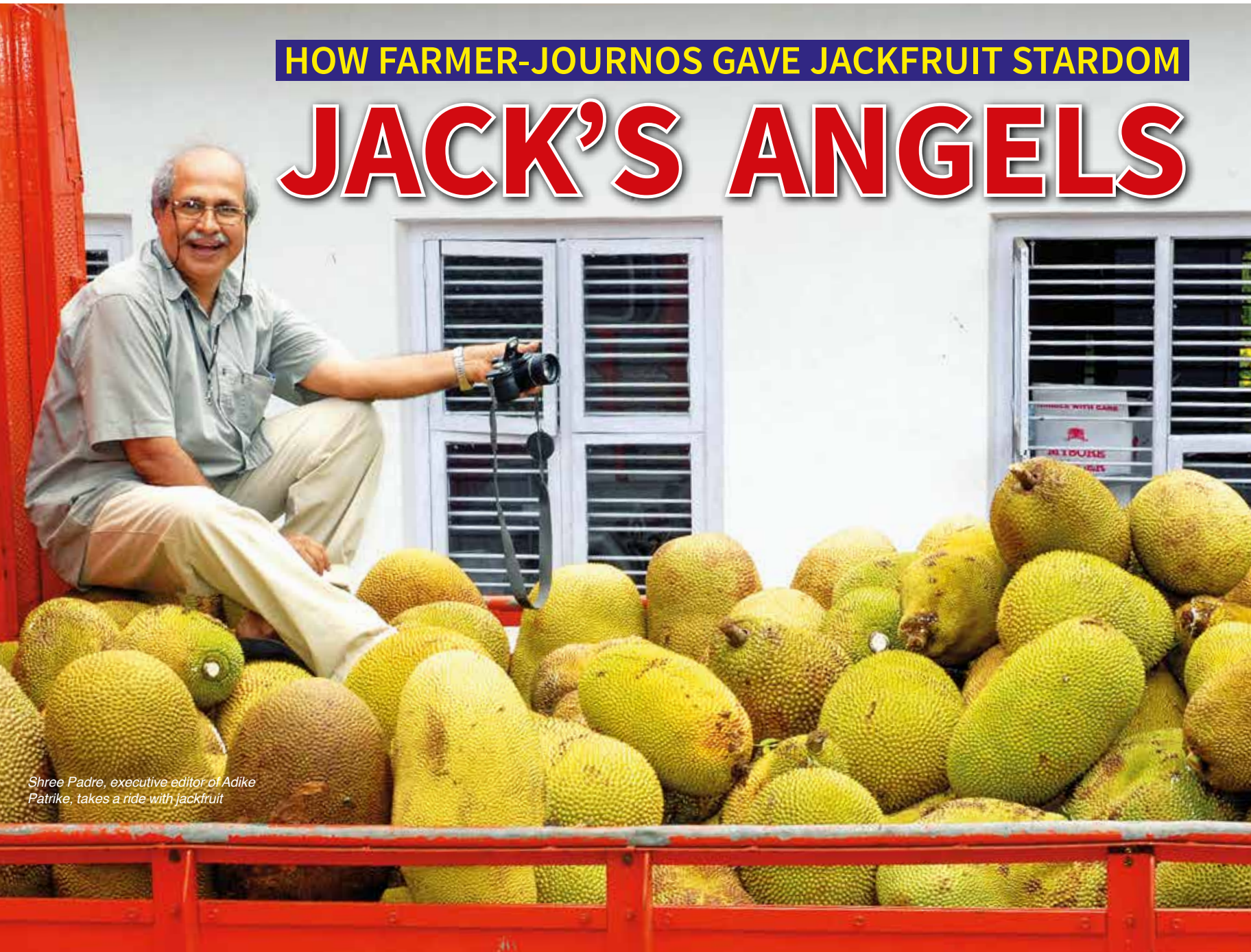


Civil Society

HOW FARMER-JOURNOS GAVE JACKFRUIT STARDOM

JACK'S ANGELS



Shree Padre, executive editor of Adike Patrike, takes a ride with jackfruit

BUILDINGS AND TB

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38 MILLION AFFECTED BY CONTAMINATED WATER IN INDIA

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"We must find it within ourselves to look beyond ourselves to develop the right thought level values in our actors for development, one of which is India Inc."



Padma Dhushan Mrs. Rajashree Birla
Chairperson, FICCI CSR and Community Development Committee and FICCI Aditya Birla CSR Centre for Excellence

"It has been personally a very enriching experience for me and my jury members. We came across some very amazing experiments and initiatives which have been undertaken, that can make India proud. I would like to express my special thanks to my fellow members in the jury and team from FICCI for assisting us in a very professional way about how to evaluate initiatives."



Mr. U.K. Sinha
Former Chairman, SEBI and Jury Chairperson

IN THE LIGHT

SAMITA RATHOR



LETTERS



Inclusion index

Thanks for the story, 'How inclusive are India's top 100 companies?' The index is a good method of measuring the commitment of companies to the National Voluntary Guidelines. Your story shows that a start has been made and in some areas companies are doing well. I think CSR projects will speed up better internal governance. The interaction between business and communities may have positive spin-offs eventually.

Shruti Verma

A much-needed cover story. The inclusive index encompasses core business policies and practices as well as those impacted by the company's operations, be it customers, clients or society at large. One big limitation is being unable to track actual implementation on the ground and having to go by the information put

out in the public domain which often tends to paint a rosy picture of intent and not adherence.

Sandhya

Banana man

Your story, 'Banana man goes digital' was an inspiring read. Research shows that the children of farmers don't want to farm. Yet, Srinidhi, a computer engineer who could have got a lucrative job in the IT sector, became a farmer and made a success of it. I think people who swap professions often succeed because they are optimistic about their jobs and think creatively. They aren't stuck with tradition and old ideas.

Swaminathan D.S.

A very inspiring read and a

confidence booster for fellow farmers.

H.G.K. Raddi

Srinidhi's business is an awesome initiative in farming. His keen interest to try out all kinds of experiments in marketing have paid off. All the best to this unique digital farmer.

Anil Kumar Kamble

Aadhaar woes

I was a fervent supporter of Aadhaar but your article, '7 reasons to worry about Aadhaar,' has made me think about the grand scale on which abuse can happen even if it is not intentionally done by the government. The risk of accumulating everything into one grand database is immense so perhaps a selective application would be desirable.

Thanks for such an awesome magazine. We, at TISS Tuljapur, love it.

Shivay Shakti

The government should make Aadhaar voluntary. It should be easily available to those who might require it, like migrant workers or students going to another city to study. It is undemocratic to make this so-called unique ID compulsory. Making it voluntary will also put an end to the controversy and fear surrounding Aadhaar.

Vinod Kamath

Open prisons

With reference to Amit Sengupta's story, 'Open prisons are better, cheaper,' I would like to say I agree with the author. Open prisons are better than the dungeons prisoners, including undertrials, are thrown into. But open prisons should also have proper infrastructure. Most of them are said to be dilapidated structures. It's an interesting method of reform and many more open prisons should be built but with additional facilities.

Gaurav Gupta

Pre-school matters

The government must consider including pre-schooling in government schools. Experiments by NGOs in running pre-schools for underprivileged children reveal that such schools give them the same head start that children from richer backgrounds get. Pre-schools are also a boon for working mothers.

Shehla Masood

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COVER STORY

Jackfruit gets its due

Jackfruit has always been eaten in Indian homes but it has had no status to speak of. The farmer-journos of Adike Patrike have worked assiduously to make it a star.

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Contact Civil Society at: response@civilsocietyonline.com
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Publisher
Umesh Anand
Editor
Rita Anand

News Network
Shree Padre
Saibal Chatterjee
Jehangir Rashid
Sushela Nair
Kavita Charanji

Layout & Design
Virender Chauhan

Cartoonist
Samita Rathor

Write to Civil Society at:
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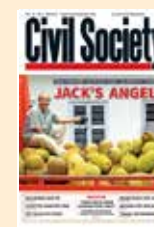
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The stories we do

WE are often asked about how we identify our stories. The answer is we keep an open mind, travel around and talk to people far and wide. Journalists looking out for interesting stories to tell will always find them turning up. It is how our jackfruit stories came to us through Shree Padre, who must be India's only truly farm-based journalist.

In jackfruit we saw the potential to provide better nutrition and higher farm incomes. It is eaten in homes across the country, but at the same time suffers from an image problem. We ended up doing three cover stories and several smaller stories on the value that can be derived from jackfruit.

Many more stories were done by Adike Patrike, an agricultural monthly in Kannada of which Shree Padre is the executive editor. So, when the Kerala government recently named jackfruit as the state fruit we thought it would be a good idea to tell you the story of Adike Patrike, which is perhaps India's only magazine brought out by farmers themselves.

We are also proud to have in this issue a story on the link between TB and the built environment as seen in Mumbai's resettlement colonies. It is well established that diseases are eradicated not so much by medicines as through good housing. But India, for all the talent available in urban planning and architecture, doesn't seem to understand this. We dump the urban poor in the most unhygienic and cramped housing. Mumbai has paid a heavy price for this because high-rise resettlement colonies have become hotspots for tuberculosis which then spreads to the rest of the city. Construction rules have been relaxed to favour contractors and developers. The study, done by Doctors For You and the Centre for Urban Science and Engineering at IIT Mumbai is an important one and has significance for all Indian cities.

Talk of malnutrition in India must be rooted in reality. What poor families need are well-cooked home meals. Dr Samir Chaudhuri of the Child In Need Institute (CINI) has spent a lifetime working with poor households, at first in West Bengal and now elsewhere in the country. He emphasises an approach which deals with the family and addresses the need for nutrition from the time the child is in the mother's womb. Dr Chaudhuri is a pragmatist who won't be enslaved by slogans. He will go with what works and he says it is important to take into account that the poor have aspirations and that changing tastes in a market economy will take people in the direction of packaged foods. Reinforced foods can perhaps deal with malnutrition quickly. But there will be a cost and there is really no substitute for good home meals. CINI has been producing and marketing Nutrimix, a pulse and cereal mixture which can easily be cooked and served by busy working women in villages and urban slums. Dr Chaudhuri says when it comes to a child's nutrition a mother knows best and policy initiatives should be centred on the family.

Shree Padre

‘Poor families need balanced home cooked food first’

Dr Samir Chaudhuri on strategies to boost the health of mothers and children and combat malnutrition

Civil Society News
New Delhi

IN 1974, Dr Samir Chaudhuri, a paediatrician working in Kolkata's slums, founded Child in Need Institute (CINI) to tackle the many dimensions of child malnutrition. It struck him at the time that malnutrition wasn't just a clinical problem but a complex phenomenon rooted in gender issues.

Over the years, led by Dr Chaudhuri, CINI developed deep understanding of the social, economic and political underpinnings of malnutrition and developed strategies to combat it. CINI is today one of India's most respected voices on malnutrition and child protection. It works on access to healthcare and education with the government and has twice been the recipient of the National Award for Child Welfare.

CINI has also developed Nutrimix, a simple combination of lentil and local cereal which can be blended into traditional foods and corrects nutritional deficiencies. It has developed a business model around Nutrimix which provides employment to women in villages.

Yet, despite government and non-profit efforts, India continues to lag behind smaller countries in its vicinity like Bangladesh and Sri Lanka in tackling malnutrition. Although famine is history and starvation deaths are rare, stunting and wasting of children along with low birth weight continue to dog the nation especially in India's poorer states — Bihar, Madhya Pradesh, Odisha and Rajasthan.

In Delhi to attend a workshop at FICCI on best practices in tackling maternal and infant health, Dr Chaudhuri was optimistic that India was on the right path. Governments, he said, had woken up to this issue and were doing a whole lot more. CSR funds, technology and convergence could all be deployed to help women and babies achieve better health.

Extracts from an in-depth interview with *Civil Society*:

Why have countries in South Asia like Bangladesh, for instance, done much better than us in combatting child malnutrition?

The reason is that they tackled malnutrition in a very integrated and convergent manner. They looked at women's issues, gender, and they improved crèche services. When a woman works, the child needs to be cared for. It is only recently that we have started converting some *anganwadi* centres into crèches since the focus on 0-3 years is missed in many Integrated Child Development Services



SHREY GUPTA

Dr Samir Chaudhuri: 'Malnutrition needs to be tackled in an integrated and convergent manner'

(ICDS) centres. But governments are now becoming more sensitive. They have started providing crèche services to working women. So hopefully things will improve.

We now have a framework in place at the grassroots. We have Ashas (Accredited Social Health Activists), *anganwadi* workers and so on. Is there something missing?

The most simple and effective tool we have right now is the Mother-Child Protection Card. But if you look at the cards you will notice that growth monitoring and weight for age is not being assessed because they say it's the work of the ICDS. The Asha

workers won't do it. The ICDS workers do their own monitoring. The left hand and the right hand don't meet.

But things are improving. There are convergent platforms like the Village Health Nutrition Day (VHND) where Ashas, *anganwadi* workers and health workers all come together. We need more such convergent platforms. The health system and the Women and Child Development Ministry work hand-in-hand because their focus is on mother and child. Why should they work vertically? CINI's role is to facilitate this convergence. In fact, convergence works better at the grassroots than at state or national level.

What is required for this kind of convergence to happen successfully? Is it better training?

It is mindset. NGOs also need to change their mindset. We should work in partnership with the government and add value to ongoing government programmes. I feel very strongly that if we can add even 10 percent to that programme the impact is immense rather than one small NGO running one small programme in a block.

The government is also looking desperately for assistance. It is all taxpayers' money so why don't we pool our resources? NGOs can facilitate. Instead of putting out a lone worker why don't we work with *anganwadi* workers, Asha workers, elected representatives, the panchayats, block-level committees and see that everybody focuses on benefitting the poor mother and child?

We need to improve the capacity of the mother to look after the child better because she doesn't know where to access these services. I am not just nailing the government but NGOs too. When a woman comes very poorly dressed we don't address her with respect. She is just shooed away. So that is where we should step in and tell the mother the government has so many programmes to help her and we must help her get access.

They don't know their entitlements?

Exactly. It has to be a rights-based approach. This is the world's largest democracy. The Aadhaar card is helping the poor. Most services have gone online. Smartphones have become available. So use these technologies to help the poor get services.

But there are issues with the Aadhaar card and Direct Benefit Transfer. Poor people are being left out.

Cash transfer is good because it gives choice to the poor. Don't treat them as illiterates. Let them buy services. The problem is that private healthcare and schools are not regulated. There is no quality control and that is why the poor get ripped off. You need regulation and control.

Empower the poor on how to use that money. Cash transfer does not mean that the money should be spent by the man on liquor. It should go to the mother and for food for the family. That's where NGOs and frontline workers come in.

District hospitals are now being proposed to be partially privatised. Rural healthcare facilities are in a shambles. How can these be best improved?

It's a question of money. How much of GDP do we spend on health? About 1.2 percent. It's very little. Technically, we should be spending 3-4 percent of GDP on healthcare and another 3-4 percent on education. It does not happen. There should be investments in the health system, education, training and making poor people conscious of their rights and entitlements.

Are you in favour of private players coming into district hospitals and PHCs?

Why not — but provided minimum standards are followed. Any idiot can work out costs. We know how much it costs, for instance, to deliver a baby. So regulate prices and ensure quality.

This is a free economy. We should not say that only government or only private can provide the best care. Make investments in government health

systems. We can do both. But they are not making those investments.

We have one doctor for 1,500 to 1,700 people. We don't have adequate nurses. We invest in medical colleges but not adequately in training except for AIIMS and central institutions. What is the quality of private medical colleges or engineering colleges? Does anybody monitor them?

In recent years there has been a controversy over reinforced foods and packaged foods being given to children. In a sense CINI's Nutrimix is also a reinforced food. Maharashtra is going in for reinforced foods. You have devoted your life to combatting child malnutrition. How do you see this matter?

In many ways reinforced foods are a quick method because you have to deliver outcomes. From the

malnutrition will come down and obesity, hypertension and lifestyle diseases will increase as has happened in the West. So this is the demographic and lifestyle transition we are passing through. We need to educate people on diet and lifestyle.

What should an industrialised state like Maharashtra be doing? Is something like Nutrimix the answer?

Nutrimix is nothing but a pulse and cereal mixture. It is like *dal/roti* or *khichdi*, convenient and adapted to an infant's tastes. You can't feed *dal/roti* to a six-month child.

So you give a variety which is available and traditional. It is a cereal blend. I used to teach women how to make it — you roast the wheat and the *dal*. You use one fistful of *dal* and five fistfuls of cereal. Then it becomes a balanced food.

‘Malnutrition and infection are a vicious cycle — the more malnourished you are the more prone to disease you will be. Love, care and strengthening the family safety net is the most important strategy in tackling child malnutrition.’

recipient's side, I don't think it's that easy. Food habits are changing. Maybe the time has come for some packaged foods to go to the community because the poor imitate the rich and they see packaged food being consumed by them.

The question is at what cost. The cost is that they are moving away from their traditional foods. You also pay more for packaged foods. The profits go to the shareholders and not to the poor. Of course, one advantage with packaged foods is that you can add nutrients.

But I have very mixed feelings about this. I see India changing. I would like the poor to have balanced home cooked foods first. Then, as social-economic status rises, you can go for some packaged foods but that brings in the problem of plastics and wrapping and so on. Instead of *parathas* and rice and other home cooked food, schoolgoing children are being given noodles or ₹10 to buy a packet of chips.

But are reinforced foods the solution to the nutrition problem we face in this country?

We have a malnutrition problem. Obesity is a type of malnutrition. So is undernutrition. Both are health hazards. But the point is that malnutrition starts from conception. Even now 22 to 25 percent of our children are born with low birth weight.

Around 20 to 25 percent of children are also obese. So India is suffering from the two faces of malnutrition.

Eating habits are changing but you need a balanced diet, not junk food rich in carbohydrates. Lifestyles are changing. Activity is slowing down. You see this in migration patterns. When people move from villages to urban slums they don't do hard labour. They become obese and hypertensive and their children become obese.

Maybe in 20 or 30 years we will be able to resolve the malnutrition problem. Undernutrition, wasting,

How is Nutrimix being distributed in West Bengal?

It is being purchased for the ICDS by the state. We have got a Self-Help Group (SHG) model too — the local SHG makes Nutrimix and sells it to the local *anganwadi* centre who buys it for a morning snack or as a supplementary food. The mothers know that it is made from ingredients available at home. See, chips and noodles are an alien food. The mother doesn't know where it comes from but it is quick and convenient. Here is an option for the mother. She can get Nutrimix from the SHG or make it herself at home.

So this is a model for states but governments will say they don't know how to do all this.

My answer is that there should be a centralised model where you can supply it to *anganwadi* centres or make bulk purchases. But there should also be a decentralised model which we promote where a small SHG can produce Nutrimix in their villages and supply it to the local *anganwadi* centre. There have been a lot of complaints about the quality of food in the *anganwadi* centre when you purchase centrally. But here mothers know this is going to feed their children so there will be more quality control and consciousness.

How should governments go about doing this?

We have offered this model to the governments of Jharkhand and West Bengal. We are willing to offer it to states where we are going in now — Assam and the northeast. See, packaged food comes from long distances, whereas every state has local grains available. So you don't spend on transport, you can add value to the cereal mix and you can see local women preparing it for their children. What better solution can you have?

Continued on page 8

'Poor families need balanced meals first'

Continued from page 7

How widely used is Nutrimix in West Bengal?

Well, now we are producing 500 to 600 tonnes a month. It is being distributed through the *anganwadi* centres. Of course, there is a Supreme Court order that you cannot buy from multinationals or big producers. But we have an SHG model and a small centralised model, where you can make some bulk sales. We employ local women. They are involved in every stage of production and packing. We have both models.

How can the Public Distribution System (PDS) be strengthened to provide a better mix of foods?

The most important thing is low-cost nutritious food for infants, children and pregnant women. This is important because they need the food now. You can get grains, oil, sugar from the PDS but what about eggs? Andhra is a big producer. The state could see that eggs are available in the PDS. Also, eliminate the rich from the PDS.

What are CINI's most important findings on malnutrition over the years?

The most important finding is that malnutrition can't be equated only to food. It is linked not only to poverty but to illiteracy, gender, social status... We always say the children of the poor are malnourished. It's not true. You see bubbling and thriving children even in poor families. So what happened there? They deviated positively. We take that learning and spread it in the community. Those families become our brand ambassadors in the same village.

No amount of ICDS, national programmes, government programmes can eradicate malnutrition until and unless the mother and the families are involved. Mothers are the best caregivers.

They know what to feed — home-cooked food with love and care. They access health systems. Malnutrition and infection are a vicious cycle — the more malnourished you are the more prone to disease you will be. Love, care and strengthening the family safety net is the most important strategy in tackling child malnutrition.

Then come quantity, quality and frequency of food. We think the child is small so we should feed small amounts. Not true. The child needs more food compared to body weight. We tend to feed children three times a day when they need to be fed four or five times a day — green leafy vegetables, fish from the pond, eggs, seasonal vegetables, all this improves the safety net in the family. Up to the first 1,000 days, the child needs food and healthcare.

Then the child needs to go to school or he ends up as a street child. If the child has not been nourished in the first 1,000 days, the attention span is gone and he can't thrive in school. Girls get married early, in some states nearly 40 to 50 percent of girls marry when they are only 14 or 15 years old. They get pregnant, give birth to low-weight babies. You have to break this cycle. The girl has to stay in school otherwise she becomes a prime candidate for trafficking. Malnutrition must also be seen as a child protection issue. ■

When buildings become hotspots for TB

Mumbai study shows why sunshine, ventilation matter

Civil Society News
New Delhi

A study of three high-rise resettlement colonies in Mumbai has shown that there is a link between the spread of tuberculosis (TB) and the lack of sunshine and ventilation in apartments built closely together for too many people.

The role of the built environment in promoting better public health and controlling the spread of diseases is well known.

But this study is the first of its kind in India to look at the problems that can emanate from buildings that don't take into account the open space and fresh air needs of residents.

The study identifies Mumbai's resettlement colonies as hotspots from where TB spreads to the rest of the Indian financial capital and adds to its rising graph of cases.

The findings have relevance for all Indian cities where slum dwellers are being evicted from shanties but rehoused in conditions so poor that infectious diseases abound and spread to other areas.

The resettlement colonies in Mumbai are where large numbers of people who are part of the informal sector live. They work in homes and offices, drive taxis and ride in buses and trains and transmit infection through the day.

The study was conducted in high-rise blocks built to resettle slum dwellers at the Lallubhai Compound, Natwar Parekh Compound and the PMG Colony. They are all located in the M-East municipal ward of Mumbai where the incidence of TB is known to be higher than the national average.

Researchers interviewed residents, computer simulations showed up design flaws of the buildings and location visits verified parameters like airflow and access to sunlight.

It was found that the lower flats had a greater number of cases of TB. But even the flats on the upper floors in the Lallubhai and Natwar Parekh compounds were not much better off.

Buildings in the Lallubhai and Natwar Parekh compounds were a mere three metres apart and so lacked access to the sky. Also, more than 500 households per hectare had been crammed in. The National Building Code says there should not be more than 500 dwelling units per hectare. But the Natwar Parekh Compound has 1,313 households per hectare and the Lallubhai Compound 850.

A different picture emerged at the PMG Colony,



Buildings built close together in a resettlement colony in Mumbai

To benefit developers rules have been tweaked. The result is congestion, lack of ventilation and conditions in which TB germs flourish.

which has a lower density of 630 households per hectare. There were fewer cases of TB here. The buildings had come up several years before those at the Lallubhai and Natwar Parekh compounds and were farther apart. The flats had better ventilation and access to sunlight.

The study finds that regulations for slum resettlement and redevelopment buildings have been steadily relaxed since 1991 with regard to unit density, open space and distance between buildings.

There has also been lack of regulation for window design, light and ventilation.

To accommodate more people the buildings have gone higher. At a height of 24 metres, the distance between buildings should have been eight metres. Instead it is three metres because the regulations have been tweaked to benefit contractors and developers. The result is congestion, a lack of ventilation and conditions in which TB germs flourish.

"A stark difference in the quality of light and ventilation can be seen in PMG Colony vs Lallubhai and Natwar Parekh compounds. In PMG Colony, the distance between buildings is mediated through courts measuring 15m x 15 m. Each building also has internal light courts measuring 5x5 m. This provides for cross ventilation in the colony and interiors of buildings," says the study.

The PMG Colony came up in 1997, Lallubhai between 2003 and 2005, and Natwar Parekh in 2008. Over time the rules have been relaxed and living conditions have worsened.

Doctors For You, an NGO consisting of physicians

who try to support the public health system and also make themselves available during natural disasters, has been running a programme for eradication of TB at the Lallubhai and Natwar Parekh compounds for the past eight years.

It found a growing number of cases and also recorded the death of a young girl from multi-drug resistant TB.

Ravikant Singh, founder of Doctors For You, says: "For the past three years we were thinking of how a study could be done to explore the correlation between built spaces and TB in Mumbai. We applied for funding to the Mumbai Metropolitan Region Environment Improvement Society and got ₹18 lakh. The study finally cost us ₹23 lakh."

Doctors For You teamed up with the Centre for Urban Science and Engineering at IIT Mumbai which did the computer simulations. A multidisciplinary team did the research.

The study emphasises that design and structure which take into account livability standards are particularly important in resettlement colonies. The residents are poor and won't opt for technological

solutions like air-conditioning and exhaust fans to improve ventilation. Even if they do, what is needed are fresh air and sunshine to stop the spread of diseases like TB.

The study points out that among Mumbai's 24 wards, the M-East ward has reported high TB prevalence. The Chembur area had 3,452 TB cases whereas the Govandi area had 4,642 TB cases in 2016-17. This amounts to a prevalence of 758 cases per 100,000 persons in Chembur and 1,055 cases per 100,000 persons in Govandi, about three to five times higher than the national average. Both areas fall under the M-East ward.

This high burden and mortality rate result in sizeable economic and social costs, making it a critical issue to address.

The study proposes that regulations for resettlement buildings be changed so that housing conditions become liveable and the health of the residents is not compromised because of

The study says that design and structure that take into account livability are important in colonies that are meant to house the poor.

shortcomings in design and structure.

In the Lallubhai Compound there are 36 buildings with 4,890 occupied rooms. In the Natwar Parekh Compound there are 59 buildings with 4,800 occupied rooms. And in the PMG Colony there are 16 buildings with 2,900 occupied rooms.

Since the average household sizes are more than five persons, the number of residents is significant and as carriers of a disease like TB in a congested city like Mumbai they have the capacity of infecting others on a large scale.

Some of the measures that could make a difference are easily done such as having windows opening out instead of sliding. In sliding windows, only half the opening for the window is used thereby reducing the quantity of air entering the dwelling.

But for the most part, the significant changes that are needed have to do with the structure of the buildings. The study therefore looked at factors like 'sky view', 'daylight', 'daylight autonomy' and 'natural ventilation'. These technicalities were at first assessed through computer modelling and then verified in dwelling units.

On all these counts the Lallubhai and Natwar Parekh compounds fared poorly. The PMG Colony did better. But all three colonies need to be improved. Also buildings that are going to be built must not embody the same mistakes.

The M-East ward in Mumbai is regarded worldwide as a hotspot for the spread of drug-resistant TB. It is characterised by slums and squalor. The situation is not much different in other Indian cities. The study shows it is not enough to get people out of slums. They should be housed in conditions which promote healthy living and reduce the disease burden on cities. ■

Sanitary napkins need a pro to get them right

Kavita Charanji
New Delhi

WHEN the Nalanda Foundation set up a small sanitary napkin making unit in Ghazipur in east Delhi in 2014, the goal was to give women waste-pickers an alternative livelihood and also spread awareness about menstrual hygiene. Local women would make a living from producing low-cost napkins which they would sell as well as promote.

But for all the enthusiasm that went into setting up the unit, it didn't do well right from the beginning. The napkins were expensive and uncomfortable to use. Two years later, Anurag Kashyap, associate director of the foundation, found himself shutting down the Ghazipur unit.

From being small manufacturers of a rudimentary napkin, it was decided to team up with Soothe Healthcare so that the women could instead sell and promote better quality napkins.

Soothe Healthcare's factory, which manufactures the Paree brand, has modern machines that produce 510 million high quality sanitary napkins a year. The company has just one to two percent market share but intends to capture 10 percent.

Only 20 percent of Indian women use sanitary napkins but numbers are rising and in recent years several small manufacturers including NGOs, have plunged into making sanitary napkins. But manufacturing hygienic, comfortable, absorbent and inexpensive sanitary napkins is a sophisticated operation and often cannot be achieved by a cottage industry, as Kashyap realised.

The Nalanda Foundation is the Corporate Social Responsibility (CSR) wing of Infrastructure Leasing and Financial Services Limited (IL&FS). The Ghazipur unit was being run by the Gulmeher Green Producer Company, (GPCC), a social initiative set up by IL&FS in 2013.

Since IL&FS was setting up a waste-to-energy plant at the Ghazipur landfill it wanted to create alternative livelihoods for waste-pickers who would be left jobless. Its small sanitary napkin unit could hardly be compared with Soothe Healthcare's fully mechanised one. Yet it was important that the final product be affordable and comfortable to use.

"Our motive is to provide a livelihood to waste-pickers. On the other hand, Soothe Healthcare is a profit-making venture," says Kashyap.



Sahil Dharia: 'Leave manufacturing to us because that is our core competence'

SHREY GUPTA



Anurag Kashyap: 'Our motive was to provide jobs'

SHREY GUPTA

The waste-pickers had been trained by the Institute for Development Support, an NGO based in Uttarakhand, to make products like attractive greeting cards, file folders, note pads, gift boxes and coasters from recycled paper and waste flowers collected from the Ghazipur wholesale flower market. A stitching unit, mini-bank and an educational wing had also been set up.

Adding a sanitary napkins unit looked like a promising endeavour in 2014. "We thought that production of sanitary napkins would be an additional income stream for the women and help get them off the landfill. We also thought it would improve the health parameters of the community," says Kashyap. Besides, the unit required minimal capital investment, space was available, and low-cost sanitary napkins seemed to have a ready market.

Gulmeher tied up with Aakar Innovations, manufacturer of Anandi, a low-cost sanitary napkin brand. Aakar's job was to provide technical training to the women, while IL&FS made a capital investment of ₹5 lakh to ₹7 lakh in the project. Marketing was to be taken care of by Aakar.

The sanitary napkin unit provided employment to 15 to 20 women working in two shifts, producing regular as well as biodegradable napkins. They were

paid ₹5,000 per month for a daily six-hour shift. The women were also trained to raise awareness about the importance of menstrual hygiene in their community. They could earn more by marketing the napkins independently. It sounded good on paper. But soon after the unit went into operation, it became clear that all was not well.

"Although the machinery was low-cost, the actual product was not low-cost if you built in the wages of the women, rent, transportation and other such overheads. The price of the napkins worked out to ₹3 to ₹4 a piece so we couldn't market them as low-cost products," says Kashyap.

Sangeeta, supervisor at the Gulmeher Livelihood Centre, agrees. "At the lower end our napkins sold at ₹22 for a packet of six. In the upper category, a packet of six was priced at ₹40."

Poor quality and inadequate marketing added to their problems. "The centre is in the middle of a dumpsite. Although we were giving women gloves, masks and trying to keep the product as hygienic as possible with an infrared steriliser, quality was not up to the mark. Sometimes the glue would get unstuck and cotton would come out of the napkin. The women who produced the napkins weren't using the napkins themselves," says Kashyap.

The unit didn't have economies of scale either. On an average, the women produced 630 napkins a day, says Kamla Joshi who is in charge of the centre.

Marketing the product proved to be difficult. "Aakar was supposed to buy the napkins from us, but that didn't happen. They would say they didn't have place to stock our products or cite other reasons and eventually they stopped buying altogether. Our workers were left idle," she says.

them right

So instead of boosting incomes, the unit became a drain on Gulmeher's resources. Finally, in 2016, the sanitary napkins unit was shut down. Some of the women workers were absorbed into the stitching and paper bag units while others found employment elsewhere.

At a chance meeting, Kashyap got to know Sahil Dharia, founder and CEO of Soothe Healthcare. He told Dharia about the ailing sanitary napkins unit and asked for possible help. Dharia visited the unit and was appalled at the sight of 20 women manually making the napkins, gluing and drying them under a fan so that they wouldn't attract fungus. "I thought to myself, can this product really be sold for the use of women? They are better off using cloth. An unhygienic and poor quality product was a big no for a big company like IL&FS," says Dharia.

He told Kashyap about his own factory in Greater Noida that had got US Federal Drug Authority (FDA) registration for its good manufacturing practices. "They believed that they were creating a good product. When I showed Kashyap how we worked, he understood where they were going wrong," says Dharia.

Around ₹35 crore has been invested in setting up Soothe Healthcare's factory. Currently, Paree has not made profits, but Dharia believes that his company will begin making money a few years down the line.

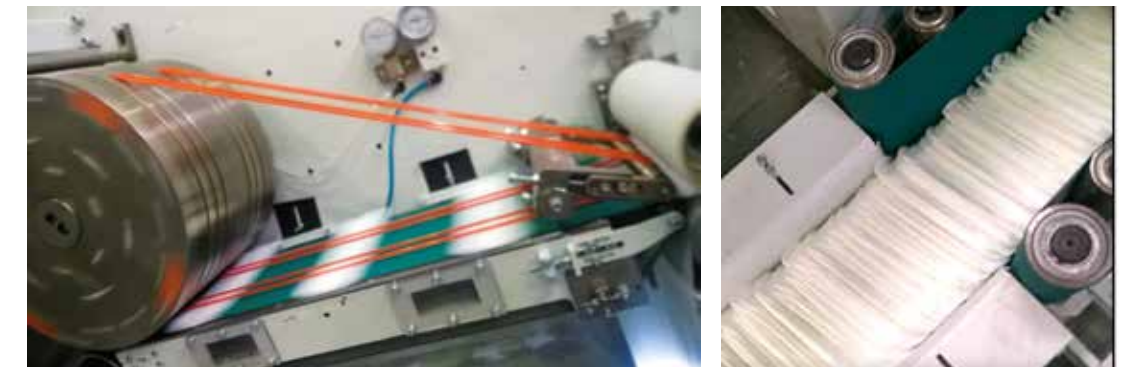
Dharia is clear that his company is not a social welfare enterprise. "Our motivation is to enter a blue ocean or virgin market, make profits and follow the idea that what is good for the company is good for the community," he says.

Before starting Soothe Healthcare, Dharia worked for nine years with Thomson Reuters. He was their Global Head of Operations, Investment Research Content, supporting operations with a \$200 million revenue footprint. He is a charter member of TiE, a FICCI Young Leader, and on the executive council of CII Young Indians.

Dharia believes that high-quality, competitively priced products, along with a good reputation, will

take his company far. Already, Paree sanitary pads are available across India in retail stores like Reliance, Walmart, Metro, More and WH Smith. The Indian sanitary napkins market is dominated by Procter & Gamble and Johnson & Johnson.

Dharia is confident that in the next two years, the company will be able to capture 10 percent of the market. He believes that is doable because MNCs are slower in decision-making and their priorities are Western markets. Eventually, local brands have more resilience and a better understanding of their home turf. "Why would MNCs spend time understanding what the Indian consumer needs?"



Soothe Healthcare uses sophisticated machines to manufacture sanitary napkins

It was decided that Gulmeher would team up with Soothe Healthcare so that the women could sell better quality sanitary napkins instead of producing rudimentary ones.

But that is my business," says Dharia, who is competing with big brands like Whisper, Stayfree, Kotex and Sofy.

There is a cost advantage in buying Paree. A packet of eight has a maximum retail price of ₹30 to ₹32, which is ₹2 cheaper in the base category than its nearest competitor. Its premium category, called Pariz, costs more. "The product is more expensive because it is far superior. We have better absorbency, better top sheet, better comfort and are one of the first sanitary napkin manufacturers to bring in a soft feel," says Dharia.

Soothe Healthcare's former brand ambassador, badminton player Saina Nehwal, invested Rs 1 crore

in the company. The company also gets involved in awareness campaigns for social good. Recently, Soothe Healthcare, along with the Times Group, launched a menstrual hygiene campaign in Haryana, Uttar Pradesh and Punjab with Miss World Manushi Chhillar.

Soothe Healthcare has trained staff called Paree Didis to go with a doctor-approved script on menstrual hygiene to schools and colleges in the northern states of India.

"Our Paree Didis also train women at ITC e-choupals and rural agri-trading hubs, to educate women on menstrual hygiene and sell packs of

Paree. We thereby create women entrepreneurs who make ₹4 per pack of eight napkins through each sale," says Dharia.

Paree has found common ground with Gulmeher. Fifteen to 20 women from Gulmeher have been trained as Paree Didis.

Dharia thinks it is a great way of boosting enterprise among the women. "We are saying, leave the manufacturing process to us because that is our core competence and ask the women to sell the packs. We are training 50 women who will become Paree Didis themselves. We have now received a second order of sanitary napkins from them," says Dharia. ■

Samita's World

by SAMITA RATHOR



Killed for just owning a horse

Tanushree Gangopadhyay
Ahmedabad

SINCE his childhood, 21-year-old Pradip Rathod, a Dalit from Timbi village in Bhavnagar district, always wanted a horse. His father, Kalubhai, tried very hard to dissuade him. "I tried to convince him to buy a Bullet motorcycle. He refused. He wanted a horse. I finally bought him one for ₹30,000 just eight months ago. Pradip named him Raju. He rode the horse with great skill. He was a good horse trainer," says his distraught father.

On 29 March Pradip was found hacked to death on the road, allegedly by Kshatriyas for having the temerity to own and ride a horse.

"Pradip left for home on his horse while Rakesh, my older son and I stayed behind to milk our cow on the farm," says Kalubhai. When he didn't reach home for dinner, Kalubhai and Rakesh went on their motorcycle back to the farm to look for him since he wasn't answering his phone. They were shocked not to find him there. On their way back home, they were accosted by three motorcyclists from the neighbouring village of Pipralia.

"One of them told us that there was a man lying dead near a check dam," said Kalubhai.

Kalubhai found Pradip's body in a pool of blood. Police said that he had deep wounds on his head, throat and right arm. He was rushed to the government hospital in Umralla, where he was declared dead. Based on Kalubhai's complaint, the police booked Natubha Jhala and unidentified men from Pipralia village under the Schedules Castes and Scheduled Tribes (Prevention of Atrocities) Act.

Pradip died between 7 pm and 8 pm. The police are questioning three persons: Jhala from Timbi and Ghughubha and Jitubha Gohil, two brothers from Pipralia.

The police took a long time to register the complaint. Social workers say the FIR was registered at around 1 am. Kalubhai was quietly confident that they would get justice. "Our efforts will pay off. But I have lost my loving son," he said.

"My son died because of his love for his horse, Raju. We had often been stopped by several Darbars (Kshatriyas are called Darbars in Gujarat) who threatened Pradip. They told him never to ride a horse, that it was unbecoming for a Dalit. Owning and riding horses was seen as a Kshatriya privilege. He was told to sell the horse else he would be killed," Kalubhai wrote in his FIR.

Kathiawar in Western Gujarat, where Bhavnagar is located, was historically dotted with princely states. Kshatriyas ruled here for centuries and still hang on to their traditions. Dalits have often faced

brutality. But they never dared to file a complaint. All this despite the Constitution and a law, the Scheduled Castes and Scheduled Tribes (Prevention of Atrocities) Act, which protects them.

Timbi, with a population of 5,000, is 50 km west of Bhavnagar. The village is dominated by Patidars

when they ride a horse during a marriage procession. But this is the first instance when a Dalit youth has been subjected to such an atrocity for owning and riding a horse," he said.

On 5 April, around 3,000 Dalits joined Kalubhai in a condolence march to Umralla Police Station in Bhavnagar district to demand justice for Pradip.

Pravin Mal, Deputy Superintendent of Police (DSP) of Bhavnagar district, had permitted Kalubhai to take out a condolence march from Timbi to Umralla police station, the *tehsil* headquarters. Kalubhai had one demand of the DSP-- to arrest all the accused. The DSP admitted that "prima facie, victim riding a horse led to his death".

"We wanted to tell the DSP that questions raised about Pradip's behaviour are irrelevant in the probe. We have faith in the Bhavnagar police. But if attempts are made to paint him in a poor light, we shall demand a probe by other agencies," said Kalubhai. Pradip had studied upto Class 10 and was popular in the village.

After meeting the DSP, Kalubhai submitted a memorandum demanding justice for the murder within 10 days, "failing which we shall take action". They mentioned several persons who ought to be arrested. These included Jhala and the Gohils, who had threatened Pradip for owning and riding a horse.

Some leaders tried to persuade Kalubhai to demand land. He stood his ground and said he sought justice. Officers from the social welfare department also rushed to the Civil Hospital with a cheque of ₹415,000 as the first instalment of compensation. "I refused to accept any money. My son was very dear to me," said Kalubhai.

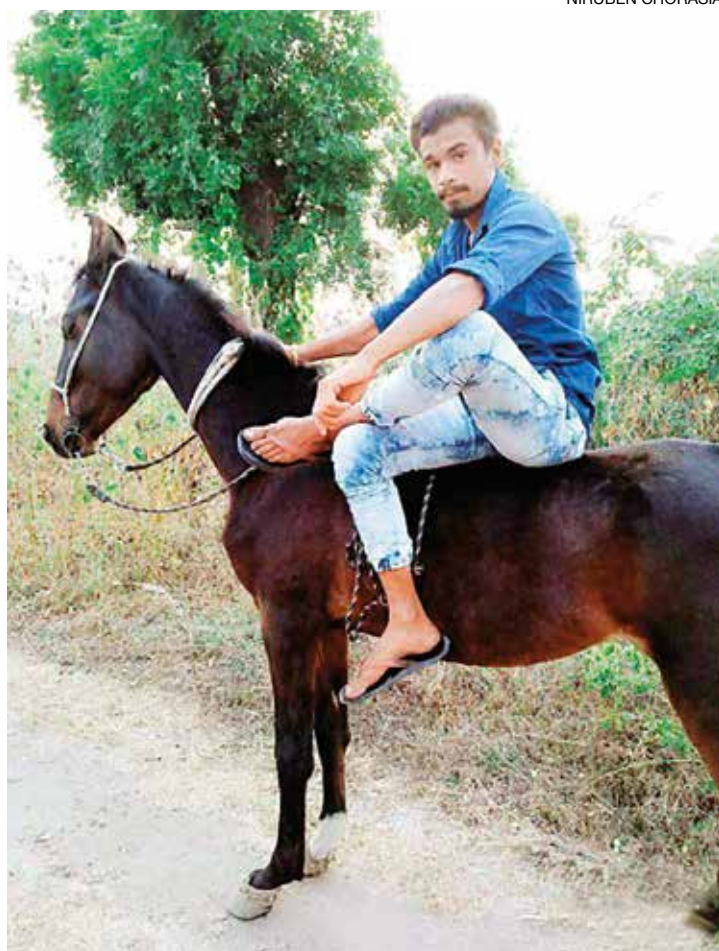
"We worked together as agriculture labour. Losing my son is very hard upon the family. I own three acres which does not fetch us much. Cotton is our mainstay," said Kalubhai.

Dalits view the judiciary as their sole hope. But the Supreme Court's recent observation that the Atrocities Act has been misused to harass innocent citizens has been a blow to Dalits. They participated wholeheartedly in the Bharat Bandh.

Navsarjan has been able to get 40 convictions in Bhavnagar district. "This, we feel, is small relief," says Macwan. After

Pradip's death, Kalubhai was tersely told by the Kshatriyas of his village to sell the horse. Pradip also used to sport a moustache which the Kshatriyas consider their prerogative.

Kalubhai did not sell the horse. Raju led the procession of mourners for Pradip's funeral late in the night. "We wanted to take his body in a horse carriage as a mark of protest. Since it wasn't possible to get a carriage, we ensured that Raju led the procession to bury his master, Pradip's body." ■



Pradip Rathod with his horse, Raju

Dalits view the judiciary as their sole hope. But the Supreme Court's recent observation that the Atrocities Act has been misused to harass innocent citizens has been a blow to them and they took part in the Bharat Bandh.

and has 50 Dalit families and a dozen Kshatriya families. The village was in a state of shock. "Despite disputes we have never seen such brutality," says Chhotubhai, a 60-year-old farmer. "Never have I heard of a dispute over a Dalit riding a horse."

Neighbouring Pipralia is dominated by Kshatriyas. Martin Macwan, a Dalit activist and founder of Navsarjan, an organisation that works for Dalits, said that such brutality is unacceptable today. "Dalits in northern Gujarat face opposition

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A panoramic view of a mining site in Goa

Goa struggles to find mining ban answer

Derek Almeida
Panaji

THE Supreme Court's order on 8 February cancelling all iron ore mining leases in Goa issued by the state has caused a tizzy. The mining industry called it 'catastrophic'. There was much dismay in the interior talukas which are dependent on the industry for employment.

The state government was taken by surprise and opinion was split between two groups — one favouring adherence to the court order and the other calling for an ordinance to overturn it.

The Goa Foundation, petitioner in the case, was happy with the order. But it isn't opposed to mining. It would like the state government to take over the mines and run them and for the people of the state to benefit from the money that's made.

"Mineral wealth belongs to the people and the government is just a custodian, hence wealth earned by selling the mineral should go back to the people," says Rahul Basu, member of the Goa Foundation.

The mining industry's countdown started on 22 November 2010 when the Union government constituted the M.B. Shah Commission under the Commission of Inquiry Act, 1952, to inquire into charges of illegal mining in the state. The report, which was delivered in two parts in March-April

2012, brought to light the "rapacious and rampant exploitation" of mineral resources which shocked Goa and even the nation.

The state government led by Chief Minister Manohar Parrikar acted swiftly and on 10 September 2012 suspended all mining in the state. Four days later, the Union Ministry of Environment and Forests suspended the environment clearances granted to 139 lease holders.

Mining lease holders approached the Bombay High Court at Goa to declare the Shah Commission report illegal and prayed for quashing the state and Union governments' orders which brought mining to a halt. The Goa Foundation petitioned the Supreme Court to terminate all leases where mining was carried out in violation of law. The High Court petition was transferred to the Supreme Court.

On 21 April 2014 the Supreme Court passed an order declaring that all iron ore mining leases had expired on 22 November 2007 and all mining conducted after that was illegal. It also mandated that leases and environment clearances should be granted afresh.

On 4 November 2014 the state government said it had four options — auction of leases, takeover of mining by the government, granting of fresh leases or renewal of leases which were pending from 2006.

The government was studying the options when a

legal complication was introduced in the form of a High Court ruling which stated that all lease holders who had applied for renewal in 2013 and had paid stamp duty should be granted renewal.

The state government abandoned all options and went in for renewal. This process was expedited when it became known that the Union government was planning to promulgate an ordinance to make auction the only route for grant of leases.

Between 5 November 2014 and 12 January 2015 about 88 mining leases were renewed, with as many as 31 getting the government nod a day before the ordinance was promulgated.

This resulted in the Goa Foundation filing a second petition before the Supreme Court which eventually resulted in stopping of mining in Goa on 15 March this year.

The Goa Foundation understood ground realities and showed tremendous courage and grit in effecting a clean-up of the ruin created during the boom years of mining. The Supreme Court's comments on the mining industry are scathing: "Rapacious and rampant exploitation of our natural resources is the hallmark of our iron ore mining sector coupled with a total lack of concern for the environment and the health and wellbeing of the denizens in the vicinity of the mines."

A host of factors resulted in this scenario. First was the willingness of the state government to play handmaiden to mining companies, the second was the reluctance of mining lease holders to accept the April 2014 judgment of the Supreme Court and the third an intervening High Court order that gave all stakeholders a short-lived short-cut.

"The state had an opportunity from the first Supreme Court judgment (2014), which declared all mining leases illegal from 2007, to start with a clean

slate. We could have done something different which would have been beneficial to most Goans," remarks Basu.

With Chief Minister Parrikar indisposed, Union Minister of Road Transport and Highways Nitin Gadkari was dispatched to Goa. On the eve of his arrival, those affected by the closure of mines virtually blockaded Panaji. The Union minister however, poured cold water on the hopes of mining companies. He categorically ruled out an ordinance and favoured the auction route, but promised to back a review petition.

LEGAL MESS: Ambar Timblo, president of the Goa Mineral Ore Exporters' Association (GMOEA), sees the present situation as 'catastrophic'. "There is no clarity on whether mining is a sustainable enterprise," he says. "The present juncture is very uncertain because we have a legal mess, a fragile government and a collapsed market."

The impact of the ban is going to be huge. According to the GMOEA, the industry provides nearly 60,000 direct and indirect jobs. About 36,000 truck drivers and cleaners employed in 16,000 trucks are now stranded in no-man's land. The barge industry, which employs nearly 4,000 people on 230 vessels, is also staring at an uncertain future.

Six days after the mines were closed the Vedanta Group, the largest iron ore exporter, asked 2,000 employees not to report to work to reduce operational costs. Fomento Resources, which is the second largest exporter, has asked 800 employees to resign and more could also have to go.

Certain interior villages which were dependent on water extracted from pits and supplied by mining companies will be affected once supply stops on 30 May. Fomento alone has 6,000 water consumers and practically all will be affected by the closure.

Sitting in his Panaji city office, Timblo, who is also the managing director of Fomento Resources, asked, "Which part of the Goa Foundation petition is in public interest? How is public interest served if the mines are closed?"

"The situation is going to get worse," he explained. "When the mines were shut down in 2012 we were able to manage on account of the profits made during the boom years. When mining restarted in April 2015, the commodity market crashed and volumes were restricted to 20 million tonnes. After one-and-a-half years of operation, mining has been shut down again and there is no clarity on when it will start."

"After the leases were renewed till 2027, we reinvested to start the mines. Now all that money is lost," Timblo said. "The government has collected ₹1,700 crore as stamp duty. Will they return it now that leases have been declared illegal?"

With the Supreme Court placing a cap on total extraction of ore and a drastic drop in international prices for low-grade ore, only 28 of the 88 leases were being operated following the 2015 reopening.

Ore exporters got some breathing space when the Supreme Court allowed sale of ore that was mined

before March 15 and stacked at jetties or within the lease area. "This is expected to get exhausted in a month or so," said Timblo.

Strongly opposing auction of mine leases, Timblo said, "It is not feasible in the Goa context. About 35 percent of your revenue goes to the iron ore fund, district mineral fund and as royalty to the government. In addition we have to pay corporate tax and now we will have to pay auction money. How can one operate a business if 95 percent of your profit is going to go back to the government?"

"Where has auction happened successfully in other parts of India?" he asked and claimed that none of the mines auctioned in Odisha or Karnataka are working because of high costs.

Timblo's views on the auction route are also shared by Arun Kumar Rai, former director of



Rahul Basu, member of the Goa Foundation

The Goa Foundation believes sustainable mining is only possible if the government takes over the mines and runs them.

Vedanta Iron Ore. Explaining the Goa mining scenario, he said, "Goa has iron ore reserves of nearly 1.5 billion tonnes. But most of it is low-grade with Fe content below 54 percent. While technology gaps exist, low-grade ore is not used in local steel mills for economic reasons."

"Beneficiation does take place and this can increase the Fe content by two to three percent, but this comes at a cost," Rai added. "Then, you have to negotiate with the Chinese who drive very hard bargains, sometimes asking for up to 30 percent discounts."

"Given Goa's location along the west coast, the best option is to export the ore," said Rai, adding that players from outside the state would also look at exports since local use would be expensive because of the cost of transportation to steel mills located in Karnataka.

"The best option is to dig and sell because even screening has its drawbacks. For example, 100 tonnes of ore could be reduced to 30 after screening. So, costs matter a lot in this industry," explained Rai. He regretted the mining business had been

much misunderstood. "It has been used, abused and misused," he said.

GREEN LOGIC: The Goa Foundation too has arrived at the conclusion that auction of leases is not in the best interest of Goa, but for different reasons. Its prime concern is that the environment will once again be at risk if leases are handed back to companies that were responsible for the mess in the first place.

"Zero-loss mining is possible only if the government takes over the mines, forms a corporation and raises contracts for excavation," said Basu. "The expertise is available in Goa itself and the National Mineral Development Corporation would be more than willing to help."

Ever since the mining crisis hit the state in 2012, the Goa Foundation has presented the government with plans and ideas on how to resolve the issue. "Our recommendation now is to treat minerals as family gold. This gives you two choices. One is you keep the gold and let your children inherit it. The second is to sell it and buy land and your child gets the land which will give income. By mining, the government is selling the mineral. So you have to get the full value of the mineral. The second principle is that the earnings have to be saved. Other countries create a mutual fund and the income from the fund is shared with all people as a dividend."

According to the Goa Foundation's calculations, iron ore valued at ₹65,058 crore was sold illegally between 2007, when leases expired, and in 2012 when mining was stopped. "As per the Supreme Court order, this has to be recovered," asserted Basu. "If this amount is placed in a mutual fund it will earn each resident ₹1,000 per month for a lifetime."

Based on information provided by Vedanta in their annual reports and GMOEA, the Goa Foundation calculated that mining companies in Goa made collective profits of over ₹35,000 crore between 2004 and 2012 while the state government got only ₹2,400 crore in the form of taxes and royalty, which is a measly five percent.

"So what happened was that the state sold ore valued at 100 for 5 and mining companies picked up all the profit with the central government earning 30 percent," explained Basu. "The profit made by mining companies is larger than the revenue earned by the state in all those years."

In 2014 the the Goa Foundation had suggested that since the issuing of fresh leases and environment clearances could take between two to five years, the government could sell some of the dumped iron ore lying around and put the rest back into the pits.

"There are about 750 million tonnes of dumped ore lying around which is an environmental hazard. Take what cannot be sold and put it back into the pits and create employment. Parrikar estimated that about 20 percent of the dumps, which is 150 million tonnes, can be sold. So you don't have to undertake mining for at least seven years. This gives the land some breathing space," said the foundation. ■

RTI movement tells its story

Civil Society News
New Delhi

PEOPLE'S movements represent multiple hopes and efforts. As they stretch over time, who did what and when or how something happened or didn't gets forgotten. Chroniclers are needed, but hard to find. If they come from within it is most likely they won't be objective and if they are on the outside chances are that empathy and understanding will be missing.

The right to information movement has happily overcome this challenge. Aruna Roy and the MKSS Collective have produced a balanced and well-documented book on the movement, which, after long years of struggle and many ups and downs, finally gave India a robust right to information law.

It hasn't been an easy story to tell because the movement drew its strength from multiple efforts. But the book brings them together fluently and nicely, without the hiccups that could have come from hubris and self-praise.

Roy gives us an honest and professionally put together document. It is objective and dispassionately structured and allows us to access the movement in its many parts. The text is Roy's but many shoulders have been put to the wheel. Roli Books, as could be expected, has done a great job in bringing it out.

The RTI movement's story is inherently a dramatic one because people at the poorest and weakest levels of the economy experienced what it takes to hold powerful governments to account. That a law should have resulted from this unequal confrontation and found tens and thousands of users gives the RTI story the makings of a bestseller.

In 1987 Aruna Roy, Nikhil Dey, Shankar and his wife, Anshi, moved into a hut in Devdungri, an obscure village near Bhim in Rajasthan, to work for some of India's poorest and most marginalised communities. Roy had then resigned from the IAS. Dey had abandoned a college degree in America and Shankar, a local, had struggled his way to becoming a graduate. The village was mystified by their presence.

As they began fighting shoulder to shoulder with landless labour for their right to minimum wages, battling corrupt officials and the dregs of feudal power, people began gravitating to the hut in Devdungri and in 1990 was formed the Mazdoor Kisan Shakti Sangathan (MKSS).

Most of us know the RTI story piecemeal: the

dharnas, hunger strikes, the catchy slogans and songs, the intense lobbying, the drafting of the law and the angst of getting it through Parliament.

"It isn't about people in power. It is about people's power" said Roy at the book launch at the India International Centre in Delhi attended by many RTI stalwarts like Shekhar Singh, Wajahat Habibullah, Naurti Bai, Kuldip Nayar and Tripurari Sharma. The book launch was one of many launches, the first being at Chang Gate at Beawar in Rajasthan where an epic 40-day *dharna* by the MKSS began on 6 April 1996.

The RTI law was the first law that came from rural India's landless labour, Scheduled Castes, marginal farmers and women. In every fight, the MKSS realised how critical it was to get access to information from the government to expose the truth.

In drought-prone Rajasthan, the poorest people relied on government-funded public works for sheer survival. Despite earnestly working in the scorching sun, workers would be paid less than half the minimum wage of ₹11. Lower level functionaries and overseers would tell a spate of lies. The money was pocketed. Unravelling this mesh of corruption meant looking at what officials had written in their reports.

Roy, Dey and Shankar didn't think twice about diving into uncharted and risky terrain. They took on a feudal blustering landlord who terrorised the village with his goons. Once again it was government

papers that revealed he didn't own land he claimed as his own. Information was critical in finding out why no development reached villages — why schools remained ramshackle, or a panchayat *ghar* half-done or a road unfinished. On paper these were all described as being completed. The *jan sunwai* and the social audit evolved as a tool to expose corruption and it sent corrupt sarpanches running for cover.

The MKSS realised that a law on the right to information meant changing policy. They found friends among activist groups, journalists, sympathetic bureaucrats and finally Sonia Gandhi.

The draft of the law was discussed at meetings with NGOs and people's movements before being presented to the National Advisory Council (NAC). Around 60 million people use it annually and there is a sense of ownership because it's a law that has come from unsung heroes and not policy-makers.

"The book is a chronicle," said Roy. The MKSS maintained its records so a lot of material was gathered and put together. For those who attended, the book launch was also a trip down memory lane as familiar slogans like "*Hamara paisa, hamara hisaab*" were heard and songs of the movement were sung once again.

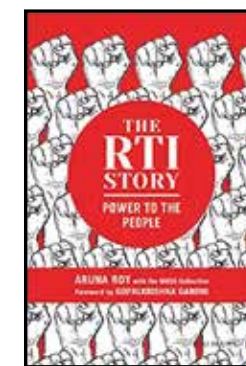
Roy emphasised the collective effort behind the book. Contributors, activists, journalists, academics, bureaucrats, legal experts were called onstage to be felicitated.

It was culture that connected people to the MKSS and all forms were carefully scripted, explained Tripurari Sharma of the National School of Drama who helped craft MKSS' cultural outreach. Songs,

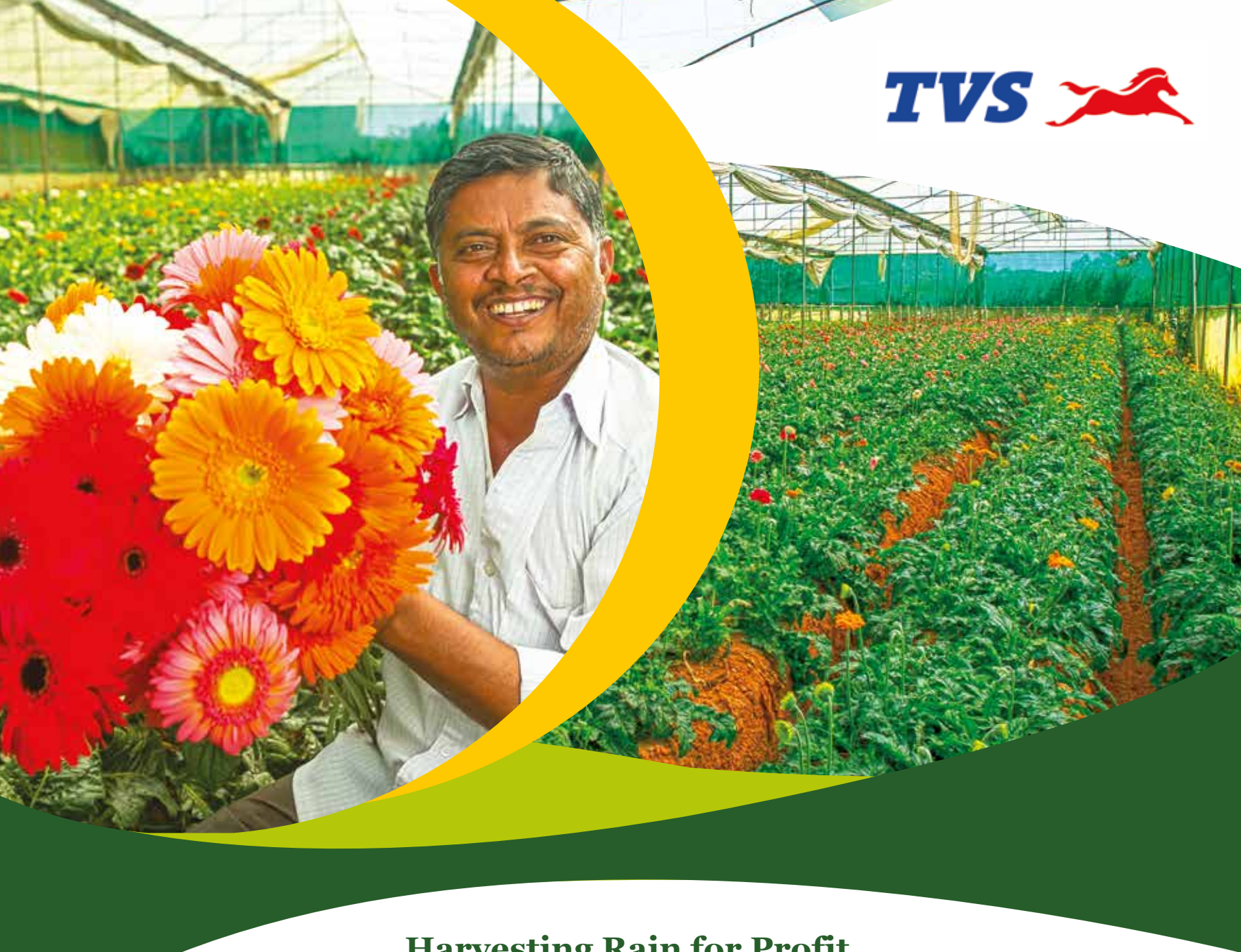
Continued on page 18



Tripurari Sharma, Annie Raja, Aruna Roy and Upendra Baxi at the book launch in Delhi



The RTI Story
Power to the People
Aruna Roy & MKSS
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Harvesting Rain for Profit

Name: Shri Muniraj,
Village: Muthur, Krishnagiri district, Tamil Nadu

Muniraj, a marginal farmer with seven acres of land from Muthur village of Krishnagiri district, had a greenhouse where he practiced floriculture. However, a falling water table meant that irrigation became a problem — especially during summer months even for drip irrigation.

To overcome the problem of insufficient water, Srinivasan Services Trust (SST) encouraged Muniraj to save every drop of rainwater falling on his green house. SST provided technical information and engineering support for creating a pond, next to the greenhouse, large enough to collect six lakh litres of rainwater. To prevent loss by seepage, the pond was lined with a polythene sheet and a shade net was used as cover to help arrest loss by evaporation. The pond gets filled up with 3 days of rain. The water saved in this pond is sufficient for the crop needs for one season.

IMPACT: Muniraj is now financially secure and earns more than ₹30,000 per month. He has built a pucca house and also bought a car. He has become an expert on rainwater harvesting and offers advice to several villages in the area.

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Organic farming thrills students

Bharat Dogra
Bhubaneswar

PRADHYUMAN is a student of Class 8 in Shri Jayadev Shiksha Kendra school in Bhubaneswar. He says enthusiastically, "Seeing organic cultivation practices was such a great educational experience. We can't stop talking about this. Students now want to know more about healthy food. We are even starting an organic garden on our school's roof."

His teacher, Pradeep Kumar Barik, is no less enthusiastic. He says, "There is a real change in the attitude of the students after they visited organic farms and saw animation shows about healthy food and against junk food. They are more responsive to our talks on healthy and safe food now. Junk food will soon take a beating here."

Pradeep Kumar Pani, principal of the school, says with a mischievous smile, "It isn't as if no student brings *kurkure* and chips in his tiffin box now. But he is more likely to try to hide it. It is no longer the 'in' thing to eat junk food. Healthy food gets more respect now."

As students and teachers walk up the stairs to show us their upcoming roof garden, the principal explains that they are likely to expand it quickly to about 400 organically grown vegetable and medicinal plants. In addition, there will be several creepers, he says. The vegetables grown will be used in the school canteen and hostels.

This is just one of several schools in which Living Farms, a voluntary organisation, is spreading the message of organic food and farming as well as healthy eating habits. Dr Jagatbandhu Mahapatra, Project Coordinator of Living Farms, explains, "We first try to identify schools which are receptive to our efforts. We then hold meetings with selected teachers and students. Class 8 is chosen for special attention as students are grown up but at the same time will stay long enough in the school to learn more about this. Then

we organise tours to organic farms. As far as possible we also try to involve schools in planning and planting a nutritious organic garden in their school. These are on a seasonal basis — monsoon, winter and summer gardens. Where there is less space we recommend a roof garden. Finally, with the help of women's groups we organise recipe fairs of organic food with special emphasis on millets."

Abhishek Dwivedi, who heads the campaign unit, explains, "In this system, there is certainty of follow-



The children grow a variety of vegetables which are used in the school canteen

'It isn't as if no student brings *kurkure* and chips in his tiffin box now. But he is more likely to try to hide it. It is no longer the 'in' thing to eat junk food. Healthy food gets more respect now.'

up action so that there is more durable impact. When we take students for field visits, I take personal care to satisfy their curiosity."

Of course, all steps are not possible in all schools and work has to be tailored to the comfort levels of school managements. The Auroville School of Integral Education has more space so it has been possible to experiment there with a nutrition garden. A play, *Fanta vs Nimbu Pani*, written by the

students of this school has been a hit and won the first prize in a competition.

On the other hand, in St Xavier's High School, Living Farm's intervention had to be confined mainly to stopping the plentiful use of colour additives in the school canteen to protect the health of schoolchildren. In Kala Rahungya School, the intervention was in the form of composting and useful disposal of kitchen waste (especially waste generated in preparing the mid-day meal).

Shahid Nagar Government School has several junk food shops located nearby. So here more attention was paid to a campaign against junk food. Unmukt Creative Centre School has special skills in the arts, so paintings by its students have been used in the campaign for organic food. Its principal, Shweta Aggarwal, is an expert in kitchen gardens so she has contributed her skills.

A recipe competition based on organic food is a common activity in most schools covered by this campaign. The idea behind the campaign is to check the spread of habit-forming junk food and introduce nutritious foods based on healthy farm practices among more students. As Pani points out, an additional welcome aspect is that students from a rural background show up as better informed in these matters and their knowledge starts getting due respect.

Living Farms also works among tribal farmers of Rayagada district. Here, students also learn about the organic foods produced by tribal farmers, particularly millets. Some schools in Rayagada have also been contacted so that their hostels can get organic food grown or gathered by tribal farmers.

This campaign promoting organic, healthy food supported by organic farming practices is catching the attention of students at an early age and hopefully these lessons will stay with them for long. ■

The RTI story

Continued from page 17

theatre, slogans or Shankar's famed puppets reflected what people were thinking, their deepest concerns.

The book is also a story of great courage and determination, often moving and peppered with wry humour even in dark situations. It reveals the wisdom of rural women. Naurti Bai, a key leader of the movement, didn't know how to read and write yet she fought panchayat elections, became sarpanch of Harmada village, learned computers, ensured money was spent on development and got

12 *bighas* cleared for a cemetery for the Muslim community. And she continues to fight. She is the lead petitioner against a government order that bars those who haven't passed Class 8 or can't read and write from contesting for the post of sarpanch.

"RTI is a law that empowers people to monitor the government and not the other way around," said Shekhar Singh, convener of the National Campaign for People's Right to Information (NCPRI). Nepal and Bangladesh copied India's RTI law but it hasn't really taken off there because there isn't any sense of ownership, he said.

Singh, an academician, said that while the law

had been successfully and widely used, the book would have done well to document the weaknesses that have also manifested themselves over time. The appellate system, for instance, does not deliver and appeals don't go through easily.

But laws are not written in stone and the RTI Act will see changes — some for the better and some for the worse. Nevertheless, it set a precedent and was followed with other laws which addressed the concerns of marginalised people in rural India like the employment guarantee law, the law on food security and the law on rehabilitation and resettlement of people impacted by projects. ■



Water for Life.

Project Neer at Hirve village was started in Mokhada block, Palghar district of Maharashtra which faced the issue of acute water shortage – resulting in seasonal cultivation and low-income levels, which forced the villagers to migrate in search of employment.

To help solve this problem, here's what we did with our implementation partners and contribution from local communities.

The project set up a water pump along with 1,700 metres of pipelines and also developed drip irrigation grid farming through solar-powered lift irrigation system. This forced the untouched waters from the valley up into the hills, and provided water for daily consumption as well as farming.

The implementation has been a success. Farmers gained access to almost 90,000 litres of water and were able to extend their cultivation cycle from a single Kharif crop to cultivating Rabi crop too. The word spread; farmers from across the river approached Project Hirve, hoping to benefit from it. Together, we covered and cultivated more than 100 acres of land.

The project has had a positive impact on over 400 lives across 9 villages. In addition to extending cultivation cycles, increasing the income levels and reducing migration, access to water has also improved hygiene levels and reduced drudgery.

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PICTURES BY ADIKE PATRIKE



Srinivas Achar Manchi, publisher of Adike Patrike with Shree Padre, executive editor. Standing behind are Shiny, Sunitha, Na.Karant Peraje and Sharada

JACK'S ANGELS

How farmer-journos at Adike Patrike made the jackfruit a star

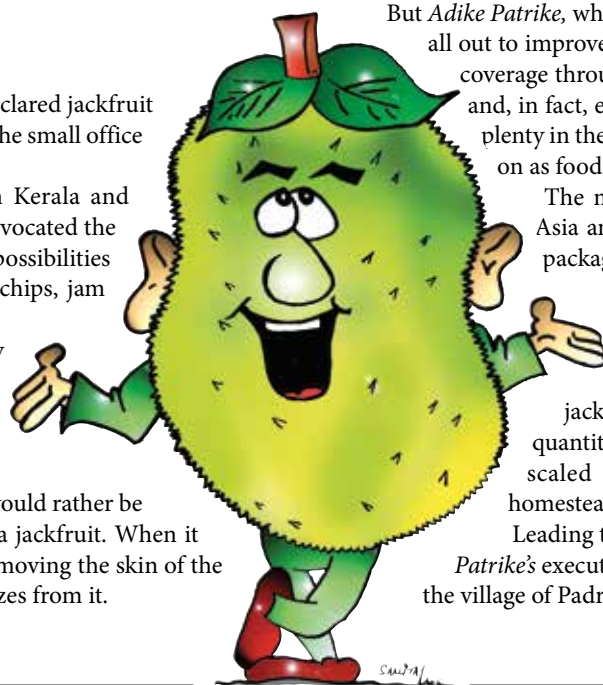
Civil Society News
New Delhi

WHEN the Kerala government recently declared jackfruit the state fruit, celebrations broke out in the small office of Adike Patrike, a Kannada monthly.

Published from Puttur, on the border between Kerala and Karnataka, Adike Patrike has for almost a decade advocated the nutritional benefits of jackfruit and the commercial possibilities from turning it into an array of products such as chips, jam and ready-to-cook pieces.

The announcement in Kerala is a happy vindication of the efforts made by the magazine, which consists of stories reported by farmers as they share their successes in their fields.

Jackfruit has had a lowly status among farm produce. It is not appealing to the eye and farmers would rather be seen holding a mango or a comb of bananas than a jackfruit. When it falls from trees and rots on the ground it stinks. Removing the skin of the jackfruit is messy because of the sticky milk that oozes from it.



But Adike Patrike, whose slogan is 'pen in the hand of the farmer', has gone all out to improve jackfruit's image. It has provided some 400 pages of coverage through which it has shown that jackfruit is easy to grow and, in fact, enjoys a quiet popularity in rural homes. Available in plenty in the southern states, it is inexpensive and so can be relied on as food security.

The magazine has also looked at examples in Southeast Asia and Sri Lanka where jackfruit is being processed and packaged. If these countries could value-add so can India.

In fact, rural families are already doing things like making chips from jackfruit and it is made into a curry and eaten in homes. The ripe jackfruit is also popular. In markets it is not uncommon for jackfruit to be cut and sold, ready to be cooked in small quantities. Such practices need to be better organised and scaled so that they go beyond being scattered across homesteads and farms.

Leading the spirited campaign to promote jackfruit was Adike Patrike's executive editor, Shree Padre, a farmer himself who lives in the village of Padre in Kasaragod in Kerala, not too far from Puttur.

As Padre saw it, jackfruit had inherent star qualities and wide appeal even though it got passed off as a humdrum vegetable. The response to Adike Patrike's stories was proof of jackfruit's popularity. People responded warmly with ideas and suggestions.

At Civil Society we saw some of this when Padre (who is a senior contributor to our magazine) wrote on jackfruit for us. He did three cover stories and innumerable smaller ones and each time we were awash with comments, recipes and assertions about the health benefits of eating jackfruit.

Official endorsement of jackfruit was long overdue and it has now come from the Kerala state government, which intends to not only encourage the growing of jackfruit but also provide incentives for creating products from it and position it as a driver of employment and rural prosperity.

Even before he became Kerala's finance minister, Thomas Isaac was writing blogs and supporting efforts to plant jackfruit. Isaac has made a budgetary provision of ₹5 crore for jackfruit development in Kerala.

Kerala's decision will prompt other states to think of the opportunities they are missing out on. Jackfruit is grown and consumed across the country though it might not be quite as common everywhere as it is in the south.

10 YEARS OF STORIES: Adike Patrike has shown how a small publication can bring about big changes. It has taken 10 years of sincere and innovative coverage, but jackfruit has finally got a makeover.

"We published so many stories on jackfruit that people began saying Adike Patrike had become Halasu Patrike or 'Jackfruit Magazine,'" says Padre.

There was interest in the coverage, but by and large people were not convinced that it would make a real difference to the status of jackfruit or seriously benefit the farming community.

The magazine was, however, having an impact slowly and imperceptibly. For instance, farmers began using better quality saplings of jackfruit. They also began taking to the agronomic practice of thinning by which extra tender fruits are cut off at an early stage to get better quality fruits. Jackfruit plant sales generally went up. Housewives experimented with recipes. People would ring up the magazine, asking for information, and the odd jackfruit festival began to be held.

Adike Patrike experienced what most publications cutting a new path do — readers can be impressed and influenced by coverage but do not necessarily respond readily. The enthusiasm of the Adike Patrike team didn't seem to be rubbing off on readers. It took a while and as many as 31 cover stories for momentum to build.

The first cover story was in 2007. An advertisement in a local newspaper said that a Karnataka company was coming out with a jackfruit product. Adike Patrike got in touch with Gokul Fruits and even before visiting the factory it was decided to make it the cover story. Never before in Kerala and Karnataka had anyone made such a serious business investment in jackfruit.

"Salty jackfruit chips were not new to us. They were being made in tonnes in Karnataka and Kerala. But to produce vacuum fried chips from fruit like Gokul Fruits was planning, was an altogether different thing," recalls Padre. "It had never happened before."

RUN BY FARMERS: Adike Patrike is run by farmers. They report, edit, supervise production and also handle the distribution. Padre is executive editor and Na.Karant Peraje is assistant editor. In addition to being farmers themselves, they have journalistic experience. Other farmers learn to report from the fields

about successes and failures.

The magazine is dedicated to the farming community. It was started in 1988 by the All India Areca Growers Association, which made the initial investment and then it was handed over to the Farmer First Trust. It has become self-sustaining with revenue from sales and advertising.

"Each issue has a cover story. Though we are not a commercial magazine, we are professional and are on the stands promptly every month. Almost all our stories are exclusive and many are commissioned. Long ago we decided we wouldn't be able to run the magazine on unsolicited articles. That's why we identify the subjects, developments, emerging issues, solutions to farmers, problems, etc. and assign a journalist or our own trainee to write it. The behind-the-scenes effort in getting out our 48 pages every month is enormous. We provide need-based information. Readers are convinced that our information is reliable. Adike is no longer just a magazine. It has, over the years, become a friend of farming families," explains Padre.

Adike Patrike literally means arecanut magazine. It was originally meant to serve the information needs of arecanut farmers. But over the years it has gone



Jackfruit pulp from Sindhusfurti



A recent jackfruit festival at Lulu Hypermarket in Kochi

Adike Patrike has provided some 400 pages of coverage on jackfruit. It has done stories on fruits like avocado, kokum and passion fruit. It reports on farm techniques such as new ways of grafting the tomato plant.

much beyond this captive role.

The magazine looks far and wide for ideas related to farming. It has done stories on fruits like avocado, kokum and passion fruit. It reports on farm techniques such as new ways of grafting the tomato plant. Water conservation has been an area of interest. From electronic fences to keep out wild boar to labour saving techniques and machines invented by farmers, the magazine captures useful information wherever it can find it.

It has picked up trends like jackfruit replacing rubber in Kerala and the use of banana stems in Gujarat. The magazine has gone all the way to Kashmir to take a look at saffron farming.

When a story idea is decided, either it is given as a freelance assignment to a journalist or a farmer-journalist is asked to collect the basic information. The story is then written up and played back to the farmer to avoid any errors.

The farmer-journalist gets the byline but a lot of effort goes into pulling the pieces of the story together so as to make it readable and credible.

The core editorial team consists of Padre and Peraje, who deal with farmer-journalists and freelancers and put each issue together. There are three non-editorial hands who look at office management, distribution and booking of advertisements. The publisher, Srinivas Achar Manchi, is an engineer-turned-farmer. An editorial board member, Padaru Ramakrishna Shastry, writes on machinery and scientific topics apart from providing farming tips.



Sri Lanka is the world leader in value-added jackfruit products

A copy of *Adike Patrike* is priced at ₹25 and an annual subscription is ₹275. It is available online at www.adikepatrike.com. The digital version is very basic and an upgrade is in the works.

With committed readers in rural areas, the magazine attracts advertising from companies digging bore wells and manufacturers of dryers. Nurseries, pump set makers and cooperative banks also advertise. But since it is committed to non-chemical farming, the magazine gets no advertising from pesticide and fertiliser companies and willingly forgoes a lot of revenue.

Adike Patrike is unapologetic about being activist in its orientation. Padre argues that many of the magazine's successes could not have been possible if it had stuck to the traditional norm that journalists have to be spectators and not players.

"Our experience from the campaigns we have carried out in the past — chemical-free farming, pen in the farmer's hand, rainwater harvesting and so on have made this very clear to us. Only by coupling information dissemination with activism have we made inroads into people's hearts. It is the approach we chose for jackfruit too," explains Padre.

The magazine has put people in touch with each other. It has a database of hundreds of names of people associated with jackfruit cultivation, research and businesses. When a big seminar, Panasam 2009, was held it was to *Adike Patrike* that the organisers turned to get a list of people to invite.

Adike Patrike suggested that Dr Balasaheb Sawant Konkan Krishi Vidyapeeth in Dapolin Ratnagiri district in Maharashtra hold a jackfruit festival in 2014. It provided the university with addresses and numbers of most of Maharashtra's jackfruit activists.

"We took great joy in connecting the information seeker and the information provider. This strong networking and interlinking have helped the jackfruit movement grow faster," says Padre.

Foreigners wanting to know about jackfruit in India often turn to the magazine. Padre also reaches out a lot. He has done at least 100 presentations in Kerala, Karnataka, Goa and Maharashtra on jackfruit.

Two books have been brought out by the magazine — one in Kannada and the other in English. They were put together in just 10 days for a jackfruit festival in Wayanad in Kerala.

STUDY TOURS: *Adike Patrike* has gone on study tours to broaden its understanding of what can be done to promote jackfruit cultivation and processing.

In Sri Lanka, it found that there were severe restrictions on cutting jackfruit trees in much the same way as sandalwood trees can't be felled in India.

Sri Lanka has 14 organisations for providing training on jackfruit value addition. India does not have even one. Sri Lanka produces canned jackfruit curries, which are ready to heat and eat. It has a thriving cottage industry in pre-cut jackfruit.

Jackfruit pulp is an example of the advantages of reaching out. Agricultural scientists would tell Padre that jackfruit couldn't be made into pulp in the same way as mango is made into pulp and packaged.

But in May 2012, he was tipped off that jackfruit pulp was being made in the Konkan region. *Adike Patrike* got in touch with Mohan Hodawdekar of the KoNiMSfurti initiative. After a brief interaction, he wouldn't take *Adike Patrike's* calls but the magazine didn't give up. After it called him no less than 35 times, he finally decided to talk and agreed to show the magazine how jackfruit could be



Shree Padre taking pictures of jackfruit products at a jackfruit festival



Cutting jackfruit is an onerous task but in Sri Lanka it has been perfected

'Only by coupling information dissemination with activism have we made inroads into people's hearts,' says Shree Padre.

pulped. Today there are at least 10 companies in Kerala producing jackfruit pulp.

A tour to Vidarbha had two objectives. The magazine wanted to see and document how jackfruit trees had come up on black cotton soil. It was believed that such soil was not suitable for jackfruit. Second, Padre wanted to study how Kerala's abundant tender jackfruit supply is received and used there.

GLOBAL OUTREACH: Jackfruit's popularity has spread from Kerala and Karnataka to the world. Ken Love, a tropical fruit expert and great jackfruit lover in Hawaii, says: "It has taken the world by surprise. I never dreamed jackfruit would reach small cities of the US. Not only vegan or vegetarian specialty restaurants, it is showing up in mainstream restaurants and hotels too in America."



Chief Minister Pinarayi Vijayan, Finance Minister Dr Thomas Isaac & Agriculture Minister V. S. Sunil Kumar inaugurate a jackfruit truck



Vinamit, a company in Vietnam, manufactures large quantities of vacuum-fried jackfruit chips

Padre says, "At least half-a-dozen foreign youngsters have approached me with deep concern about how they can curb the unfortunate wastage of this food. Julian Fang, an Australian, worked in a restaurant to earn an air ticket to come to our country to explore this personally."

Sri Lanka is undoubtedly the world leader in promoting jackfruit as a vegetable and creating opportunities through value-added products. But it is Indonesia which consumes the highest percentage of jackfruit as a vegetable.

In Vietnam, a company called Vinamit has 10,000 hectares of jackfruit and has contract farming arrangements. Vinamit makes vacuum-fried jackfruit chips and wanted to know from *Adike Patrike* how it could import jackfruit from India.

SMALL UNITS: In India the most processing is done in Kerala but it is mostly by small and home-based units. The products are invariably sold during festivals because small producers don't have the wherewithal to enter organised markets or directly reach customers.

The odd company is worth watching such as Artocarpus Foods in Kannur. It is run by Subhash Koroth and is a fully committed jackfruit enterprise into exports and local sales. It has been appointing distributors to build its sales.

There are innovative products such as jackfruit modak, which is produced by Sindhusfuri, a unit in Kudal, Maharashtra. They buy soft-fleshed jackfruit from farmers for ₹5 per kg, convert it into pulp and use it for making modak. Their Fanas Modak is attractively packed and sold in hypermarkets in Pune and Mumbai. Soft-fleshed jackfruit is mostly wasted but they have put it to good use.

INSPIRED READERS: Stories in *Adike Patrike* have been an inspirational influence on its readers. Shivanna of Parivarthan makes several jackfruit products including Jaffee or jackfruit coffee. Fruits Pride, another value-addition group, makes jackfruit pulp. There are others like Shripad Hegde and Vijayakumar Koppa who have been making value-added products. For them, *Adike Patrike* is their monthly quota of inspiration and new ideas.

About 50 households in Adyanadka began supplying jackfruit for making ice-cream for one year. They sold 27 tonnes, earning about ₹1.5 lakh. For decades they had done nothing with their jackfruit trees. Not one household in the past had earned even a rupee from jackfruit.

Thanks to *Adike Patrike*, several farmers who had never thought it worthwhile to grow jackfruit have now planted 10 to 15 trees each on one or two acres. They are planning to market jackfruit. Gabriel S. Veigas, an ex-forest officer and a reader, informed the magazine that he had planted 300 jackfruit trees and expected a good crop of jackfruit in the next two years. He will then organise a jackfruit festival. ■

Adike Patrike can be contacted at: adikepatrike@gmail.com/8073140917

A bag to beat the plastic ban Omkar Kamat's eco-friendly solution

Derek Almeida
Panaji

MEASURES for protecting the environment throw up alternative business opportunities as well. The banning of plastic bags in Goa from 30 May, for instance, could have knocked Kemplastic Systems out of the market, but instead the company has begun making bags from biodegradable plastic and corn starch.

Kemplastic Systems, launched in 2005 and based in Old Goa, had been manufacturing 80,000 plastic bags per month. The ban put its entire business in jeopardy, but the company have now tied up with Luibeg Environmental Technologies in the United Kingdom to go biodegradable.

Omkar Kamat, who runs Kemplastic Systems, says: "I used to regularly attend industry exhibitions where I met international players from China who were producing biodegradable bags and I thought, why not give it a try?"

The basic raw material for turning plastic into biodegradable plastic is d2w which hastens degradation and, more importantly, breaks down the chemical composition of plastic by a process of oxidation.

"In order to start manufacturing biodegradable bags we had to invest ₹4 lakh," says Kamat. "While the main bag making machine remains the same, a mixer to mix the d2w additive and a change in the heating arrangement are necessary to produce biodegradable bags."

Biodegradable bags cost about 15 percent more to make, but that increase can easily be passed on to the consumer or the vendor.

A bigger challenge is to get the government to exempt biodegradable bags from the ban and for the Goa State Pollution Control Board (GSPCB) to invest in testing equipment.

The d2w bags were pushed into the market on 25 March and were made available at various outlets around the state from 1 April.

Kemplastic has also started manufacturing corn

starch-based bags. "These are naturally biodegradable and the strength is good enough to carry daily shopping weights," says Kamat, who has a background in accounts but did an internship with a plastic unit in Mysore before getting into the business himself.

Biodegradable bags cost more to make but the price can be passed on. A bigger challenge is to get the govt to exempt these bags from the ban and invest in testing equipment for the Goa State Pollution Control Board.



Omkar Kamat of Kemplastic Systems in his factory

The basic ingredient for corn starch is a polymer called starch-based PLA, which is imported from FKUR, Germany, and it is almost four times more expensive than the normal plastic.

"While the cost of raw material for plastic bags is around ₹120 per kg, it is 200 for d2w bags and 400 for corn starch," says Kamat.

Kemplastic is also manufacturing d2w bags for garbage disposal. "These bags are colour coded with green for wet garbage and black for dry waste," said Kamat, who cautions that there is a class of bags which look and feel like cloth, but they are pure plastic. They are made with polypropylene non-woven fabric.

However, irrespective of what material the bags are made of, degradation will not take place if they are scattered along the road. "Micro-organisms are required to start the process," explained Kamat who was of the view that collection of bags by either panchayats or municipalities was still the best way of getting rid of them. The good news is that corn starch bags can be recycled by existing treatment plants and separation is not required.

Like most manufacturers, Kamat also does not have faith in the government to implement a ban.

"We have been complying with every rule of the government. We have stopped producing bags with

less than 50 micron thickness. In 2014 we started printing our name and address on the bags. These processes increase the cost of bags and we are made to compete with thinner illegal bags which pour into the market from Karnataka and Maharashtra," laments Kamat.

ROLE OF PANCHAYATS: On 12 March the Rumdamoll-Davorlim panchayat, located just outside Margao city in Goa, became the first to ban plastic carry bags in its vicinity. The panchayat has started distributing cloth bags to households and has instituted fines ranging from ₹100 to ₹500 for those using plastic bags and ₹2,000 for shopkeepers and vendors providing such bags to customers.

Announcing the ban, Vinayak Volvoikar, a panchayat member, said, "The village of Rumdamol-Davorlim has seen the ill-effects of plastic bags. These bags are scattered all over the village and consumed by stray cattle. In order to put an end to the plastic menace, the panchayat adopted a resolution in the body meeting on 28 February to ban plastic bags."

The decision of the panchayat is in line with that of the state government to ban all plastic carry bags.

On 19 December last year, which is also Liberation Day, Chief Minister Manohar Parrikar announced at the official state function: "From 30 May all plastic carry bags will be banned. We are making the announcement in advance so that all those who have made it their economic activity should not complain at the last minute."

The announcement naturally rattled local plastic bag manufacturers who feel they are being unfairly targeted. They blame the Goa State Pollution Control Board, panchayats and municipalities for failing to implement an existing ban on carry bags below 50 micron thickness.

"If the ban is implemented, around 800 to 1,000 persons employed in over 15 units that are manufacturing plastic carry bags in the state could lose their jobs," said Sudesh Rane who has a manufacturing unit at the Kakoda Industrial Estate and heads the plastic wing of the Goa Small Scale Industries Association.

Plastic bag manufacturers, who met Parrikar to apprise him of the impact of the ban on industry, were told to switch to starch-based bags. Said Rane, "Starch-based bags are not viable because the cost of input ingredients is around ₹400 per kg, whereas HDPE which is used to make plastic bags, costs around ₹140 per kg. Besides, there are issues of shelf life, strength and modification of machinery which have to be looked into."

However, the larger problem is the inability of the government and local bodies to weed out thin plastic carry bags which are openly distributed by vendors and shopkeepers without fear of fines or punitive action.

Explained Rane, "When the government banned bags below 40 micron thickness, manufacturers in Goa complied. Then we were asked to print the name of the manufacturer on the bag and we agreed. Then the central government banned bags below 50 micron thickness and once again we fell in line. But this did not end use of thin plastic bags because the government did nothing to stop their free distribution."

Rane also claimed that when names of manufacturers and retailers distributing thin blue

plastic bags were submitted to local bodies and the government, they were tipped off before conducting raids. "Now we are being made to pay the price for the failure of panchayats, municipalities and the government," lamented Rane. "If the earlier bans had been strictly implemented, we would never have reached a stage where a total ban is required."

NOT IMPLEMENTED: There is some merit in the accusations made by Rane. On 1 July 2002, Goa banned all plastic carry bags of less than 40 micron thickness. In December 2001, the Department of Science Technology and Environment issued a

committee to study the feasibility of a total ban on plastic carry bags or any other strategy to combat littering of plastic bags. But nothing came of it.

In 2016, the central government notified the Plastic Waste Management Rules. According to Rule 14, every retailer or street vendor who sells or distributes commodities in plastic bags which are not labelled or marked is liable to pay a fine specified under the bylaws of local bodies.

Rule 15 further says that shopkeepers and street vendors who wish to provide plastic bags should pay a plastic waste management fee of ₹48,000 annually or ₹4,000 per month to the local body.



Clinton Vaz of Recycle Waste Management Services which recycles plastic waste

A panchayat has started distributing cloth bags to households and has instituted fines ranging from ₹100 to ₹500 for those using plastic bags and ₹2,000 for shopkeepers and vendors providing such bags to customers.

notification empowering chief officers, municipal engineers, sanitary inspectors and municipal inspectors of all the municipal councils and the secretaries of panchayats located in the urbanised talukas of Bardez, Tiswadi and Salcete to implement the ban on thin bags.

In March 2002 all panchayat secretaries, collectors, deputy collectors, excise inspectors and police sub-inspectors were also empowered to take action under the Goa Non-Biodegradable Garbage (Control) Act, 1996. Then, in September 2002, two committees — one for North Goa district and the other for South Goa — were constituted to implement the 40-micron rule. In October 2004, two flying squads were set up for the same purpose. Sadly, till date the 40-micron rule has not been implemented in letter or spirit.

So the government, in November 2005, formed a

None of these rules are being implemented by either municipalities or panchayats.

At a recent meeting of the state-level monitoring committee headed by the secretary, urban development, the director, municipal administration, was instructed to weed out retailers and vendors selling thin bags. Rane, who also attended the meeting, said, "If the municipalities do their job, around 70 percent of the problem will go away."

Although Goa is the smallest state in India, it has the highest urban population. According to the 2011 census, around 62 percent of the state's 1.4 million population lives in urban areas — making municipalities primarily responsible for implementation of plastic waste management rules.

Goa also plays host to around six million tourists

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The GSPCB is generating awareness about plastic waste with the help of NGOs, but nothing much will be accomplished if those authorised to implement the 50-micron rule shirk their responsibilities.

each year which puts enormous pressure on coastal villages which are struggling to segregate and clear garbage.

According to Richard Dias, supervisor at the Saligao waste management plant, of the 100 tonnes of garbage that arrives every day, plastic constitutes 10 tonnes. Between January and May this year an average of 300 tonnes was transported each month to the Vasavadatta Cement plant at Sedam, Karnataka, for co-incineration.

What no one really knows is the quantum of plastic carry bags in the 10 tonnes of plastic received at the garbage plant at Saligao and whether Rane's claim that it is only four to five percent is true.

NOT BAGS ALONE : While environmentalists welcome the move of the government to ban carry

bags, waste management entrepreneur Clinton Vaz is not enthused. "It's a good move for publicity, but does not solve the problem," he candidly said. Vaz runs Recycle Waste Management Services and has been actively involved in recycling plastic waste for over a decade. Vaz was also involved in setting up over 100 waste composting sites around Panaji.

"There is already a ban on carry bags below 50 micron thickness, but it is not being implemented," argued Vaz. "Go to any part of India and you will find bags below 50 micron thickness being freely distributed by vendors and shopkeepers."

Echoing Rane, Vaz said, "Enforcement agencies never target manufacturers and when information is shared with municipalities, retailers and vendors are tipped off about impending raids." He is convinced that manufacturers, vendors and retailers

will find a way around the ban.

Vaz is one of the few who does not see merit in a ban on plastic. "We shouldn't be against plastic," he explained, "because that would put pressure on cloth and paper, which is a highly polluting industry. The emphasis should be on collection and recycling."

He also pointed out that extensive use of multilayered packets, especially for chips, are a bigger threat. "Any plastic with a silvery foil is not recyclable. So, how are you going to solve this problem? Bans are easy but where is the political will to implement?"

He said grocery bags are not such a big problem as they are recyclable, but collection is an issue. "The bag has to be clean for it to be recycled and even a little curry can undermine the process. Also, bags have to be sorted and the incentive of ₹30 for 10 kg of used plastic bags is not viable because it takes a lot of plastic by volume to make up 10 kg."

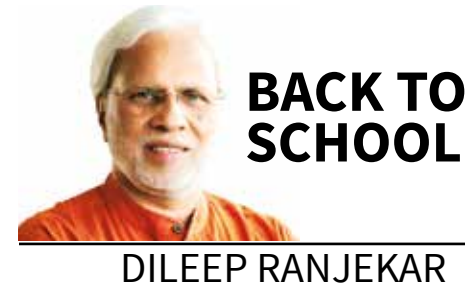
"This is one of the reasons we are trying to create awareness among hoteliers to use plastic tubs or aluminium foil because they are recyclable."

Levinson Martins, member-secretary of the Goa State Pollution Control Board (GSPCB), took a more circumspect view. "Almost everything is packaged in plastic these days," he said. "We need to take a holistic look at the packaging industry. The larger problem lies with non-recyclable material used for packing small quantities of shampoos, coffee, etc. This sort of packaging has made expensive products available to the common man, but collecting and disposing of these packets is a logistical problem."

The GSPCB is generating awareness about plastic waste with the help of NGOs, but nothing much will be accomplished if those authorised to implement the 50-micron rule shirk their responsibilities. The state-level monitoring committee headed by the secretary of urban development has had two meetings with government department heads, industry and waste management experts but no headway appears to have been made on what type of carry bags to ban or how to help industry make the shift to biodegradable bags.

As the 30 May deadline approaches, the government will have to get its act together if it wants to catch up with states like Delhi, Himachal Pradesh (below 70 microns) and Uttar Pradesh which have banned the plastic bag. ■

Exams for what?



IN our beloved nation, a culture exists to comment, react, debate, criticise and suggest quickfixes without knowing the deeper nature of a problem or making an attempt to analyse its root causes.

It was so once again during the recent episode of leaking out of the examination papers of the Central Board for Secondary Education (CBSE) exam. Newspapers and TV shows were full of sensationalised debates with people freely commenting on the leak and the possibility of a re-examination. Those with a vested interest took this as an opportunity to score political points. In the midst of the cacophony, parents and students had the most genuine responses. Their anguish was real and, for me at least, very revealing of the fragility of both our examination and education system.

The students said that, if the re-examination was held, they would have to prepare all over again and the tempo that they had built and the hard work they had put in to prepare would be lost. Many of them were not at all confident that they would be able to perform with the same (expected) success! Their comments brought home the weak foundations of their learning and the superficiality of our examination system. What the students were saying was: "Now that we have reproduced what we studied / remembered, we won't be able to write another examination because we are done with it." What this means is that education is equal to studying something, remembering it and reproducing it during the examination. While I do fully understand the anxiety of the students and parents, it deeply reflects our national attitude towards examinations.

Education is being equated with the ability to write exams, notch up high scores, get admission to institutions with high brand value and secure high-paying jobs. Thus, education is merely an instrument to achieve higher economic strength, status and power in society. And these are students from schools affiliated to one of the most aspirational educational boards in the country and is regarded as better than other boards in its curriculum, textbooks, methodology and preparation of students.

At the state level, it is not uncommon for exam papers to leak. So much so that these leaks often go unreported. 'Large-scale copying' is also rampant and happens in varying degrees especially in less supervised territories. There are instances of

answers being put up on a board at examination centres — which lends a whole new meaning to 'board examination'!

The issue really is not just how the papers leaked or who is responsible or whether we should be making such a huge fuss over exam paper leaks, but how we should view the assessment of student learning. This is the issue that needs radical review. In plain and simple words, we have to do away with the current unscientific and draconian system of examinations. We have to do away with one-time,

frequency and method of assessment that significantly influence the culture of assessment among schools, teachers, students and parents.

The design must ensure that the comprehensive objectives of the education curriculum such as conceptual clarity, higher order thinking (leading to independence of thinking), scientific temper, critical thinking, sensitivity, empathy, respect for others, promotion of constitutional values (socialism, secularism, democracy) and national cohesion are included as important factors to assess. These are



Students protesting against the leaking of papers of the CBSE exam in Delhi

In plain and simple words we have to do away with the current unscientific and draconian system of examinations.

completely summative assessment of students.

Learning assessment has at least two powerful objectives — (a) helping students develop and (b) helping teachers understand how their teaching strategies are working to contribute to student development! The primary purpose of any form of assessment is to know whether the objectives of the curriculum are being achieved. Just summative, one-time, mechanical examination not only does not achieve this purpose but leads to promoting a culture of learning by rote.

There are important issues such as design,

mandated by the National Education Policy and not optional. The current design encourages merely rote memorisation and in some proportion, application of learning. Very rarely does the design address the other curricular objectives.

Frequency of assessment must be such that it adheres to the basic purpose of student development. And development is a continuous process — not a one-time event to label a student's status of learning. The continuous comprehensive evaluation prescribed by the Right to Education Act is based precisely on this principle. However, we have introduced this sophisticated concept without preparing our teachers for it. As a result, they view it as an additional burden. We are completely ignoring the reality that a particular student may not perform well at a given point of time but would have learnt all the same.

Method of assessment envisages taking students into confidence and creating the most non-threatening environment for monitoring student development. The current examination method is

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WHERE ARE WE BEING READ?

Civil Society is going places...

Kutch, Porbandar, Chamoli, Bhavnagar, Ahwa, Tiswadi, Amritsar, Sabarkantha, Valsad, Sirsa, Hamirpur, Aizwal, Kinnaur, Dhanbad, Dumka, Palamu, Chamarajanagar, Haveri, Madikeri, Malappuram, Jhabua, Amravati, Kolhapur, Osmanabad, Bishnupur, Dimapur, Rajsamand, Mokochung, Mayurbhanj, Bathinda, Fatehgarh Sahib, Barmer, Hoshiarpur, Jhalawar, Auraiya, Farrukhabad, Lakhimpur Kheri, Pratapgarh, Burdwan, Murshidabad, Pauri Garhwal, Cuddalore, Ireland, Sivaganga, Kancheepuram, Varanasi, Bellare, Erode, Ramanathapuram, Kanyakumari, Lohit, Perambalur, Pudukkottai, Shahdol, Goa, Tiruvannamalai, New York, Nalgonda, Domalguda, Bhutan, Tezu, London, Thailand...

Civil Society

Bengal's erosion of democracy



**HERE
& NOW**

SUBIR ROY

WEST Bengal is considered a pioneer in initiating panchayati raj. It has been holding elections uninterrupted since 1978 to keep in place a system of local government two decades before the 73rd amendment to the Constitution mandated this for rural India. Yet, four decades later a question mark hangs over the future of a credible panchayati raj system in the state because of the controversies surrounding the current elections.

All the important opposition parties in the state — the BJP, CPI (M) and Congress — have joined in an outcry over their candidates' inability to file nominations because of physical intimidation by ruling Trinamool Congress workers. This, the opposition parties say, is Trinamool's way of ensuring total control over the panchayats for the next five years.

If you win a huge percentage of seats uncontested then that makes the results a *fait accompli*. In the last panchayat elections held under Left Front rule in 2008, the ruling formation won 5.57 percent of the seats uncontested. This has already jumped to 10.66 percent in favour of the Trinamool in the first panchayat elections held under its rule in 2013.

The outcry over this new form of electoral rigging even before polling has gained credibility because of the way the West Bengal State Election Commission (SEC), which oversees the process, has conducted itself.

In response to the protest over the inability to file nominations, the SEC first extended the deadline for filing and then under pressure from the state government (it said changing an electoral schedule once it is announced is not permitted under the state Act) reversed its own order. Thereafter, the High Court put a stay on the reversal order.

Exams for what?

Continued from page 27

an antithesis of this principle, leading to so much stress / fear that many students run away or, in extreme cases, even commit suicide. I am also not clear on one question — are we trying to understand how much the student has learnt or do we want to test how much a student can reproduce in three hours? There are also issues such as the logic behind three hours for a 100-marks examination and two hours for a 50-marks paper. This has led to the rise of coaching 'factories' which are training students to "crack the exams" rather than ensuring deeper learning.

A student's future has come to depend on success

If this is the legal position, the attitude of civil society is seen in the way some intellectuals have changed their stance. They had joined other intellectuals in raising their voice against the violence in Nandigram and Singur during Left Front rule, thus creating a public opinion that helped Trinamool come to power. Now these intellectuals have come out against Trinamool's role in the filing of nominations.

The future of a credible local government system in the state is important for two reasons. One, over the years the panchayat administration has come to

Panchayats hold the key to delivering some measure of administration without which stubborn and lingering levels of rural poverty cannot be fought.

matter a great deal for rural people. Panchayats have, in a way, become the implementing arm of the government for various development initiatives and the visibility of newly made rural roads, homesteads and toilets under the Swachh Bharat programme bears testimony to that. Panchayats matter and must remain answerable. No party can hijack them and get away with it.

Plus, what should be critical for Trinamool supremo and West Bengal Chief Minister Mamata Banerjee is that this is the wrong time for her to get an anti-democratic label. She has emerged as a key leader in the opposition parties' attempt to unite and dislodge the BJP in the 2019 parliamentary elections.

She will lack credibility when she tells the people of India that the future of democracy must be

in the board exams. As a result, students, teachers and parents are willing to do anything to score better — including resorting to malpractices. In a society where "corruption" is widely accepted, unscrupulous elements are bound to thrive. An honest and efficient head of the CBSE board will not be able to make a difference.

The New Education Policy, which is in the making, must address the assessment and examination system in its entirety. The leak is really no more than a sensational story — not much different from debates that started upon actor Sridevi's sudden passing away in Dubai. We need to go much beyond drawing room conversations and sound bites.

Unfortunately, education doesn't get the serious

secured by removing the BJP from power when she herself is considered guilty of delivering a serious blow to democracy in her state. And it is no secret that Banerjee has for long harboured ambitions of becoming a true national leader.

Even aside of Banerjee's personal ambitions, there are critical systemic needs for a credible set of panchayat bodies to be in place. Panchayats hold the key to delivering some measure of administration without which stubborn and lingering levels of rural poverty cannot be fought. Plus, West Bengal has been traditionally strong in agriculture and last mile delivery for schemes to raise farm productivity is dependent on a system of functioning panchayats.

In a way, Banerjee is a victim of her own brand of politics. Her party's agenda has been delivered at the ground level by muscle power and she has gone to great lengths to keep local youth happy. Neighbourhood clubs have been receiving cash from the state to promote sports!

Ground-level support has also come from the popularity of the Kanyashree scheme (empowering high school girl students and young women), construction of rural roads and funds for homesteads.

Soon after coming to power, Trinamool revamped the public distribution system. Food riots, when the rationing system collapsed under maladministration and graft, played a key role in Trinamool defeating the Left Front.

Banerjee has thus been playing the benevolent dictator — both delivering some development and suppressing political opposition. Such dictatorships have been on the rise across the world in countries which earlier enjoyed a degree of democratic functioning, from the Philippines to Turkey.

But the Indian electorate has over time thrown out regimes which have been authoritarian (Indira Gandhi), corrupt (UPA) or simply non-performing (Vajpayee). So well-entrenched regimes, like the current BJP one, can be dislodged, sometimes with no credible political formation in sight, as in 1977.

But if what emerges from this popular desire for change is to survive, it has to function credibly and deliver. Banerjee can endure as a national leader only if she has credibility and that will be missing if democracy is being stifled in her own backyard. ■

public attention it deserves. Being in the education field for about 20 years, it is not unusual for reporters to ask me for my views on the Union or state education budgets. In the initial years I took great pains to provide in-depth analysis; then I realised that it was futile to do so for many reasons. Budgets come and go every year, what matters is what happens to the programmes announced under the budgets and how well or meaningfully the funds get spent.

So I have stopped giving my reactions and now reporters don't ask for my comments. With examinations, too, I feel we need to raise the level of discussion and go beyond leaks to reform the entire system. ■

Dileep Ranjekar is CEO of the Azim Premji Foundation

Hydropower no longer cheap



**WATER
WATCH**

HIMANSHU THAKKAR

WHEN Union Minister of State for Power Raj Kumar Singh laid the foundation stone for the 60 MW Naitwar Mori HEP in the Yamuna basin in Uttarakhand on 30 March, he called hydropower a clean and green source of energy. He forgot to add two other words that advocates of hydropower mention — that hydropower is cheap and renewable. He possibly knew that hydropower is no longer cheap or renewable. He should also realise that it is not even clean or green.

The cost of the Naitwar Mori project is already ₹648 crore at October 2016 prices, and levelised tariff of power from the project is assumed to be ₹6.39 per unit. The cost will only go up hugely. The assumption that the project will generate about 4.5 million units per megawatt installed capacity is unlikely to be realised. The all-India average in 2017-18 was 2.78 and 89 percent of India's operating power stations generate at below such promised levels. In all these calculations we are not even counting the real cost of adverse social and environmental disruptions that each such project causes on a massive scale.

Realising the unviability of hydropower projects, private sector companies have exited from nearly all the projects they were involved in across India. Singh's predecessor, Piyush Goyal, had repeatedly told Parliament about how 11,000-16,000 MW capacity hydropower projects remain stranded and the government has for the past two years been contemplating a package of incentives to kickstart these stranded projects. Possibly wiser counsel has prevailed and no such package has been finalised.

Just a week before Singh laid the foundation stone for the Naitwar Mori HEP with the Uttarakhand chief minister, a CAG report said that the cost of the Asian Development Bank (ADB)-funded 65 MW Kashang I hydropower project saw huge cost escalation to over ₹12 crore per MW, the cost of power from the project almost doubling and having gone way above market rates.

A week before Singh travelled to Uttarkashi district, to the banks of the Tons river, several reports surfaced about how the just commissioned power house and tunnels of the 330 MW Kishenganga hydropower project in Kashmir had developed such huge leakage that farms, houses and apple orchards of several farmers were badly damaged. Several reports have since emerged saying that the massive leakage has continued for several weeks and is yet to be stopped.

In the same week as Singh's function, news came from the Dzungu region of Sikkim that there was

massive explosion of dynamite near the proposed 280 MW Panan hydropower project, damaging several houses. The district collector was still compiling the report about the incident, when last heard.

Meanwhile, the reservoir of the just commissioned 1,200 Teesta III hydropower project in Sikkim overshot the rim stability works, giving possible indications of massive landslides in future. The project has already seen several deaths and even now, it is tragic that it is complete but only two of the six units can run since the power transmission lines are not in place! There is no one to explain



Union Minister for Power Raj Kumar Singh in Uttarakhand

why this is so. In any case, it is doubtful that the project will be able to sell its costly power.

In fact, in northeast India, the 2000 Lower Subansiri project of the National Hydroelectric Power Corporation (NHPC) remains stalled for over six years, following a massive agitation against the project in Assam due to downstream impact and disaster implications of the project.

It's important to note that power generation from hydropower projects in India continued to show a diminishing trend in 2017-18 as per Central Electricity Authority figures, even though the 2017 monsoon was normal. This trend has remained so for over two decades now.

In the week following Singh's inauguration of the Uttarakhand hydropower project, Nepal's new prime minister, Khadga Prasad Oli, was in India for his first trip abroad after being sworn in. A lot was expected from this visit, including on hydropower projects. But in what former Foreign Secretary of India Kanwal Sibal called "the bareboned joint statement" of India-Nepal, the prime minister did not utter the word hydropower. There was also no news about the proposed joint laying of the foundation stone of the 900 MW Arun 3 hydropower project in Nepal, being developed by the Government of India's Sutlej Jal Vidhyut Nigam Limited, which

was supposed to happen during the visit.

It is apparent that only a few, mostly public sector-funded, hydropower projects are going forward, largely because these companies do not have to bother about costs, delays or the viability of selling costly power. But these companies suffer too when costs become unviable. This was exemplified with the Jammu and Kashmir Power Development Corporation (JKPDC) which could not sell power from the Baglihar II project even at a cost price of ₹4.5 per unit. They had to ultimately sell the power at a loss. No wonder the JKPDC has commissioned a study about the viability of large hydropower projects.

Yet, as far as the Union Ministry of Environment and Forest's Expert Appraisal Committee (EAC) is concerned, it's business as usual in giving environment clearances without bothering about environmental, social or economic viability. In the case of the controversial Ken Betwa River Link Project, the EAC cleared the project even though forest and wildlife clearances were given on condition of taking the full hydropower component outside the forest/protected area, as the hydropower component was proposed in the middle of the forest and protected area and would have been a permanent nuisance for biodiversity and wildlife. Even in its most recent meeting three days before Singh's Uttarakhand function, the committee cleared the Luhri II project that is facing massive opposition in Himachal Pradesh. Another avatar of that project was declined funding by the World Bank, though the EAC had happily rubber-stamped approval of that avatar too.

The question arises, Why are we still pushing such unviable large hydropower projects, even though they are destroying our remaining rivers, forests, biodiversity and adversely affecting a large number of people and not delivering any viable benefits? A tough question? ■

Himanshu Thakkar is with the South Asia Network on Dams, Rivers and People

A manifesto for Bengaluru



CITY
LIFE

V. RAVICHANDAR

Karnataka is witnessing the election *tamasha* — a great spectacle with plenty of sound and fury. There are manifestos, but one wonders whether even the candidates bother to read them. There is little of substance to help voters decide between political parties on the basis of how they will fix the myriad problems that plague our cities and why they are deserving of our vote. One cannot help thinking of the entire exercise as akin to rearranging the deck chairs of the *Titanic* as it heads towards the iceberg. There is hardly any talk of necessary course correction to avert the looming disaster that awaits our unplanned, runaway cities.

Bengaluru, for instance, is on course to double its population to 20 million by around 2030. We are witness to a declining quality of life in the current city. So, it's fair to wonder what the vision is of our prospective leaders to head off the upcoming shipwreck as they seek our vote this May. There is a serious trust deficit between citizens and the elected representatives. So, can we expect less grandstanding and more openness to discuss solutions to fix the trust deficit?

With an engaged citizenry and expert insights, the contours of the solution set for our cities are well documented. The challenge is how do we find bipartisan consensus on embracing the solutions and parties slug it out on who has more audacious goals to fix the city and is better at execution. Here are some of the contours of the solution set to fix our cities that needs to be embraced by all political parties:

TO SAVE THE CITY, THINK 'CITY-REGIONS': A city, particularly a large one like Bengaluru, needs a guardian at the regional level. In our current political lexicon, it needs a *chowkidar* in the form of a proactive, vigilant regional authority to plan and secure our cities' future. The state needs to view a larger regional area that goes beyond the current thinking of a few satellite centres around a city. Unless this forms part of the larger vision, any incremental fixes to making a city liveable will lead to further influx — causing infrastructural collapse and deterioration in quality of living. One would think that politically this is a necessary and a catchy sell to voters. It creates local jobs, pitches for balanced regional development and will aid in attracting investors to all parts of the state.

GOVERNANCE AND ADMINISTRATION: For a mega city like Bengaluru, sans delegation, citizen participation at the ward level, decentralisation through multiple Corporations, integration across the Corporations and a zillion agencies at city-wide

level, there is no way the city's woes can be addressed. We need accountability through a directly elected mayor. And while we are on the subject, we need better human resources capacity in government, including the willingness to consider lateral recruitment of specialists to tackle our problems. A recommendation of multiple Corporations is made out to be a case of splitting the child to score political points. On the contrary, it strengthens the city brand by ensuring it's a great place to live and work. London, for instance, has 32 boroughs and it's one of the most iconic city brands.

PROACTIVE MUNICIPALISATION: The typical response to uncontrolled expansion on a city periphery is to bring them within the ambit of the



Politicians should adopt a bipartisan approach to urban development

City Municipal Corporation, as was done in Bengaluru in 2007. A decade later, the 110 villages brought into Bengaluru do not have water, sewerage or good roads. We need a clear road map for proactive planning of urban and rural bodies on the city's peripheries to prepare them for any future amalgamation. This could be considered 'municipalisation'. We need to identify and intervene in such areas in advance before the rot sets in due to lack of planning. Infrastructure provisioning, for instance, must precede any development permission.

CUSTOMISED SOLUTIONS: We have a single Act for city municipal corporations, be it Tumkur with a 300,000 population or Bengaluru with a 10 million population. Similarly, the Karnataka Town and Country Planning Act is the same for Virajpet with a population of 7,000 and for Bengaluru. These Acts are legacies of the colonial era and have seen only piecemeal amendments over time. Comprehensive revision is critical to making such Acts relevant to addressing the scale and complexities of cities today. Bengaluru needs an independent municipal Act. We must consider custom approaches instead of broad brush strokes

that impact the entire state's urban centres.

GUIDING PRINCIPLES: The government has a fascination for announcing projects worth many crores of rupees as a sign of the solution. Instead, we need to be clear about the guiding principles to fix common citizens' problems be it roads, traffic, garbage, water, pollution, and so on. For instance, we must build our city roads around the pedestrian as the prime customer. This would imply greater emphasis on walkable footpaths. There is no mobility solution feasible without a focus on public transport. We need to focus on moving people rather than moving vehicles. Similarly, solid waste management needs segregation at source and decentralised processing if our landfills are to be

reduced. Waste is a resource, not an expense head. We should sweat existing assets be it suburban rail, an underused airport or a decrepit public-sector unit which can be used as public spaces. We need to pay more attention to demand side management like conservation and time of day metering rather than just supply-side spending. Solutions to seemingly intractable problems like burning lakes is to focus on integrated watershed management instead of pouring money on ill-conceived lake revival projects.

Our political discourse is increasingly characterised by polarisation, name calling, claims and counter-claims that are so difficult to fact-check or keep track of. In respect of fixing our cities, it's time civil society got the political class to embrace and find common ground on a set of solutions that need to be implemented. We need to table them, debate them and evolve a consensus of the common minimum programme that is acceptable. And hold our elected representatives to deliver on them when in power. Our cities heading towards the proverbial iceberg should help focus our collective thinking. Wishful? Chowkidar, anyone? ■

V. Ravichandar, civic evangelist, keeps plugging away his pipe dreams about the city space

LIVING

BOOKS | ECO-TOURISM | FILM | THEATRE | AYURVEDA

The silence of 3 women

White is about the plight of rape survivors

Saibal Chatterjee
New Delhi

TITLED *White*, Kolkata-based Aneek Chaudhuri's new film is focused on the darkness that descends on the lives of sexual assault survivors. You cannot miss the irony. But *White* also highlights the resilience of women who have had their lives brutally interrupted. It is their unbreakable spirit that signifies a flicker of hope on the canvas that the film composes with neat and telling strokes.

White, a feature-length cinematic triptych, is about the deep, anguished silence that pervades the lives of three unrelated women. The 74-minute film itself is silent, with flute and violin pieces and incidental noises embedded into its soundtrack in order to amplify the emotions of the women — a factory worker who lives alone, a single mother grappling with trauma and a married villager whose husband stands by her — as they go through the motions of putting the pieces together again.

"I know these women," Chaudhuri, 25, says. "Not individually or personally, but as people who are forced to live in constant fear." Although *White* addresses a burning social theme, it embraces neither the established norms of commercial cinema storytelling nor the combative methods usually favoured by activist filmmakers. In this respect, it defies many an expectation.

For one, *White*, which tells three separate stories in a fearlessly experimental mode, has no dialogue. Not only does the violence at its heart stay off-camera, even the build-up to and around each of the heinous acts is merely alluded to through strikingly minimalist means. *White* is about bodies attacked and defiled. The film's focus is, however, entirely on souls scarred. The result is a powerful evocation of the sheer viciousness that women in vulnerable situations are subjected to and then left to fend for themselves.

Chaudhuri, a film theorist who quit a corporate job in Delhi to pursue his moviemaking ambitions, isn't obviously angling for instant commercial returns. It is the immense potential of the medium of cinema that seems to draw him to unconventional, free-flowing creative



'White' highlights the resilience of women who have had their lives brutally interrupted

methods. In the context of mainstream Indian/Bengali cinema, some might see his ways as overly self-indulgent. But rare indeed is a young filmmaker who not only holds out against the line of least resistance, but also dares to go a fair distance further afield in terms of taking artistic risks.

In exploring the plight of rape survivors, Chaudhuri applies a highly personal, formally oblique approach to a burning social context: the question in the film pertains to the safety of women in a world that has been distorted by toxic masculinity.

Stylised images, performative gestures and a classically-inspired background score serve the purpose of underscoring what the sexually assaulted women are going through — in their minds and their bodies. The poignant, painfully precise portraits that *White* places before the audiences aren't meant to evoke pity: melancholic as they are, they point as much to the remarkable resilience of the victims of violence. Each of the three women we encounter in *White* wages her own fightback.



Aneek Chaudhuri

"The film aims to throw light on the enormous sense of insecurity that women have to contend with on a daily basis in the city. This issue is usually ignored in our cinema. Films that deal with sexual violence against women generally spotlight victimhood. That isn't my intention here," says Chaudhuri.

It is significant that two of the women in *White* fall prey to violence in the 'safety' of their homes. "Sexual violence against women begins at home. But silence surrounds the plight of the survivors because of the social stigma that is still attached to it. An overwhelming number of rapes in this country go unreported," says Chaudhuri, offering an inkling as to why he may have chosen to do away with spoken words in his new film.

But that obviously isn't the only reason why *White* is a silent film. "The principal idea," he says, "is to overcome the limitations that human language necessarily imposes on a film." Chaudhuri has been writing about world cinema for a few years and is concerned about the need for films from different parts of the world to travel across geographical boundaries without stumbling at language barriers.

He says: "I foresee a time, say 20 or 30 years from now, when more and more filmmakers across the

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Silence of 3 women

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world will stop using human language to communicate and thereby widen the reach of their work." The internal cinematic dynamics in *White* are such that while the means that Chaudhuri uses are whimsical, the stories he tells are accessible.

Last year, Chaudhuri made the documentary *Urban Voice*, a celebration of the output of the reclusive, publicity-shy urban folk musician, Susmit Bose, who has, since the 1960s, been contributing in major ways not only to his own chosen domain but also to larger social causes.

Chaudhuri's penchant for experimentation yielded *The Wife's Letter*, a two-and-a-half-hour film designed as a tribute to the humanist, nature-centric worldview of Rabindranath Tagore and the surrealist, radical aesthetics of Salvador Dali. The film, which amalgamates a Tagore story (*Streer Patra*) with Dali's artistic vision to yield an individualistic essay, was screened in the Marche du Film at the Cannes Film Festival last year.

The Wife's Letter brings together the two contrasting creative impulses to tell the 'story' of a schizoid man named X who travels through three worlds, using mathematics rather than emotions to make sense of the environs of each. His emotions are variable. The only constant in *The Wife's Letter* is a leaf and it becomes the protagonist's endeavour to emulate its constancy.

In *White*, Chaudhuri enters more definite spaces: the factory worker's modest one-room home and her workplace where she is violated by the owner; the ancestral home that the raped single mother relocates to in the hope of making a starting over; and the village dwelling in which the third woman lives with her husband who leaves for work every morning on a bicycle.

The camera catches these 'caged' characters engaged in the most mundane of activities — the first, a pregnant woman of limited means, operates a sewing machine — its whirring intersperses the plaintive sound of a flute — and cooks a rice gruel for herself when she isn't working in the cloth factory. The second, who is at the centre of the shortest of the three segments, enters an empty space with a suitcase, unpacks books from a cardboard carton and eats a plate of noodles.

The third, placed in a rural setting, eats with her husband sitting on the floor at the door of her house and, later, inside the hut, listens to a popular folk song on a transistor radio: a rare moment of joy. Their lives appear to be placid, if riddled with pain and confusion; it is their minds that are in turmoil and it is those minds that the film seeks to probe.

In the first and the third segments, the presence of a sympathetic man provides the only solace to the troubled woman. "The use of the flute in the background is conscious: the flute, as a musical instrument, comes the closest to the human breath. In fact, you can actually hear the breath of the instrumentalist when the flute is played," says Chaudhuri.

In the second story, in which the rape survivor has trouble connecting with her little daughter and the flute is replaced by a violin in the background music, there is no space for a man. For this woman, it is an intensely lonely struggle. "The violin stands in for that male absence," explains Chaudhuri. ■



Vagamon has exotic flora and fauna, glades, dewy meadows and shola forests



Tea plantations



Sheep grazing on verdant pasture land

Synergy of 3 religions in Vagamon

Susheela Nair
Kottayam

As we left the rubber town of Kottayam, we felt a perceptible change in the landscape and weather. The air smelt different too as our vehicle negotiated hairpin bends on the Peermade-Vagamon Road, unveiling mist-cloaked valleys and small tea gardens carpeting mountain slopes. There was a distinct crisp freshness in the air. I was struck by nature's benevolence and the pastoral charm of the place. A green carpet rolled out in front of us. Nature was at her bountiful best with the roadside pageant unravelling itself, frame by frame — exotic flora and fauna, glades and dewy meadows interspersed with shola forests. What charmed me was the freshness of this grassy stretch of land, amazingly unexplored by most tourists.

Located at 1,100 metres above sea level, on the western fringes of Idukki district, bordering Kottayam district, the Vagamon mountain range is an expanse of varying shades of green flanked by the Idukki reservoir on one side and fabulous rolling grasslands, hillocks, cliffs and scenic views of Kottayam on the southern side.

All I learnt of its history was that about a century ago, the English chanced upon this land, and set up plantations here. Then followed Christian missionaries who built their church and *ashram*. Vagamon does not flaunt any vestiges of the Raj nor has it any vantage points named after Englishmen, like other places. The Kurisumala Ashram was established in the 1940s. All that is known is that Vagamon was opened in 1926 when Walter Duncan and Company planted tea on 534 acres. By 1930 the boom was over.

Cloaked in a blanket of green, Vagamon's unique ecosystem and topography are complemented by its salubrious weather. Casual tourists will be treated to scenic views of rolling hills with green meadows if they venture out on invigorating walks. There are plentiful options for adventure buffs to tread the off-the-beaten trails. There are birds to be stalked, butterfly trails to be discovered and endemic plants to be identified. Nothing can be more refreshing than walking in the rain along waterfalls when mountain slopes are carpeted with monsoon foliage and dotted with flowing streams. The grasslands are the abode of endemic mammals, birds, insects and butterflies. One can see the small Indian civet,



The hilltop ashram of Kurisumala

porcupine, ant-eater, martin, flying squirrel, toddy cat, Malabar giant squirrel, slender loris, hares and so on.

Trudging up and down mounds of grass is a delightful pastime. We ambled around, following the bleating of the goats and sheep in the nearby hills and meadows. One can reflect in blissful solitude or simply curl up with a book on the grassy knolls. The pine valley in Kolahalamedu is just a few minutes' drive from the *motta kunnu* (bald

hill). We felt refreshed after a leisurely stroll in the shade of towering pine trees, inhaling the pine-scented air with the crackling of pine needles and cones underfoot.

Vagamon's claim to fame rests on a string of three hills signifying religious harmony, and a silent monastery, where Hindu religiosity coexists peacefully with Xian spirituality. One can embark on a para-hopping (rocky terrain) spree in Vagamon to discover the chain of three hills, each signifying a

different religion.

Like many hill stations, Vagamon has a 'suicide point', Moopanpara, a V-shaped gorge. Standing on the precipitous edge of the gorge we peered into the depths of the ravine and the valley below. Thangal Para, a precariously perched huge rock with the *dargah* of Sheikh Fariduddin, is famed for its annual Urs festival when thousands of devotees congregate. It is associated with an Afghan Sufi saint who lived and died here about 800 years ago. According to a local legend, a small stone he used to grind *pan* was transformed into a spherical rock. On the eastern side of Kurisumala is Murugan Para with a rock-cut temple dedicated to Lord Murugan.

Located 10 km from Vagamon is Kurisumala (Mountain of the Cross), a Christian pilgrimage spot, with 14 crosses fixed along the path leading to a church on the hilltop which offers magnificent views. Hordes of devotees trudge up the hill, carrying wooden crosses, during the Holy Week. One can see the recreation of Christ's final journey in a series of pictures or tableaux. We lingered for a while to fill our lungs with fresh mountain air and feasted our eyes on the inspiring view below — the cows of Kurisumala Ashram grazing afar, the rolling plains of Pala and Thodupuzha, the mist-wreathed hill slopes and lush tea plantations. At the foothill is St Thomas Mount, a centenary memorial.

The last stop of our sojourn was the hilltop *ashram* of Kurisumala where we found a curious melange of Christianity, Indian spiritual traditions and Gandhian thought. Sprawling over 40 acres, the 50-year-old *ashram* has a community prayer hall, vegetable garden, bread bakery, a barn and a milk-processing centre. The granite building houses a church, community quarters with cells for monks and a library. The entire place exuded a meditative calm and silence.

We were treated to a glass of hot 'Kurisumala milk', a popular brand among the locals and the *ashram's* main source of income. We were impressed with the simple and austere lifestyle of the monks. They walk barefoot, cook vegetarian food and sit on the floor for meals. In the evening, when the monks congregate in the chapel for prayers, a traditional oil lamp is lit in front of the altar. The sacred chants mingled with quotations from Hindu scriptures resonated in the air and we felt at peace when we left the serene *ashram*. ■

FACT FILE

Website: www.idukkitourism.com
 Best season: August to May
 How to reach: Nearest airport: Nedumassery (Kochi) -120 km
 Nearest railhead: Kottayam - 64 km
 By road: Thekkady - 60 km, Munnar - 150 km



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For regular periods

MENSTRUATION is controlled and triggered by signals sent by hormones produced in the body, namely oestrogen and progesterone. Any fluctuation in periods indicates a disruption in the natural chain of hormonal events.

On an average, a woman's menstrual cycle lasts 28 days. However, the cycle can be considered normal anywhere from 24 to 38 days, if it is consistent. Menstrual bleeding usually lasts two to seven days, with the average being five days. If it stretches to eight to 10 days or more, that's considered prolonged bleeding. A normal cycle also requires changing sanitary napkins three or four times a day. If a change is required every hour for the whole day, then the bleeding can be considered abnormally heavy.

CAUSES: Irregularities in the menstrual cycle could occur in any of the following forms: • A missed period — does not occur for a month or more. • A delayed period — gets delayed by a week or more than its actual cycle of 28 days. • An early period — occurs seven to 10 days before the actual date of the menstrual cycle. • Periods that occur twice in a cycle, i.e., twice a month. • Menorrhagia — heavy bleeding with large clots. • Oligomenorrhoea — scanty bleeding.

The following lifestyle factors can also upset the balance of hormones and cause irregular bleeding: • Extreme weight loss or weight gain. Having a BMI that's either too high or too low can prevent ovulation, leading to irregular periods. • Excessive exercise. Experts advise that one should aim for 150 minutes of moderate physical activity a week to stay healthy. One must always remember that more exercise isn't always better! • Stress.

Broadly speaking, stress can suppress the hormones that regulate ovulation (the process of an egg being released from one of the ovaries). • If ovulation doesn't happen, chances of a missed period will be quite high.

Certain medications like hormones, contraceptives, blood thinners, chemotherapy, antibiotics, and anti-psychotic drugs may change the bleeding pattern. Other factors that can cause change in the menstrual cycle can include: • Obesity • Eating disorders including a diet high in carbohydrates • Polycystic ovarian syndrome: a condition that causes infrequent, irregular, or prolonged periods • A thyroid disorder is another possible but rare cause of irregular periods • Uterine abnormalities (fibroids, cysts, polyps, endometriosis) • Recent childbirth, miscarriage, or D&C (Dilation & Curettage) • Breastfeeding • Excessive smoking and caffeine intake

• Excessive intake of alcohol, which can interfere with the metabolism of oestrogen and progesterone in the liver.

TREATMENT: Treatment for irregular periods isn't always necessary.

A one-off irregular period may not be cause for alarm! One may wait a few more cycles to see if the irregularity persists.

There are many women who face period problems in terms of either timing or the amount of bleeding at some point during their menstrual years. This happens mostly due to a cycle without a normal ovulation, especially at the start of menstruation in adolescence. In such cases, normal periods may resume as early as the next period, or could take a few months to become regular again.

Irregular periods at the age of 45 years and above can signal the beginning of menopause. This can cause the menstrual cycle to become longer or shorter and the periods may become lighter or heavier. If irregular periods are caused by age-related factors, it usually doesn't need any specific treatment.

Stress or sudden weight loss may be one of the causes of irregular periods. Relaxation techniques, stress management or counselling may be helpful.

HOME REMEDIES: For excessive bleeding: • Grind a few bael leaves into a fine paste. Take 1 teaspoon of this paste with water. • Boil 1 teaspoon of coarsely powdered coriander (dhania) seeds in 100 ml of water till it is reduced to half. Add sugar candy (mishri) to taste and drink when lukewarm. Repeat twice or thrice a day. • Regular consumption of raisins (munakka) helps curb excessive bleeding during periods. • Grind the whole plant of 'touch-me-not' into a fine paste. Take precautions to remove thorns, if any. Take 1 teaspoon of this fine paste with a cup of 'rice washed water'.

For delayed menstruation: • Take half a teaspoon of finely ground cinnamon (dalchini) along with 1 cup of milk every night. • Drink 20 ml aloe vera juice, twice daily, every day before meals.

MEDICATION: The following medicines may be consumed for 3-6 consecutive cycles till the menstrual cycle is regularised: • Ashokarishta (any reputed pharmacy) — 4 teaspoonfuls twice daily with equal quantity of water, after meals. • Himalaya's Evicare syrup (15 ml, twice daily) or Evicare Capsules (2-0-2). • Shatavari guda (Pentacare Ayurpharma) / Shatavari kalpa (Baidyanath) — 1 tsp twice daily or Shatavari tablets (Himalaya) 2-0-2 tablets, before meals.

In case of excessive bleeding, Bolbaddha ras (Baidyanath / Dhootpapeshwar) 1 tablet twice daily after meals or Pushyanuga churna (Kottakkal / Baidyanath) 1 teaspoonful twice daily with a cup of rice washed water will be helpful. Despite the above measures, if there's no remission in symptoms, a gynaecologist must be consulted to rule out any other serious underlying causes. ■

Dr Srikanth is a postgraduate in Ayurveda and has been a consulting physician for the past 17 years. He is currently National Manager, Scientific Services, at The Himalaya Drug Company

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Rhodotion is a social enterprise founded by Subhankar Sanyal, which markets and sells organic agricultural products and handicrafts. The company sources a variety of folk and aromatic rice from farmers and self-help groups in Birbhum, Purulia and the Sunderbans in West Bengal. The region is well-known for its indigenous rice like the aromatic Gobindabhog, Radhatilok and Harinkuri varieties. Black rice and red rice are also bought from tribal farmers.

While residents of Kolkata are familiar with some of these rice varieties, they are not much known in the

north. Under its brand name, Greenlore, Rhodotion markets these varieties to buyers in states more familiar with *basmati*. The company also processes and sells pickles, jams and dried mushrooms under its brand name, Kutir. Rhodotion is also selling millet noodles and rice noodles. It markets Hajischa, a tea which is roasted over charcoal and has a lower caffeine level than most green teas. Its main buyers are Japanese. ■

Contact: Subhankar Sanyal: 9038401695, 7980311072
E-mail: rhodotion@gmail.com. Address: 20/2B Camac Street, Kolkata-700017



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