRE Policy Centre <u>http://terrepolicycentre.com</u>
- 7. Talk with Mr. Shekhar Mohite, Botany Department. Author of the book "Flowers of Kaas Plateau"
- 8. Assessing the ecological impacts of tourism & developing ecotourism at Kaas plateau by Prerna Agarwal – <u>https://www.youtube.com/watch?v=9UCOkfP6ayl&feature=youtu.be</u>
- 9. Half Hill Marathon https://www.shhm.co.in
- 10. News articles from local news media: Pudhari, Lokmat, Prabhat etc.
- 11. Video Message by Hon. Prakash Javadekar, MoEF&CC and Minister of I&B –

https://www.youtube.com/watch?v=fOolzoUKXqE&t=1s

12. Media Coverage of Community Dialogue, 2018: https://youtu.be/yvkvzmxqW-4



## Annexure

## **Press Release**

## **Community Dialogue for 2018 in Kaas Plateau**

### Bringing communities together for the of UNESCO World Natural Heritage site

"The People from six villages of Kaas Plateau working together to conserve its unique biodiversity and outstanding universal value of wild flowers is a great example of Sustainable living", said Hon. Prakash Javadekar, Minister of Environment, Forest and Climate Change (MoEFCC) and Minister Information Broadcast (IB), while inaugurating the Annual Community Dialogue on Kaas Plateau, near Satara today. "This is precisely the message of PM Modi, Sabka Saath Sabka Vikas" added Javadekar. He was speaking to the Forest Guards and villagers representing the Joint Forest Management Committee (JFMC) from New Delhi via video.

TERRE Policy Centre in close association with JFMC of six villages - Kaas, Ekiv, Atali, Kasani, Pateghar and Kusumbimura organized the Annual Community Dialogue with the key objectives of reviewing the progress, threats related to climate change, overcrowding of tourists and opportunities for the sustainable development of the plateau. Since the inscription by UNESCO of Kaas Plateau one of the 39 serial sites of Western Ghats as World Natural Heritage in 2012, the villagers there have followed good practices and demonstrated how conservation of environment and the inclusive development can go together. All the decisions including, allocation of income for activities like training and employment of forest guards, actions for bio-diversity protection, promotion of homestay and tourism-business, sustainable transport and enhancing the cleanliness and facility management for the plateau are taken by JFMC.

TERRE Policy Centre has been tracking the trends and mentoring the JFMC jointly with Forest Department.

"We are facing challenge of tremendous influx of tourists. However, we are benefitting from such community dialogues to address the challenges and to manage the site", said Bajrang Kadam, President of JFMC, Kaas.

"More and more species of flowers are getting into the red list and in danger of extinction. There is an urgent need of research on these trends and impacts of climate change. Without such research, we will not be able to take action on



conservation in the right direction", said Rajendra Shende, Chairman TERRË Policy Centre and Former Director UNEP, who moderated the discussions. "It is heartening to see how the villagers work together with nature even though they have difference of opinion. In a way, they are mini-democratic communityparliament. There is a need to establish networks of 39 sites of Western Ghats starting with 4 sites in Maharashtra - Kaas, Koyna, Chandoli and Radhanagari to share the information and experiences", Mr. Shende added.

Dr. Bharat Singh Hada, DCF Satara stated, "Annual Community Dialogue is a platform for exchanging ideas on conservation of forest-biodiversity and plan for the sustainable tourism". He offered help of the forest department to encourage scientific research on wildflowers.

Dr. Deepak Harne, Regional Manager MTDC Pune in his letter to JFMC on the occasion wrote, "*MTDC will proactively support local people for running home stays and participate in Mahabhraman schemes*". The scheme provides a unique experience to all the visitors coming from different walks of life.

Mr. Shrikant Katre, Resident Editor of Prabhat and the Chief Guest for the meeting suggested early identification threats to the wildflowers. Dr Sandeep Shrotri, an avid conservationist and nature-author said, "*There is an urgent need to take action in establishing a world-class interpretation center and research facility*". **END** 

## Note to the editors:

TERRE Policy Centre publishes the Annual Report Cards (ARC) voluntarily right from the year 2013. The 2018 report recognizing the cumulative efforts of the Joint Forest Management Committee (JFMC), Forest Division of district Satara of State Government, local community, researchers, experts and journalists will be published soon in the month of November. The Annual Report Card is an important document that tracks the progress of the management of the site and provides recommendation to conserve the site in the coming year.

**TERRE Policy Centre** is a non-profit, non-partisan and independent organization dedicated to sustainable solutions to our developmental imperatives. TERRE also is the abbreviation for 'Technology, Education, Research and Rehabilitation for the Environment.' TERRE strives to reach all strata of society, particularly the young generation and people at the bottom of the pyramid with



capacity building tools on energy and food security. Its motto is: "To think is good but to act is better".

Contact TERRE Policy Centre : Rajendra Shende / Dinah Gengmei Phone : 020 2544 8650 / 8488 Email: <u>shende.rajendra@gmail.com</u> <u>dinah.gengmei@asia.com</u>

**Contact JFMC :** Bajrang Kadam / Somnath Jadhav **Phone :** 9922113463 / 7020440754



# Field Visits, Community Dialogues, Data Compilation & Annual Report Card By:

### Oversight:

#### Rajendra Shende, Chairman TERRE Policy Centre

- SDGs, Climate change, Social Innovations

Former Director in the United Nations Environment Program (UNEP) and presently Chairman of TERRE Policy Centre, a global think-tank and action platform for implementation of United Nations SDGs and address effects of climate change. See: rajendrashende.com

### Expert Team:

#### Dinah Gengmei, Project Leader TERRE Policy Centre

- Environment, Sustainable Development and Climate Change

A post-graduate in Environment Science, she is working on Smart Campus Cloud Network project (<u>sccnhub.com</u>) that aligns educational campuses to contribute in UN Sustainable Development Goals. She is also working closely with AICTE and UGC in projects related to eco-friendly and sustainable campuses.

#### Anuja Gurjar, Assistant Professor Sinhgad College of Architecture

- Environment Architect and Intern TERRE

A post-graduate in Environmental Architecture, she is an IGBC AP (Indian Green Building Council Accredited Professional). Following the path of humanity, she has paved a road to social service by helping blind students. From last seven years, she is participating in painting exhibitions.

#### Neha Potnis, BSc. Biotechnology

- Pursuing Master's in Bioinformatics and Intern TERRE

She aspires to become a researcher in biology in future. She believes that humans should be more aware of the current climatic conditions and thereby, work towards not only in protecting the environment but strengthening the awareness. She loves to travel and explore the nature.

#### Akshay Kulkarni, Pursuing Master's in Bioinformatics

- Bachelor's in Commerce (B.com) and Intern TERRE

He is an avid for nature and after completing a bachelor's course in Computer Application, he is currently working with Ecological Society to spread awareness on nature conservation and restoration of natural resources.

### Acknowledgement:

Dr. B Hada, Dr. Sandeep Shrotri, Shrikant Katre, Wishwas Bhadale, Prof. Sandhya Pandurang Chougle, Prerna Agarwal, Somnath Jadhav, Vishnu Kirdat, Vimal Shingare, Asha Badapure, Shrirang Shinde, Sai Kaushik Kodali, Sourav Dutta, Bhaskar Godbole, Dhanraj Garad & Representatives of Six Villages: Kaas, Ekiv, Atali, Kasani, Pateghar & Kusumbimura.



## Rajendra Shende,

Chairman shende.rajendra@gmail.com Mobile No:- +91 8975657235

## **Dinah Gengmei,**

Project Leader dinah.gengmei@asia.com Mobile No:- +91 9561178060

## **TERRE Policy Centre**

306, Multicon Square, Near Mehandale Garage, Erandwane, Pune 411004, Maharashtra, India. Fixed line +91 20 25448650, +91 20 25448488 Web: www.sccnhub.com, www.terrepolicycentre.com

