

THE ECONOMIC TIMES

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February 26-March 04, 2017



WARRIORS OF 2007

Flipkart
Online retailer

Ibibo Group
Global mobile ad network

InMobi
Online travel group

Myntra
Online retail store

BookMyShow
Entertainment ticketing portal

Saavn
Music and radio streaming
service in India

Meru
Radio taxi aggregator

YuppTV
Digital live streaming of Indian
TV channels

Next Education
K-12-focused, technology-
based education solutions

TEN-YEAR HITCH

It's been a decade of unicorns
and new-age startups, but what
will the next 10 be like?

p.06-09

Sena-BJP or Sena-Congress: Stirring the Mumbai Melting Pot p.03



Why Voters in the
Imphal Valley are Key
in Manipur Polls p.16

Beyond Stents, the Opportunity in Devices for Medtech Startups p.10



*Democracy
is Damaged
when People
are Afraid
to Speak out:*
Amartya Sen
p.20



Inside the City of Nawabs
and Kebabs p.22

Naga Pact Won't Compromise Manipur's Territorial Integrity: PM



PM Narendra Modi, flanked by Manipur BJP president K Bhabananda Singh (R) and party leader Chaoba Singh (L), at an election rally in Imphal West on Saturday

Ahead of assembly elections in Manipur, Prime Minister Narendra Modi on Saturday assured that the territorial integrity of the state will not be compromised under the Central government's framework agreement with Naga insurgents.

"There is not a single word to betray Manipur's territorial integrity in the Naga accord. Not a single word against the interests of Manipur," Modi said in Imphal, addressing BJP supporters who had assembled, defying a bandh called by underground groups.

The prime minister accused the incumbent Congress government of Ibobi Singh of spreading lies on this issue because of vested political motives as elections draw closer.

"The Naga agreement was signed almost one and a half years ago. Even Congress leaders were briefed about it. But not a single letter to the Government of India was written by the state government," said Modi. "Was he (CM Ibobi Singh) sleeping for one and half years?"

The PM lent his credibility to the BJP's campaign in Manipur where the party is on the defensive over the issue of alleged disadvantages to Manipur in the Naga accord. "Will you accept the lies being

spread by 15 years of corrupt government in the state or the truth of the PM who served you honestly for two and a half years?" asked Modi.

He also blamed Ibobi Singh for the economic blockade which has gone on for over 100 days. "It's the Manipur government's responsibility to clear the blockade... This is an example of his (CM's) failure," said Modi. "Look at the ways of the Congress. They are funding those who have imposed blockade," he alleged, adding that "there will be no blockade after BJP comes to power."

Some Naga groups in the hilly regions have blocked the national highway to the state after the Manipur government carved out new districts in the hilly regions a few months back. The blockade has become an issue for the Congress and the BJP to indulge in blame game.

Modi accused the Ibobi Singh government of being corrupt and urged the electorate to get rid of it. "Had you ever heard of a 10% chief minister?" he asked, 10% being an insinuation of bribe. "Manipur now wants a zero per cent chief minister," he said.

— Ravish Tiwari/Imphal

» See **Valley of Polls**, p16

Cong Won't Support Sena: Nirupam

The Congress on Saturday said the party would not support the Shiv Sena to capture power at the Brihanmumbai Municipal Corporation (BMC) or for installing its mayor. Congress' Mumbai unit president Sanjay Nirupam also told reporters that the party was planning to hold discussions with like-minded parties for a common candidate in mayor's election. He said the Congress felt that estranged allies Shiv Sena and BJP would come together again in BMC to reclaim power.

"Congress will not support Shiv Sena for claiming power at BMC, including mayor's post. The party has decided against supporting Sena in the BMC," he said after emerging from a meeting of the newly-elected corporators.

He said several Sena leaders were in touch with Congress on the issue but his party has decided against backing Sena. "We are ready to sit in opposition," he added.

"The party is planning to discuss (prospects of) formulating a separate alliance with like-minded parties and giving a common candidate in Mayor's election," Nirupam said.



"Congress will not support Sena for claiming power at BMC, including mayor's post."
Sanjay Nirupam,
 Mumbai Congress president

With the bitterly fought polls to BMC resulting in a fractured verdict, thinking was strong in the Maharashtra Congress that it should consider the option of enabling the Shiv Sena to foist its candidate as mayor of the city, as a tactical move to sharpen the rift in the saffron camp.

The Congress strategists who mooted the idea were also of the view that this move could push the Devendra Fadnavis government into a deep crisis as the Sena would be forced to break out of the alliance in such a scenario.

The mayoral election will be held next month. Though the post is considered ceremonial, it reflects the concerned party's numerical strength in the civic body. The winning candidate requires 114 votes.

Earlier, Congress leader Gurudas Kamat had said he strongly objected to even any discussion on having a tie-up with or giving indirect support to the Sena in the BMC. Kamat, who crossed swords with Nirupam ahead of the campaign for the civic polls, had said the party had fought against both the Sena and the BJP all along for their divisive policies and attempts to align with them will backfire. Another Congress leader Mohammed Arif Naseem Khan said they would never support BJP or Sena. "In no way will we ever support the BJP or Shiv Sena. Our national leaders have always fought against communalism and we will continue to do so," Khan said.

The BMC elections saw Shiv Sena emerging as a single largest party bagging 84 seats (now 87 with three independents joining it), BJP 82 and Congress 31.

— PTI/Mumbai

Kejriwal Moves HC Seeking FM's Financial Records

New Delhi: Delhi CM Arvind Kejriwal



on Saturday moved the high court, seeking details of bank accounts, tax returns and other financial records of Union Finance Minister Arun Jaitley, who has filed a defamation suit against him. The AAP supremo contended that he is seeking the financial records of Jaitley and his family members from 1999-2000 to 2014-15, "to disprove" the claims made by the senior BJP leader against him and five other AAP leaders who were named in the suit filed in 2015.

— PTI

— PTI

IndiGo, SpiceJet Avoid Collision

Mumbai: Aircraft of IndiGo and SpiceJet came in close proximity on Ahmedabad runway on Saturday as some rabbits barred the movement of a plane. The IndiGo Bengaluru-Ahmedabad flight had landed and was advised by the ATC to vacate via the taxiway. But "the flight crew saw some rabbits and stopped the aircraft", said IndiGo. The ATC then called out to SpiceJet to abort the takeoff of its Ahmedabad-Delhi flight as the IndiGo flight hadn't vacated the runway.

— PTI

Nitish Opposes Inland Waterways Project on Ganga

Patna: Bihar CM Nitish Kumar on Saturday announced that his government is against the Central government's proposed Allahabad-Haldia national inland waterways project on the Ganga via the state. "We are against the national inland waterways project and would oppose it if the Central government goes ahead with it," Nitish said at an international conference on "Incessant Ganga". For the proposed project, a series of barrages would have to be constructed, which will be a big hurdle for an incessant Ganga, he said.

— PTI

Slain Indian Techie's Wife Seeks Answers on Rising Hate Crimes

Washington: The wife of Indian engineer Srinivas Kuchibhotla, who was shot dead at a US bar two days ago, has publicly sought answers to what she perceived was a spread in American hate crimes. "I have a question in my mind: Do we belong here?" asked Sunayana Dumala at a news conference on Friday at the headquarters of electronics manufacturer Garmin, where Kuchibhotla worked as an aviation systems engineer.

tems engineer.

"We have read many times in newspapers of some kind of shooting happening.... And we always wondered, how safe we are?" Of the two of them, she said, she was the most concerned, asking her reassuring husband: "Are we doing the right thing by staying in the US?" Kuchibhotla hailed from Hyderabad and his wife is returning to India for his funeral. She said she



File pic of Srinivas Kuchibhotla and Sunayana Dumala

wanted to come back to their home in Olathe, Kansas, to fulfil her husband's wish for an American life and of her "being successful in any field I choose", *Kansas City Star* reported.

But before making that decision, "I need an answer," she said. "I need an answer from the government... What are they going to do to stop this hate crime?" Kuchibhotla, 32, was killed and his colleague Alok Ma-

dasani was injured when Adam Purinton, who had earlier served in the US Navy, shot them at the Austins Bar & Grill in Olathe, Kansas, on Wednesday. Purinton reportedly got into an argument with the victims and yelled "get out of my country" and "terrorist" before shooting them.

Over 200 Garmin workers were at the company's Olathe complex to listen to Dumala.

— IANS

Decoding Mumbai

Whether the Sena allies with the BJP or goes with the Congress is a Hobson's choice for Mumbaikars struggling to cope with a decaying city



Devendra Fadnavis



Uddhav Thackeray

:: Gurbir Singh

The Shiv Sena's Mumbai celebrations began too early. Till late noon on Thursday, the party's leads for 94 seats indicated it was running towards a clear majority in the 227-seat corporation. But a late afternoon surge for the BJP saw the Sena finishing just ahead at 84, with the BJP bagging 82 seats. The Congress came a poor third with 31 seats. A beaming Uddhav Thackeray gave way to a smug Devendra Fadnavis, hailed by the Marathi media as "Maharashtra's Modi".

Thackeray has been criticised for snapping a 20-year alliance with the BJP ahead of the municipal polls and a bad campaign strategy that made out the BJP and demonetisation as twin evils.

But much of this commentary has missed the Sena's gains – consolidation of the Marathi vote, and its emergence as a powerful contender in Maharashtra's politics. Was there an alternative to snapping its ties if the Sena wanted to end its second fiddle status?

After being the senior partner of a saffron alliance for over 20 years in Maharashtra, the Sena was reduced to a rump after the assembly poll in October 2014. The Modi wave was at its height then, and the ratio changed dramatically to 122:63 in favour of the BJP. The Sena never quite came to terms with the new equation, and Thackeray chose the municipal polls

to demonstrate a comeback.

In the past few weeks, Uddhav's Sena ran an unexpectedly strident anti-BJP campaign aimed at re-establishing his position as a regional satrap – something in the fashion of Mamata Banerjee or Nitish Kumar. Significantly, Thackeray has given up much of the communal rhetoric of his father in a bid to broaden the party's base. Even in the face of BJP's ascendancy in the state, the Sena, on an independent platform, has emerged as the largest single party in Mumbai's corporation; and with a clear majority in Thane. In the simultaneous district

Sena may go for the option of allying with the Congress and the MNS to give it a 122-seat majority. This could mean the collapse of the Maharashtra government, and a snap mid-term election

zilla parishad elections, the Sena emerged as the largest single party in four districts. A partnership strategy with the BJP would have meant certain eclipse. Even as it sits in government, the Sena has emerged as the more strident "Opposition" to the BJP than the Congress and the NCP.

Tough Choice

Will Thackeray stay the course to challenge the BJP for the assembly polls due two years down the line, or dismiss all he said about the BJP as electoral rantings and return as junior partner? The popular calculus says the Sena has only one option: that of joining hands with the BJP.

But there are indications that it may

go for the second option: that of allying with the Congress and the MNS to give it a 122-seat majority (84+31+7). This could mean the collapse of the Maharashtra government, and a snap mid-term election. Does Thackeray have the stomach for the fight out of government?

The easier course to pursue peace with the BJP will mean slow death. The Sena is learning that the BJP's unitary style reduces junior partners to rumps. Sena insiders are pointing to the fate of Goa's Maharashtrawadi Gomantak Party (MGP), which allied with the BJP and has virtually vanished.

In all this real politik, what happens to the blighted city of Mumbai? Will it make a difference to the city's collapsing civic services? Probably not.

It is not difficult to guess why the corporation elections are so hard-fought. The BMC's FY2017 budget is over ₹37,000 crore – more than the collective budgets of a dozen of the premier tier-I and tier-II city corporations, including Chennai, Kolkata and Bengaluru.

BMC's allocations include ₹5,570 crore for water supply and sewage disposal, and ₹3,863 crore for roads. Mumbaikars have seen very little of this, and much of it is frittered away in corruption and waste. As many as 2,000 BMC employees are facing enquiries and charges of corruption.

Mumbai is a melting pot of talent and diversity. It has the most efficient workforce welded together by a corporate culture. Yet the living conditions are abysmal. Around 42% of the city or 5.2 million people live in slums. For its 14 million people there is just 14 sq km of open space or 1.95 sq m per person, one of the lowest ratios among world cities.

We did not hear much about these issues in the contentious campaign. And now with the instability of a hung corporation, it will make things even worse. Whether the Shiv Sena allies with the BJP for the fifth term, or goes with the Congress is a Hobson's choice for the people struggling to cope with a decaying city. ■

The writer is a senior journalist

ADVERTORIAL

Confidential life partner search for Global Indians

Vows for Eternity (VFE) is a high end personalized and confidential fee based matchmaking service which brings life partners together based on mindsets, values and personalities. Headquartered in New York it has an established presence in India and Singapore and is known for its quality over quantity approach with strict eligibility criteria for membership.

Over the years VFE has built up a strong membership base of successful professionals, industrialists & celebrities. The members are well-traveled, affluent, upwardly mobile global Indians / NRIs from extremely cultured families in their early 20's to late 40's & sometimes even older who are seriously looking to get married or remarried.

Anuradha, the Founder CEO started VFE years ago based on her own experience of looking for a life partner. She currently lives in Manhattan but having also lived in Los Angeles, London, Melbourne and Delhi brings not only years of matchmaking experience but also a global perspective whilst being strongly rooted to her Indian values. She does not work with bio data's as she strongly feels that people are so much more than what can be conveyed on paper & getting to know members helps in



Anuradha Vinod Gupta

increasing the matchmaking success rates significantly. As a result she focuses on meeting members to understand their personalities, value systems, mindsets & dreams and then matches them with other like-minded members from within the exclusive club.

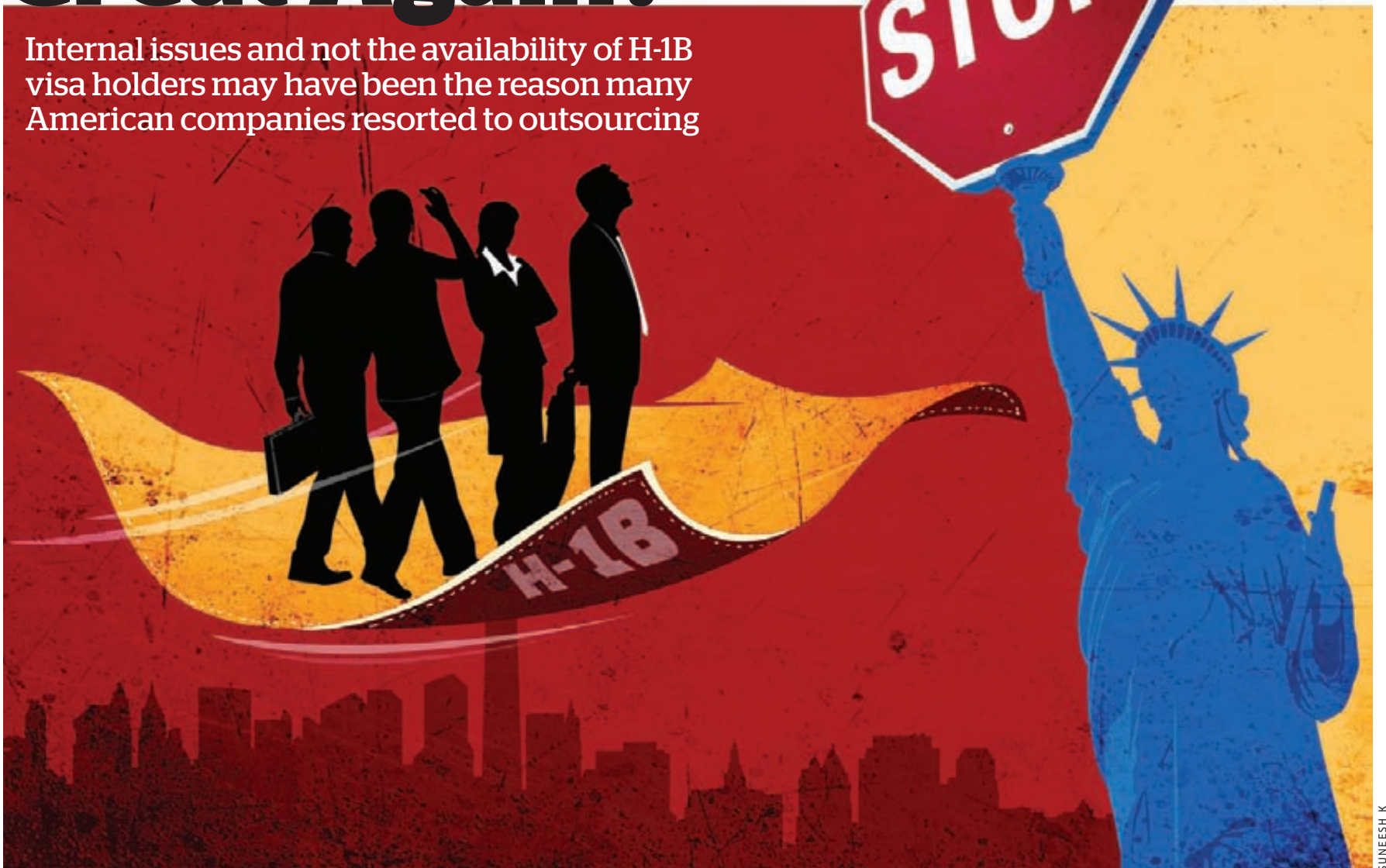
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Can H-1B Become Great Again?

Internal issues and not the availability of H-1B visa holders may have been the reason many American companies resorted to outsourcing



SUNEESH K

:: Seema Sirohi

Once eulogised but now demonised, the Indian IT worker is in eye of the storm that is whipping America from coast to coast, lashing immigrants, temporary workers and anyone deemed an interloper in the job market.

Her H-1B visa slots her instantly as a job stealer, a cheap labourer, a tech coolie who forced American workers out of Disney, Toys R Us, New York Life and other companies and on to the street. These cases have tugged at America's heartstrings over the last two years and the narrative is deeply embedded.

The Indian IT industry has been struggling mightily to add context, history and its perspective to the story, saying that the reality is far more complex. But it hasn't got very far.

A new report by a respected American expert on immigration should help. It presents a more complete picture with new details on each of the cases highlighted in the US media. The report tries to rupture the national narrative but it hasn't got the attention it deserves.

The report, "US Companies and



Trump announced a sweeping plan this week to deport undocumented workers and widespread raids are currently underway. Some say it's a matter of time before he acts on the H-1B programme

"Understanding that contracting out accounting functions is a widespread, long-standing practice and done for legitimate business reasons (is important)"

Stuart Anderson, author of report titled "US Companies and Contracting for Services in the New American Economy"

Contracting for Services in the New American Economy", by Stuart Anderson found that a variety of internal reasons, including fatal shootings in one celebrated company's IT department, were at play behind the layoffs. The availability of H-1B visa holders was not the reason why managements decided to restructure or trim down.

But US President Donald Trump and his advisers have the H-1B programme in their sights. They are expected to restrict it through an executive order even though their main beef is against illegal immigrants. Trump announced

a sweeping plan this week to deport undocumented workers and widespread raids are currently underway. Some say it's a matter of time before he acts on the H-1B programme.

Out With Outsourcing

The frenzy against H-1B professionals has been building over the years, feeding off right-wing websites and choreographed hearings on Capitol Hill where political theatre often substitutes for reality. Even Barack Obama as a candidate railed against outsourcing in general terms but Trump became the first candidate to specifically mention H-1B visas in a platform. He also invited Americans allegedly displaced by foreign workers to speak at his rallies.

The subterranean anger lurking on the internet, especially in tech and labour hubs, had gone viral in 2016 and Trump tapped in; that added to his street cred as a pro-worker guy who was going to fight for "the forgotten people".

His supporters didn't care about the many contradictions of their billionaire messiah. All they heard was his promise



The writer is a Washington-based journalist



Even Barack Obama (left) as a candidate railed against outsourcing in general terms but Trump (right) became the first candidate to specifically mention H-1B visas in a platform

to “Make America Great Again,” which resonated across decrepit towns in the rust belt where many sat jobless, unable to swim against the tide of rapid globalisation.

Men Against H-1B

One of Trump’s earliest mentors and sharpener of the pro-worker message, including targeting H-1B workers, was Senator Jeff Sessions, now the US attorney general. As chairman of the subcommittee on immigration, Sessions regularly called one-sided panels for public testimony against H-1B visas. It seemed he had a special problem with foreign workers.

Sessions, the seasoned elder, guided Trump the novice into the H-1B minefield and pitched him against the tech giants of Silicon Valley. Sessions’ aide Stephen Miller, known for his stridency, is now a senior adviser to Trump. Miller recently implied that presidential powers were superior to those of the judiciary after the courts blocked Trump’s travel ban against seven countries.

This is roughly the atmosphere in which the future of the H-1B visa programme might be decided. One can only hope the policymakers will go beyond the prevailing narrative and also read Anderson’s report mentioned earlier that unpacks the many reasons why US companies outsource some services.

The Real Reasons

Anderson, executive director of the National Foundation of American Policy, a non-partisan think tank focused on immigration, trade and education, worked on the Senate immigration subcommittee in the 1990s and later as counsellor in the Immigration and Naturalisation Service. He knows the debate well.

Anderson’s research is revealing about each of the cases highlighted in the US press and the unmistakable slant against foreign workers. The case of Southern Cali-

fornia Edison (SCE), a large utility company, which laid off 400 workers in 2014, is especially noteworthy. Initial reports about SCE in *The Los Angeles Times* describing the layoffs were straightforward. They quoted company executives as saying the layoffs were necessary to stay competitive.



Leo Perrero’s heartrending account of being laid off eventually compelled Disney to announce that it had rehired 120 of the 250 people dismissed

The controversy arose when laid-off workers told the press that foreign workers had replaced them, implying the company was using US immigration policy to replace them with “cheaper” foreigners.

But the truth was far darker. It turned out the company’s in-house IT department was extremely dysfunctional and marked by dangerously hostile relations between the supervisors and employees. In December 2011, “an employee fatally shot two supervisors and wounded two others before taking his own life,” according to a report by a consulting team hired by SCE after the incident.

After a long and thorough review of the IT department and meetings with 725 employees, managers and contractors, the review team concluded the problems were so deep – “autocratic”, “draconian” exec-



One of Trump’s earliest mentors and sharpener of the pro-worker message, including targeting H-1B workers, was Senator **Jeff Sessions** – now the US attorney general. Sessions’ aide **Stephen Miller**, known for his stridency, is now a senior adviser to Trump

utives humiliating and scapegoating employees on a regular basis – that they couldn’t be fixed because it would require changing the entire organisational culture.

SCE decided to outsource much of the IT work, sealing the fate of those workers. It then asked a law firm to solicit bids from at least eight companies, which competed for the contract. The two companies that won employed some foreign workers on H-1B visas, creating the controversy. The real problem – horrible management of the IT department – was obscured.

Anderson found that Disney layoffs similarly became a lightning rod because of the way some newspapers cast the story, making it a national cause. Disney decided to restructure its IT division for its parks-and-resorts division in 2014 to focus on new technology instead of maintenance. It laid off two long-serving IT vice-presidents and replaced them with two new ones with different skills.

The first news reports from October that year were matter-of-fact, given that restructuring is a common occurrence in the American workplace. The main local paper, *The Orlando Sentinel*, reported that outsourcing was an inevitable part of restructuring.

But eight months later, *The New York Times* did a front-page article about how 250 Disney employees were laid off and that many of their jobs were “transferred to immigrants on temporary visas... brought in by an outsourcing firm based in India. Over the next three months, some Disney employees were required to train their replacements to do the jobs they had lost”.

The article became a potent weapon for anti-immigrant forces on Capitol Hill. Sessions held a Congressional hearing during which Leo Perrero, a former Disney employee, recounted his trauma. It was heartrending to watch a grown man choke on his words. The hearing had the desired emotional effect.

Eventually, Disney announced it had rehired 120 of the 250 people, 40 retired or moved to other companies and 90 took severance packages, according to Anderson’s research. Disney created 320 new technology positions, according to *The Los Angeles Times*.

“Understanding that contracting out accounting functions is a widespread, long-standing practice and done for legitimate business reasons” is important, Anderson says in his report. “It would be more accurate to say that contracting out only becomes controversial and, therefore, a news story when a foreigner or visa holder is spotted at the company’s offices.”

Toys R Us, one of the biggest toy chains, and New York Life, one of the largest life

insurers, both outsourced accounting functions while trying to restructure, laying off 67 and 300 people respectively.

New York Life did a massive overhaul with a \$1 billion plan for upgrading its financial and data technology systems. It turned to outsiders for the upgrade since it was not a technology company. But in both cases, the H-1B worker became the villain.

Finance and accounting functions are the first processes that companies outsource for reasons of efficiency, according to Anderson. It’s a widespread and long-standing practice. The CFOs of large companies use outsourcing to improve their global operations while smaller companies “have become more open to outsourcing” to find solutions to specific problems.

The most jarring detail in all cases has been the fact that workers who were eventually laid off had to “train their replacements”, making the experience even more painful. “The process has become a flashpoint in the debate and disturbing to laid-off workers, which should warrant new consideration of how best to accomplish these transitions,” says Anderson. His advice would be well taken by Indian IT giants.

Some, such as the Citizens Bank, avoided negative publicity while restructuring because they transferred the work over the internet and did the training and transition through teleconferences.

It didn’t lessen the pain of those who lost their jobs but isn’t the management of their company more responsible for what happened than the IT worker? These are testing times in the United States. Supporters of temporary work visas need to tread with patience and caution. ■

Southern California Edison laid off 400 workers in 2014 because of the horrible management of its IT department. Then it decided to outsource much of the IT work



Toys R Us and New York Life outsourced accounting functions while trying to restructure, laying off 67 and 300 people respectively. But in both cases, H-1B worker became the villain



**PC, Laptop
Tablet, Mobile**

सुरक्षा



92.72.70.70.50
98.22.88.25.66

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Unicorns like Flipkart, InMobi, Quikr and Zomato have completed or are set to complete 10 years. What does the next decade hold for them – and for the startup universe?

:: Suman Layak, Rajiv Singh and Rahul Sachitanand

It was founded in 2007 as a greenfield incubator trying out several ideas and products. Almost a decade later, last October, Ibibo Group merged with India's largest online travel aggregator MakeMyTrip. The combined valuation was pegged at \$1.8 billion, and Ibibo's owners – Naspers and Tencent – got a 40% stake in the merged entity, along with brands such as Goibibo, redBus, Ryde and Rightstay. Industry observers hailed it as a successful exit.

Except that Ibibo founder Ashish Kashyap sees it as a successful “merger” and not an “exit”. His reasoning: the deal created value for all the constituents – shareholders, employees, cofounders and partners. “Initially people laughed at me when I launched Goibibo in October 2009 as an online travel aggregator (OTA) in a market that was already crowded,” recalls Kashyap, adding that the OTA space was limited to flight bookings. There was a conspicuous absence of the online hotels category. Goibibo filled the gap, he says.

Kashyap predicts that consolidation will shape the startup ecosystem: “Death of numerous players would lead to the birth of the next wave of startups in the Indian internet jungle.”

Year 2007 will go down in the early pages of the Indian startup saga as one in which some of the most high-profile – but not necessarily successful – internet startups took shape. Sure, they weren't the first. There were Naukri and MakeMyTrip before them. But it was around that time – between 2006 and 2008 – that startups like Flipkart, InMobi, Zomato and Quikr which would go on to become unicorns, with valuations of over \$1 billion, took shape. Over the

“Death of numerous players would lead to the birth of the next wave of startups in the Indian internet jungle”

Ashish Kashyap,
founder, Ibibo Group



THE 2007 WARRIORS

FLIPKART

Online retailer

Founders:
Sachin Bansal & Binny Bansal



Source: Tracxn

Total funding: **\$3.21BN**

Prominent Investors: Accel Partners, Morgan Stanley, Naspers, Vulcan, Tiger Global Management

Last funding: **Dec 2016, \$3.8MN**

Acquisitions: myntra.com; weread.com; fxmartindia.com; mime360.com; phonepe.com; letsbuy.com; appiterate.com



IBIBO GROUP

Online travel group

Founder:
Ashish Kashyap



Total funding:

\$250MN

Investors: Naspers, Tencent

Last funding:
Feb 2016, \$250MN

Acquisitions: redbus.in; yourbus.in

Ibibo merged with MakeMyTrip in October 2016



INMOBI

Global mobile ad network

Founder:
Naveen Tewari



Total funding:

\$220.6MN

Prominent Investors: SoftBank, Mumbai Angels, KPCB

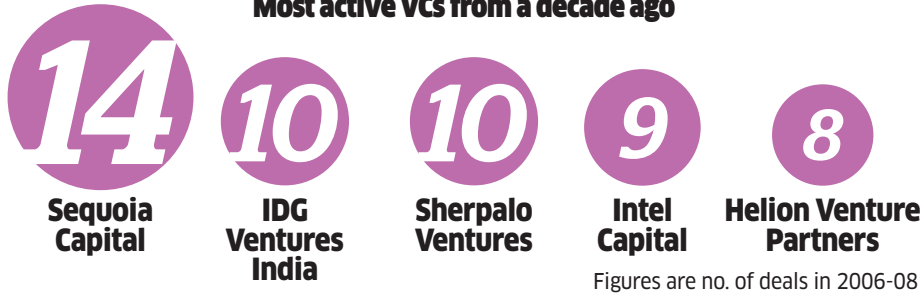
Last funding:
Sep 2015, \$100MN

Acquisitions: sproutinc.com; appbistro.com; appstores.com; overlaymedia.com; metaflow.com; appgalleries.com



Catalysts of Growth

Most active VCs from a decade ago



decade, they redefined the contours of not just entrepreneurship but also urban life in India. If Flipkart was the flag bearer for this generation, with two founders selling books from their bedrooms scaling it to India's top ecommerce company, others who started a decade ago built the market along with their businesses from scratch. And between 2007 and 2017, the mood of the gladiators in the consumer internet and ecommerce space has moved from adventurism to euphoria and to wariness.

Time to Reboot

Now is the time to batten down the hatches. Many of these ventures are victims of unrealistic valuations, easy money and stratospheric valuations that incited a startup stampede in India. As the financial woes of Snapdeal hit the headlines earlier this week, and news of a couple of other one-time high-profile ventures shutting down filtered in, it is clear that the decade ahead will be one of a reboot, new learnings and of new poster boys and girls.

Nitin Seth, chief operating officer, Flipkart, spoke to *ET Magazine* on completing a decade and looking ahead: "In the first 10 years we were at the stage where growth was all-important. Now there is focus on supply chain and profitability"

"In the first 10 years we were at the stage where growth was all-important. Now there is focus on supply chain and profitability"

Nitin Seth, COO, Flipkart



"We crossed a major threshold in terms of internet access and mobile penetration but still lag behind heavily in terms of purchasing power capacity. The startups scaled ahead of time"

Rutvik Doshi,
director, India arm of
Inventus Capital Partners

chain and profitability."

"In the last 10 years we witnessed the creation of the entrepreneur ecosystem but not much wealth or sustainable revenue," says Ashish Gupta, cofounder of venture capital firm Helion Venture Partners. "In 2014-15 we saw premature excitement about a quickly growing and very large revenue pool. That view has corrected as most people realise that the anticipated revenue pool is smaller than previously thought and does not match the capital deployed."

"Most startups estimated the size and scale of the Indian market wrongly. We

crossed a major threshold in terms of internet access and mobile penetration but still



Snapping Out of It

On February 11, Snapdeal cofounder **Kunal Bahl** tweeted a picture: a 20-sided Egyptian die belonging to 200 BC. Museum Archive, which uploaded the original picture, describes its Twitter handle as "a collection of artifacts of cultural and historical relevance made available for public viewing". The description ends with four more words: Find your place in history.

Snap to February 23. Snapdeal created history of a slightly different and unprecedented kind in the nascent Indian startup world. Cofounders Bahl and Rohit Bansal will relinquish their salaries, and the online marketplace will fire some 600 employees.

A much-fancied unicorn, which till a few months back was championing the cause of "cashless India" through FreeCharge, is ostensibly running out of cash, has reportedly put the mobile wallet on the block and is resorting to some belt-tightening.

Venture capitalists say Snapdeal is suffering from the malaise that affected most of the startups: irrational scaling

In a letter to its employees, Snapdeal cofounders admitted that the company made errors in execution. Over the last two-three years, Bahl and Bansal wrote in the letter, with all the capital coming into this market, "our entire industry, including ourselves, started making mistakes. We started growing our business much before the right economic model and market fit was figured out".

Venture capitalists reckon that Snapdeal is suffering from the same malaise that affected most of the startups: irrational scaling. "Mass layoffs, no big round of funding and heavy losses are the side effects of scaling too fast too soon," says Rutvik Doshi, director at the India arm of Inventus Capital Partners. In order to gain market share, several startups acquired users rapidly by doling out discounts and subsidies. However, it did not lead to long-term loyalty because the consumers were not yet ready. Everyone, including startups and investors, thought that a multibillion market is available for grabs and forgot about the fundamental economics of a business. The valuations, Doshi says, were forward-looking, but unfortunately growth slowed down and unit economics did not improve, which led to falling valuations and money drying up.

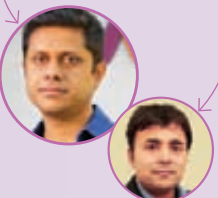
Snapdeal's next milestone is to turn profitable in two years. A lot more could happen till then.



MYNTRA

Online retail store for fashion and lifestyle products

Founders:
**Mukesh Bansal,
Ashutosh Lawania
& Vineet Saxena**



Total funding:

\$173.4MN

Prominent Investors: Flipkart, Accel Partners, Kalaari Capital, Naspers, Mumbai Angels

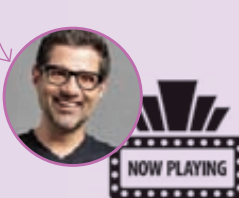
Acquisitions: native5.com; fitiquette.com; shersingh.com; cubeit.io; jabong.com; hrxbbrand.com

Flipkart acquired Myntra in May 2014

BOOKMYSHOW*

Online entertainment ticketing portal

Founders:
**Ashish Hemrajani,
Rajesh Balpande
& Parikshit Dar**



Total funding:

\$127.7MN

Prominent Investors: Accel Partners, SAIF Partners

Last funding: **July 2016, \$81.5MN**

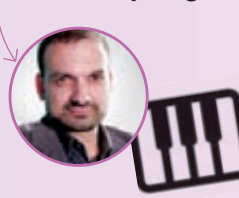
Acquisitions: mastitickets.in; townscript.com

*Founded in 1999, but went online in 2007

SAAVN

Music and radio streaming service in India

Founders:
**Vinod Bhat, Rishi
Malhotra &
Paramdeep Singh**



Total funding:

\$126MN

Prominent Investors: India Internet Group, Tiger Global Management

Last funding: **June 2016, Undisclosed amount**

THE 2007 WARRIORS

MERU

Radio taxi aggregator

Founder:
Neeraj Gupta

Total funding:

\$75MN

Investors: India Value Fund Advisors, Brand Capital
Last funding: June 2016, \$25MN

YUPPTV

Digital live streaming of Indian TV channels

Founder:
Uday Nandan Reddy

Total funding:

\$67.5MN

Investors: SRI Capital, Poarch Creek Indians, Emerald Media

Last funding: Oct 2016, \$50MN

NEXT EDUCATION

K-12-focused, technology-based education solutions

Founder:
Beas Dev Ralhan

Total funding:

\$60MN

Last funding: Mar 2014, \$60MN

Acquisitions: xolvtr.com; inopen.in

lag behind heavily in terms of purchasing power capacity. The startups scaled ahead of time,” adds Rutvik Doshi, director at the India arm of Inventus Capital Partners, which is based out of Bengaluru and Silicon Valley.

Adhil Shetty, cofounder of online financial services portal BankBazaar, started out in 2008, along with brother Arjun and sister-in-law Rati Shetty. Almost a decade later, the family-led startup clocked ₹70 crore in revenues (not GMV) in 2015-16. Shetty does not harp on growth – he says his secret sauce is sticking to the knitting and focusing on online alone, resisting the temptation to go offline.

The mood is captured by startups-come-lately like the three-year-old Curofy, a doctors’ networking venture. Cofounder Nipun Goyal, an IIT-Delhi graduate who traded his investment banker robes at Rothschild & Co for the overalls of a startup, speaks circumspectly about eschewing vanity metrics and focusing early on profits.

The good news is that much of the hard work on the basics may have been done. Says Sandeep Singhal, cofounder of Nexus Venture Partners: “A lot of capital initially went into building the market. Everyone had to build their own supply chain, train personnel and even educate consumers and vendors on how to buy and sell products online.”



“A lot of capital initially went into building the market. Everyone had to build supply chain, train personnel and even educate consumers”

Sandeep Singhal, cofounder, Nexus Venture Partners

Meru Cabs is another venture that was born in 2007, before the smartphone era, and before Uber and Ola hit the road. The radio taxi service can take credit for perhaps seeding the ground for ride-sharing apps. Says CEO Nilesh Sangoi: “Today, we have managed to make mobile apps our largest demand channel.”

Scale built over the past decade may also offer clues to standalone sustainability. GinnarSoft, which runs auto portals such as CarDekho.com, Gaadi.com and ZigWheels.com, was founded the same year as Flipkart: 2007. Ten years down the line, both companies are in the red, albeit on different scales. While Flipkart reportedly posted revenues of ₹17,930 crore against a loss of ₹5,769 crore for the year ended March 2016, the corresponding numbers for the biggest player in the used-car segment are ₹82.5 crore and ₹144 crore. However, Anurag Jain, cofounder of GinnarSoft, reckons, “We are at the cusp of being operationally profitable, excluding marketing costs.”

No Way Out

What worries some is that there are not enough exits happening. Yatra.com’s listing on the Nasdaq through a

reverse merger in December last year is probably the high point of the last decade. Buyouts have been few and far between – such as Flipkart buying Myntra and then Jabong, besides the MakeMyTrip-Ibibo Group merger. And a few deals may come unstuck. Snapdeal is reportedly preparing to sell FreeCharge for \$100 million less than the \$400 million it forked out in 2015 for the payments app.

Sameer Jindal, managing director of global investment bank GCA, has spent a lifetime in the technology M&A arena and was based in San Francisco before moving to Mumbai in October 2013. Jindal says it is a norm for VCs in Silicon Valley to look for an exit within five to six years, which he agrees is a crazy time frame.

Jindal would like to see Indian companies and entrepreneurs turning up a little more at roadshows and events in India and abroad, showing their faces and getting known to people who might finally buy them out. “A tech company must get bought. It should not have to be sold,” says Jindal.

Arihant Patni, a scion of the Patni family and managing director of Patni Financial Services, which runs two venture funds, says: “Our VC space is over 10 years old, starting off in 2004-05. We have just finished one cycle.”

For the unicorns – or at least those that still have their heads above the \$1 billion value watermark – buying at attractive valuations in sombre times isn’t a bad idea. Quikr founder Pranay Chulet, for instance, is using the opportunity to grab some good deals. Since November 2015, the classified ads platform has picked up smaller rivals in verticals such as

“Focusing on one problem area helps not just build a product but find a solution to that problem”

Shashank ND, cofounder, Practo



automobiles, jobs, real estate and beauty services with undisclosed price tags. “This is an excellent market to make good deals,” says Chulet. “However, we are not indiscriminately buying companies. It will take us six quarters to be profitable, with the first vertical expected to break even in three to seven months.”

Journey Down the Pyramid

If acquisitions is one way to grow (profitably), another is to seek out new customers in new markets. Explains Flipkart’s Seth: “In the last 10 years we were focused on the top of the pyramid. In the last 10 years even the nature of the Indian consumer has changed.” The growth, he says, does not lie in SEC A, but in SEC B, C and D. (The socioeconomic classification or SEC groups urban Indian households on the basis of education and occupation of the main wage earner.) “Those consumers are very different, have different needs. India-specific solutions will be needed to address them. Catering to tier-2 and tier-3, the middle of the pyramid, with different income levels, will need a lot of innovation.”

As the startup ecosystem clears out (of not just ventures, but some funds too), entrepreneurs and risk capital providers are resetting their goals. “This is the best time for an entrepreneur to build a strong busi-

“There is a lot of opportunity to build good companies, with more careful attention to how money is spent”

Ashish Gupta, cofounder, Helion Venture Partners



“This is a good time for investors, with accidental entrepreneurs staying away from a tougher market”

K Ganesh, serial entrepreneur

THEY'LL BE IO NEXT YEAR

QUIKR

Classified ads portal

Total funding:
\$369.5MN

Last funding:
 Aug 2016, \$19.4MN

Founder:
Pranay Chulet



ZOMATO

Platform for food discovery and online ordering



Total funding:
\$225MN
 Last funding:
 Sep 2015, \$60MN

Founders:
Deepinder Goyal & Pankaj Chaddah

PRACTO

Practice management software for doctors and a platform for consumers to search for doctors



Total funding:
\$179.5MN

Last funding:
 Jan 2017, \$55MN

Founders:
Shashank ND & Abhinav Lal

ness, without the distraction of crazy salaries and chasing unrealistic valuations,” says serial entrepreneur K Ganesh. “From the investor point of view too, this is a good time, with accidental entrepreneurs staying away from a tougher market.”

Entrepreneurs may have to crack these business models using their funds more judiciously. “I think there is a lot of opportunity to build good companies, with more careful attention to how money is spent,” says Gupta of Helion. “They need to avoid getting (cash) burn too far ahead of market opportunity.”

Akhilesh Tuteja, a partner at KPMG, feels me-too ideas will not survive in India any more. “There can be one national winner and may be one regional winner with a product. There is no second Twitter or Facebook. So if it is etailing, surely in the long run, there cannot be five of them.”

“This is an excellent market to make good deals. But we are not indiscriminately buying firms. It will take us six quarters to be profitable”

Pranay Chulet, founder, Quikr



“In 2014 everything was gold. In 2017 everything is being questioned. A business will go through many cycles of euphoria and bust”

Adhil Shetty, cofounder, BankBazaar

Tuteja feels that there may be space for regional specialists in a large market like India, but what will really survive will be unique and well timed ideas. “The biggest factor is timing. You have to bring your idea to play right on time – like how BookMyShow went online at a particular time (2007).”

Experimenting in the garage-phase days may be fine, but entrepreneurs have to quickly zero in on a business model. Shashank ND, who founded Practo, a healthcare discovery and booking platform in 2008, points out that startups during their bootstrap period should identify one problem area and try and find a solution for it from end to end. “This helps build not just a product but find a solution to that problem.”

The ventures of the 2007-17 decade may have also done their bit in spurring the entrepreneurial itch – and holding out some (hard) lessons for a fresh bunch of startup guys. “Over 40 startups have been founded by ex-InMobiens,” declares Arun Pattabhiraman, global head of marketing at InMobi, a mobile advertising platform and one of India’s unicorns. He also talks about the “boomerangs”: people who left the company to start new ventures and came back when they failed. Over the past year, 18 have returned to the fold.

In 2017, the prodigals may still be able to find their way back home. It may not be as easy in the years ahead. ■

BYJU'S CLASSES

Hybrid test preparation & learning platform



Total funding:
\$174MN

Last funding:
 Dec 2016, \$15MN

Founder:
Byju Raveendran

DRUVA

Enterprise endpoint backup & DLP solution



Total funding:
\$118MN

Last funding:
 Sep 2016, \$51MN

Founders:
Jaspreet Singh & Milind Borate

NAAPTOL

Shopping portal



Total funding:
\$110.7MN

Last funding:
 Nov 2015, \$51.7MN

Founder:
Manu Agarwal

POLICYBAZAAR

Online insurance aggregator



Total funding:
\$82.8MN

Last funding: Apr 2015, \$40MN

Founder: **Yashish Dahiya**

BANKBAZAAR

Loan comparison platform



Total funding:
\$80MN

Last funding: Jul 2015, \$60MN

Founder: **Adhil Shetty**

AMAGI

Cloud-based, localised advertising on TV channels



Total funding:
\$60.7MN

Last funding:
 Dec 2016, \$35MN

Founders:
Baskar Subramanian, Srinivasan KA & Srividhya Srinivasan

HOMESHOP18

Online and on-air retail marketing and distribution venture



Total funding:
\$65MN

Last funding:
 Oct 2013, \$14MN

Founder:
Sundeep Malhotra

CAPILLARY TECH

Customer engagement solutions for retailers



Total funding:
\$79.1MN

Last funding:
 Sep 2016, \$3MN

Founders:
Aneesh Reddy, Ajay Modani & Krishna Mehra

CARDEKHO

Auto portal for car research and buying/selling deals



Total funding:
\$80MN

Last funding:
 Feb 2016, \$15MN

Founder:
Amit Jain

Health is Wealth

The government's recent cap on stent prices is an indicator of what potential entrepreneurs can tap in affordable medical devices geared to the Indian market

:: G Seetharaman

Three years ago, Nitesh Kumar Jangir, an electronics engineer, and Nachiket Deval, a product designer from the National Institute of Design, were wondering what their medical technology startup Coeo Labs should make. So as part of a project, they teamed up with a business graduate and three doctors at one of Bengaluru's best-known tertiary care hospitals. Their objective: to find an unmet need in critical care that they can come up with a solution to.

They spent two-and-a-half months at the hospital keeping a close eye on the goings-on at the intensive care unit. It was then a 30-year-old was wheeled in with a head injury from a motorcycle accident. The injury was not life-threatening but he was still put

on ventilator support to avoid respiratory complications. Jangir and his team were told he would be moved out of the ICU in 3-4 days, but it was not to be. The patient had contracted ventilator-associated pneumonia (VAP), an infection of the lungs resulting from the bacteria in the fluids that

"Having a doctor (on your team) helps you in understanding medical needs and in proving your product"

collect in the lungs of a patient who has been on a ventilator for more than 48 hours.

As is the fate of half of those who get VAP in India, this patient did not make it, breathing his last a week after being taken into the ICU. While it may not at first seem ideal that Jangir and Deval found their Eureka moment in the morbidity of one's death, what they would come up with could prevent the deaths of many more. (VAP, according to Jangir, claims 2.5 lakh lives in India every year.) With grants of ₹90 lakh from the department of biotechnology of the Indian government, they developed VAPCare, a device which removes saliva and also pushes anti-microbial liquid into oral cavities just in case some of the saliva trickles into the lungs. With VAPCare, which Jangir says is a "first-in-the-world device", what is usually done by a nurse is now automated and done more efficiently.

Medtech Innovations

"It's an intelligent secretion and oral management device," says Jangir. Coeo has filed patents for VAPCare in 12 countries, including India; the company is now building an order pipeline for the device. Another device Coeo has developed is

Coeo Labs

Founders: **Nitesh Kumar Jangir & Nachiket Deval**

Started in: 2014

Funds raised: **₹1.9 crore** in grants and undisclosed funds raised from InnAccel

Product: **A neonatal transport CPAP (continuous positive airway pressure) machine and a device to tackle ventilator-associated pneumonia in long-term ICU patients**



PHOTOS: DEEPAK G PAWAR

"VAPCare, a 'first-in-the-world device', is an intelligent secretion and oral management device"

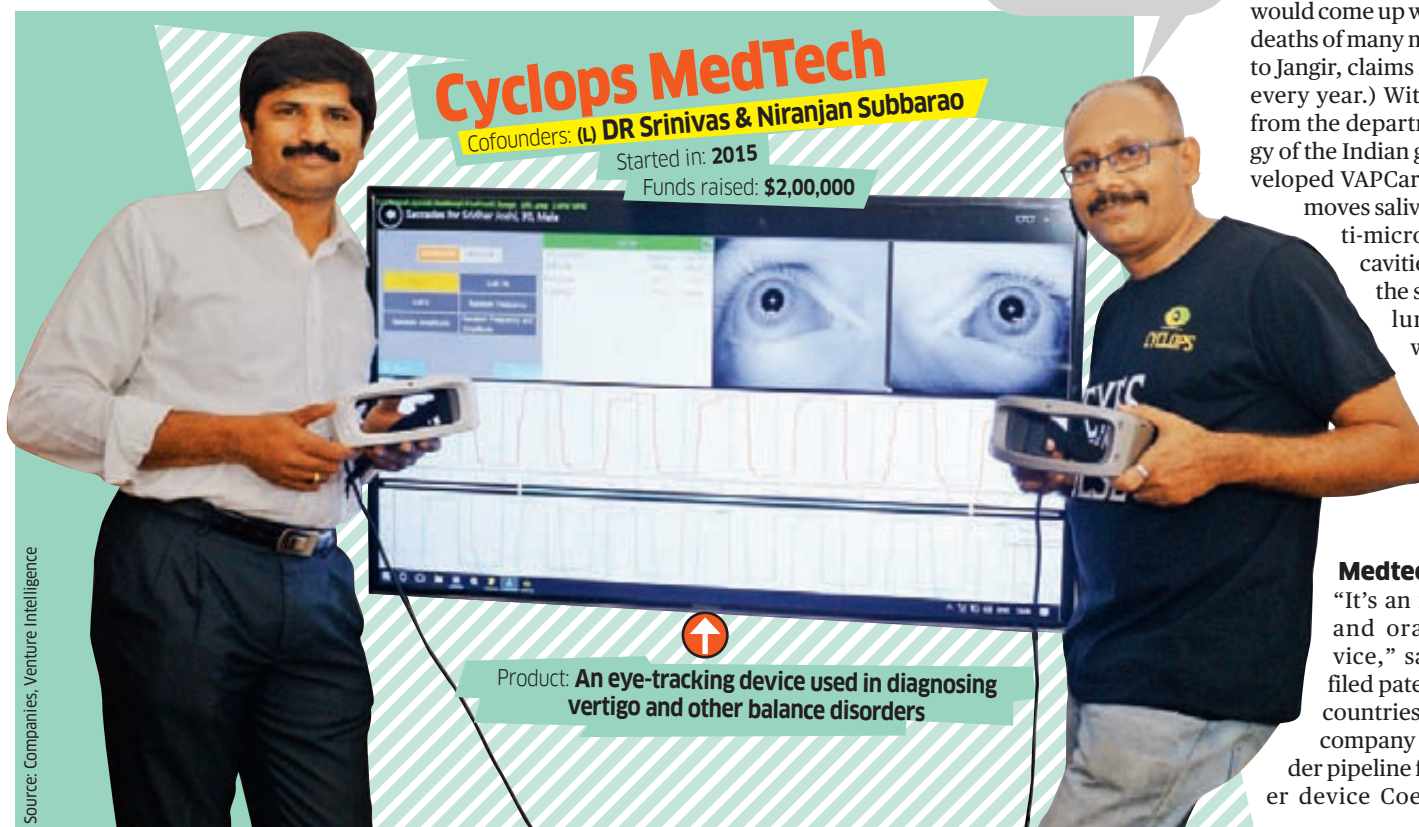
Cyclops MedTech

Cofounders: **DR Srinivas & Niranjan Subbarao**

Started in: 2015

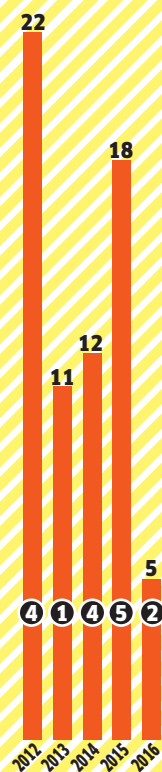
Funds raised: **\$2,00,000**

Product: **An eye-tracking device used in diagnosing vertigo and other balance disorders**



The medical device startup ecosystem is still nascent

VC investment (\$ million)
 No. of deals



Source: Venture Intelligence

ten3T Healthcare

Founders: **Prasad Bhat, Sudhir Borgonha & Rahul Shingrani**

Started in: **2014**

Funds raised: **\$2,50,000**

Product: **A triangular patch stuck on a patient's chest for a spot ECG and to measure blood oxygen and respiration, among others**



"We won't charge hospitals for the product but we will when they use any of its applications"

more specific to the conditions of a developing economy like India. A neonatal transport continuous positive airway pressure (CPAP) device, Saans can be used with electric power or, in its absence, with something as simple as a mechanical pump. "The device is still being tested but it will be priced at one-third of the existing CPAP devices used in NICUs (neonatal intensive care units)," notes the 27-year-old.

Entrepreneurs like Jangir and Deval are finally finding their feet in medical technology, particularly devices, which have a long gestation unlike health apps and platforms, thanks to the time spent on research and development, and pilot projects. Investors are still warming to the sector, with the last five years seeing only 16 venture capital investments totalling \$68 million, according to data compiled by Venture Intelligence.

The recent order of the National Pharmaceutical Pricing Authority (NPPA), cutting prices of coronary stents by up to 85%, has kicked up a huge debate about the high prices of some medical equipment and profiteering by their manufacturers and hospitals. This decision may not di-

rectly affect aspiring medtech entrepreneurs since the market for stents is already crowded with market leaders like Abbott Laboratories and Medtronic, and several Indian companies, but it points to the huge opportunity that exists for Indian companies that can make devices suited to the challenges of the Indian healthcare system, rather than those transplanted from a research lab in the US or Germany, and at the same time, price them a lot cheaper than their global competitors' alternatives.

The Indian medical device market, which was at \$3.8 billion in 2014, is expected to grow to \$8.6 billion by 2020.

Barath Shankar Subramanian of Accel, a venture capital firm, says given that 70% of India's medical device requirements are imported, the opportunity is huge, although "we do find it challenging to find talent – especially innovation focused talent. But these are all getting better over time."

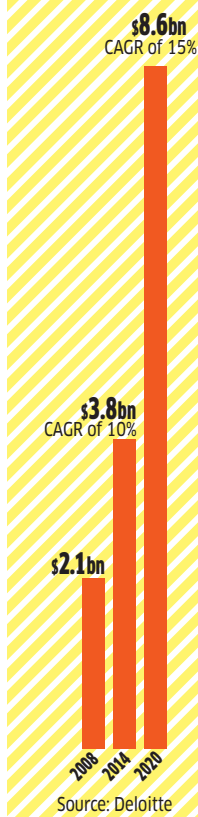
At Cheaper Rates

Prashant Jha, fellowship director at the School of International Biodesign, which focuses on low-cost medtech innovations, believes the NPPA decision is good news for Indian innovators. "You get more value for the money you spend on R&D in India than in Palo Alto so you can sell at the regulated price, which an MNC can't," says Jha.

The school, funded by the Indian government, is a collaboration between Stanford University, the Indian Institute of Technology-Delhi and the All India Institute of Medical Sciences, Delhi, among others. Jha says among the prerequisites for the fellowship at the school are that the product should be globally patentable and should cost a tenth of the cheapest MNC product.

A cheaper price tag is only one of

The Indian medical device industry is expected to grow at a steady clip



the USPs of Sattva MedTech's portable foetal monitoring device. Sattva, also founded in 2014, had its genesis in cofounder Vibhav Joshi's interactions with his mother, a gynaecologist in Pune. She told him about the problems she faced with the monitor used to measure foetal heart rate. "It is very ambiguous and involves a lot of subjectivity because you are also picking up sounds from the mother's heart in addition to the baby's heart," says Joshi. There are 3 lakh perinatal deaths (both stillborn babies and neonatal deaths) annually in India, according to Sattva.

Joshi and cofounder Sumedh Kaulgud came up with an alternative ECG-based foetal distress monitor which is more accurate because it works on electrical signals rather than sound. Fetal Lite is undergoing pilot demos and will soon be commercialised. Joshi says Fetal Lite will be priced in the ₹70,000-1.5 lakh range, which is what a traditional foetal monitor costs. The monitors sold by the likes of General Electric and Philips are priced at around ₹4 lakh.

"We are solving a problem as opposed to just selling a product. Price becomes relevant only when the product is commoditised," says Siraj Dhanani, cofounder and chief executive of InnAccel, an accelerator-turned-medtech company, which has

"When we started the company in 2014, the technology of our product had been theoretically proven to work but there were very few companies"

Sattva MedTech

Founders: **(L) Vibhav Joshi & Sumedh Kaulgud**

Started in: **2014**

Funds raised: **NA**

Product: **An ECG device to monitor the heart rate of a foetus during labour**



India's annual per capita spend on medical devices is very low



While there are around 750 medical device manufacturers in India, 70% of the country's medical devices are imported

Source: Deloitte

“We are solving a problem as opposed to just selling a product. Price becomes relevant only when the product is commoditised”

InnAccel

Cofounder: **Siraj Dhanani**

Started in: **2012**

Funds raised: **₹22 crore***

Product: **A balloon sinus dilation device to open up sinus pathways in the nose**

*Also includes funds invested by founders

backed both Coeo and Sattva. One of InnAccel's two products is a balloon sinus dilation device used to open up sinus pathways in those suffering from sinusitis. The product, SinuCare, will be available for a third of the price of its global competitors.

Ranjith Menon, executive director of IDG Ventures, a VC firm, says the fundamental difference between western markets and India is that the high cost of procedures in the former is borne by insurance companies, while in India, where less than a fifth of the population has health insurance, the patient mostly pays for it. “So you need to ensure the cost of the procedure is low.”

Simple Tools

While the general preference among medtech startups is to price their products substantially lower than the market leaders, there are some who think differently. “Affordability is about value rather than price,” says Abhinav Ramani, programme manager, Consure Medical. The company has priced the three variants of its product, which helps manage fecal incontinence, at ₹8,000-18,000, which Ramani says is competitive to its rivals'. Consure is backed by the likes of Accel, India Venture Partners and India Innovation Fund.

K Chandrasekhar, cofounder and CEO of Forus Health, which has installed 1,400 of its retinal imaging devices in 26 countries, says it is important for a young company to position its devices in such a way they are not termed cheap, but as products which offer good value. Set up in 2010, Forus has raised \$13 million from investors like IDG Ventures and Accel.

Anand Sivaraman, cofounder of Remidio Innovative Solutions, founded around the same time as Forus and also involved in retinal imaging, does not believe that a product can be made more accessible just by cutting its price. “We create access by focusing on simplicity and moving the device closer to

the patient.” Remidio's flagship device uses a smartphone to take an image of the eye. “These are devices which were used only in the tertiary care centres but can now be used by those who are not optometrists or ophthalmologists.

R Venkatesh, chief medical officer at Aravind Eye Hospital in Puducherry, which has been using Remidio's device for five years, concurs with Sivaraman. “You can even train a layman to use it in a week. He just needs a bit of orientation in optics.” Venkatesh adds that Remidio's device is not inferior to its more expensive alternatives and in fact performs most of their functions though it comes at only an eighth to a tenth of its competitors' prices.

Chandrasekhar believes patients' behaviour also needs to be taken into account

“We create access by focusing on simplicity and moving the device closer to the patient”

Consure Medical

Abhinav Ramani, programme manager

Started in: **2012**

Funds raised: **\$5 mn**

Product: **A device for those with faecal incontinence**

“Affordability (in medical devices) is about value rather than price”



ASHWANI NAGPAL

Remidio Innovative Solutions

Cofounder: **Anand Sivaraman**

Started in: **2009**

Funds raised: **\$1.3 mn**

Product: **Retinal imaging devices, one of which can be used with a smartphone even by those not trained in ophthalmology or optometry**



while designing a device because an equipment far removed from the patient's expectations could result in the patient not taking its results seriously. “The transition (in design) needs to be steady.”

Pricing and design apart, startups are counting on the presence of a doctor on the founding team to give them some much-needed edge when they pitch to potential clients. “Having a doctor helps you in understanding medical needs and in proving your product,” says Niranjan Subbarao, cofounder of Cyclops MedTech, which makes an eye-tracking device to diagnose vertigo and other balance disorders. The other two founders are both doctors. Cyclops, which has raised around \$2,00,000, launched its device two weeks ago.

Another company with a doctor at the helm is ten3T Healthcare, which has devel-

oped a triangular patch that can be stuck on a patient's chest for medical-grade data on pulse, respiration and blood oxygen, and also for a spot ECG. The patient can even be sent home with the patch and the data monitored real time. “A fair chunk of patients who are in the ICU don't need to be there,” says CEO Sudhir Borgonha.

Attracting Funds

While most medical device startups choose to market the devices they developed, some are happy to be known for their intellectual property. Pune-based Embryo Technologies, established in 2014 by two mechanical engineering graduates from the Indian Institute of Technology-Bombay, is one of those. “We want to be known as a medtech inventions company and we could license our technology to a medical device compa-

ny,” says cofounder Nishant Kumar, 30.

Among Embryo's six products, which are in different stages of development, are an electronic pill box to help doctors monitor drug adherence among tuberculosis patients and an infant brain growth monitoring device. Embryo has so far raised \$4,00,000 in grants from the Bill & Melinda Gates Foundation, USAID, and agencies of the Indian government, among others.

Medical device startups, thanks to the very nature of their business, will not see investors flocking to them, as has happened in e-commerce and the sharing economy. But as more and more unique and affordable technologies are developed to cater to the medical needs of a woefully underserved country like India, the ecosystem is bound to attract reasonable amounts of money. Moreover, a device that works here could be taken to other countries with problems similar to India's. ■

Vendor Bender

Online sellers have been clamouring for help much before the turbulence in Indian ecommerce hit the headlines

:: Shephali Bhatt

These are difficult times for etailers. Snapdeal has laid off by the hundreds and the grapevine's buzzing with others set to shut shop. Amid the chaos, there's one party that claims to have been ignored all along: the vendors.

As ecommerce gained ground over the past few years, small & medium enterprises (SMEs) left traditional retail to enter the online marketplace. As etailers snared top dollar in funding, vendors reckoned they were in for boom times.

It hasn't quite panned out that way for many. Take Bengaluru-based Sumanth Lingala, for instance. The 30-year-old quit his IT job at TCS to start an online mobile distribution network (Green Mobiles) with younger brother Hemant. He just did an annual turnover of ₹650 crore but that's because he closely works with only Amazon India now. Other marketplaces had curbed his enthusiasm initially. "There was no policy for lost goods, and pilferage was bound to happen in warehouses. We lost ₹40 lakh worth of inventory at one prominent etailer. I fought with them for 8-9 months but they didn't release anything." Another top etailer doesn't even do inventory reconciliation, he adds. He is convinced that each of these platforms had their own set of favourites.

Consumer Frauds

If that wasn't enough, there were return frauds with no compensation whatsoever. "18% to 20% of couriers delivered on COD (cash on delivery) are returned. 10% of goods are opened and then returned. 2% are used and returned."

For Asad Abedi, a 55-year-old beauty products vendor from Hyderabad, the return ratio is 1:5 on a good day; on others it gets much worse. Abedi, however, feels the marketplace isn't the only villain in this show. Some sellers are unethical as well. "So, we make sure we sell original products with good validity period."

It must have been this band of defaulter sellers that ruined Rahul Agrawal's initial experience of the marketplace. The 30-year-old runs a family business of Banarasi sarees that's as old as him on this planet. In 2012, his small Varanasi shop appeared on the marketplace through Snapdeal. "We made every effort to learn the tricks of this new trade. We learned that the volume is good but one has to be razor-sharp. A little carelessness could cost you a lot of money." Agrawal lost a lot of business despite being careful. He found out that some vendor was selling the same product (Banarasi sarees) on Snapdeal under his brand name – Chandrakala Enterprises.

"We reached out to Snapdeal. They asked us for a trademark or legal certification. When we provided everything, they left it at: 'It's a third-party vendor. We can't do anything about this'. After that, I reduced my inventory on Snapdeal." Snapdeal did not respond to emailed questions.

Commission Omission

When Agrawal moved onto Flipkart, he found himself in a new battle – fighting the indiscriminate shipping charges, which he did for two years till they changed the rules.

But those two years were nightmarish, he says. "We are not a big funded company, you see. We can't concentrate on these hassles. Every portal promises around 15% commission cut. But the total value deducted from every order amounts to 30%-35%."

Few vendors actually take the 'I'll see you in court' tone with these portals worrying it'll only add to their problems. Social media and the All India Online Vendors Association (AIOVA), a lobby that represents over 2,000 online sellers from across the country, are more pragmatic options

The AIOVA website currently has over 2,225 posts across 461 threads where vendors have discussed issues of payment, return and frauds, and claims and disputes across marketplaces including Amazon, Flipkart, Snapdeal, Homeshop18, Shopclues, Voonik, Jabong, Limroad, Myntra, Craftsvilla, Paytm, eBay, and others. There are posts written in broken English, perhaps with a broken heart as well, of how payments from some of the biggest etailers haven't been received.

Amazing Amazon

Almost all the vendors ET Magazine spoke to – on and off record – said that Amazon is the best marketplace to work with at this point what with its transparent policies and faster, smoother pro-

cesses. Smaller wonder Amazon India was the only big etailer that shared details of its seller support programmes with ET Magazine.

But there's room for improvement, however tiny, even at Bezos' India office. As per an email forwarded by a vendor to AIOVA: Amazon has blocked all listings of the said vendor based on a complaint by Samsung. Neither has it shared the complaint made by Samsung, nor has it explained why the portal has held the vendor's funds of non-Samsung products. On October 1, 2016, the public policy executive had replied: "We'll check and come back to you." They're yet to come back. We couldn't get Amazon's response to this claim since the vendor had requested anonymity. The case remains unresolved to date, he tells us.

Says Sandeep Ladda, leader – ecommerce and technology at PricewaterhouseCoopers India: "Online sellers in India are facing several issues from increased sales commission, shipping fees and reverse shipping fees, to being penalised for returned goods, bearing logistics costs, or returning commissions in case a customer opens the package and returns." All these issues hit vendor margins. And, if they are not addressed, they could affect the growth prospects of the market, he points out.

Seller's Redressal Forum?

For some, the growth prospects have been affected already. Perhaps that's the reason Agrawal is holding onto his offline Banarasi saree business as a safety anchor, where business is small but profits are no stranger. "Unlike online where the sales are up but I'm making no money. In fact, I'm worried about losing money," says Agrawal. If the marketplace is increasingly going to favour its own inventory and overlook the issues of other vendors, sellers will eventually start leaving the industry, he feels. Does that mean the marketplace model doesn't work for India?

Anil Talreja, partner at Deloitte Haskins & Sells, thinks there's nothing wrong with the model but its implementation. He points to the need of government intervention to set things right.

A few AIOVA members feel the government doesn't see ecommerce and therefore online vendors anywhere on its priority list. "Several leaders related to NITI Aayog, DIPP, and the Ministry of Commerce & Industry have clearly told us they've met us only because we hounded them on social media. They don't understand the nuances of online businesses and therefore aren't able to empathise with us," says an AIOVA member.

The lesson for online vendors and potential ones perhaps lies online in a post on AIOVA: "Try and keep ecommerce as a side business. Don't make your livelihood depend on it." ■

"I'm worried about losing money thanks to every portal's warped fee structure"

Rahul Agrawal,
Chandrakala Enterprises,
Varanasi

"Amazon is a lot better than the other portals. We had to sever ties with a lot of them owing to their fee and margin structure, accounting system, and returned goods policies"

Asad Abedi,
Global Brands, Hyderabad

"I do not see any need for a bigger forum. I'm not going to run to a forum for small issues. Seller support is helpful"

Ruchika Ralhan,
Via Mazzini, Gurgaon



Mahi's Way

We look back at a decade of MS Dhoni as captain of the Indian cricket team, from the time a long-haired buccaneer took over the one-day role in 2007, to a senior statesman stepping aside from his role as the skipper of Pune's IPL team early February this year

By Rahul Sachitanand

CAPTAINCY RECORD

Dhoni's record as an Indian captain

Format	Matches	Won	Lost	Drawn	Tied	NRs	Won%
Test	60	27	18	15	0	0	45.00
ODIs	199	110	74	0	4	11	55.28
T20Is	72	41	28	0	1	2	56.94
Total	331	178	120	15	5	13	53.78

Source: BCCI

"No, I am on national duty, everything else can wait"

— Dhoni, after his daughter Ziva was born weeks before the World Cup 2015

"You don't play for the crowd, you play for the country"

— On moving on to a younger side for ODIs after the Tests in Australia 2011-12

"We are told that Mumbai is a city which is always on the move. See, me and my boys have brought the entire city to a standstill today"

— Dhoni's reaction after crowds thronged to welcome the team at a parade following the World T20 win



BEYOND THE BOUNDARY

MS Dhoni: The Untold Story, starring Sushant Singh Rajput and directed by Neeraj Pandey was released in 2016

Mahi Racing India: In July 2012, Dhoni, a massive gearhead, launched a team to compete in FIM Supersport World Championship

Brands endorsed: At least 21, including Reebok, Aircel, Boost, Pepsi, Exide, Sonata watches, Sony Bravia

SportsFit: Launched a series of fitness centres with his manager Arun Pandey, with ₹2,000 crore invested and plans announced to have a chain of 200 gyms

CONTROVERSIES

2007: New captain is mired in trouble immediately when Sourav Ganguly and Rahul Dravid are dropped from the Indian T20 team, with stories floating of a rift with then deputy Virender Sehwag

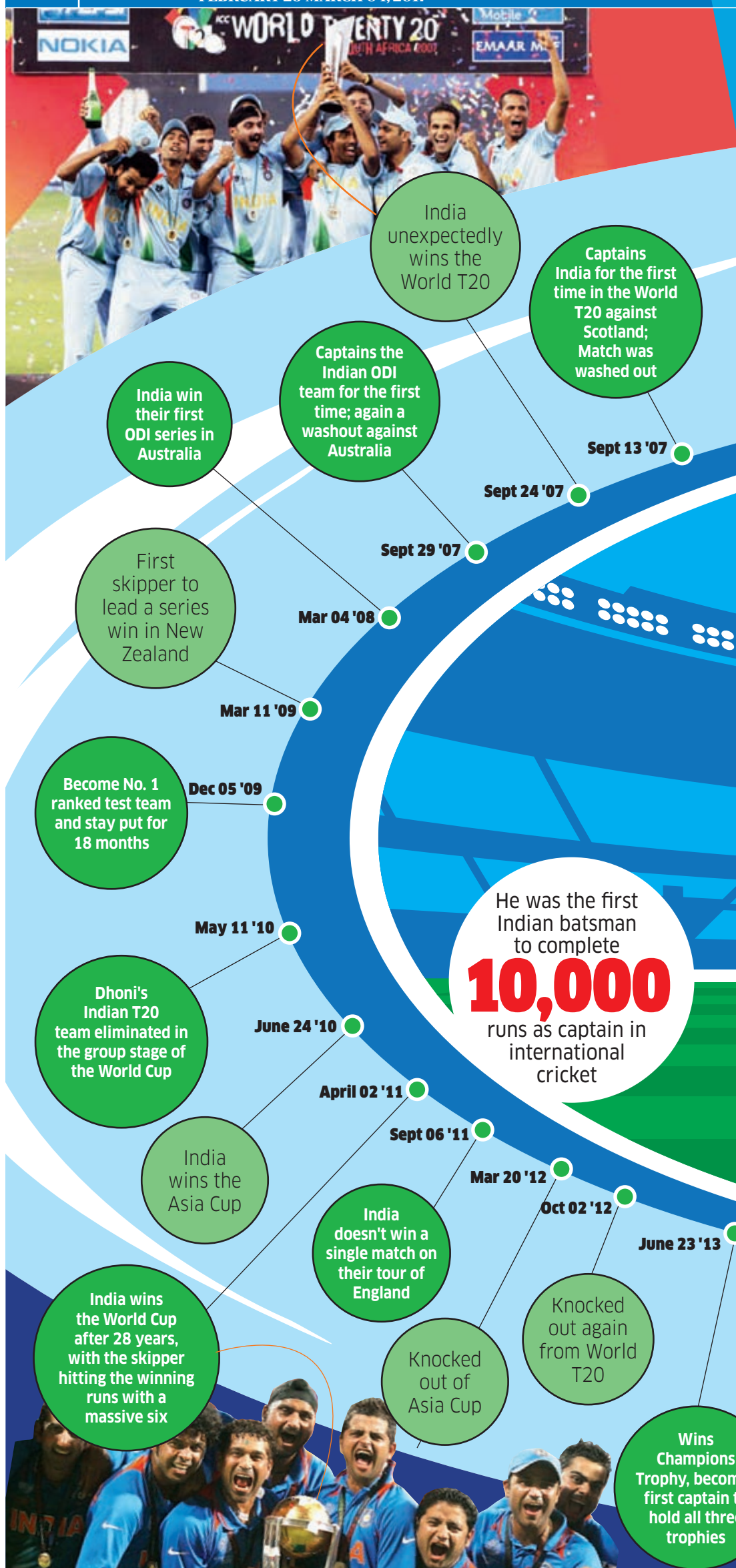
2013: Dhoni is accused of holding a stake in Rihiti Sports, a firm managing him, Suresh Raina, Ravindra Jadeja and Pragyan Ojha. He denied holding any such stake

2013: His name is dragged into a spot-fixing probe centred around Gurusath Meiyappan, son-in-law of then BCCI chief N Srinivasan and listed as team principal of Chennai Super Kings. Eventually, in 2015, CSK and Rajasthan Royals are suspended for two years and MSD moves grudgingly to lead the Rising Pune Supergiants

2015: The normally unflappable Dhoni loses his cool over a poor umpiring decision and is fined 10% of his fee for his trouble. In the same year he and a Bangladeshi player collide with and push each other and the Indian captain is fined 75% of his fee

2016: MS Dhoni: The Untold Story, the biopic, is criticised for airbrushing inconvenient topics from the story, including players he dropped and movie stars he may or may not have dated

He was the first Indian batsman to complete **10,000** runs as captain in international cricket



Valley of the Polls

Voters of Imphal Valley, traditionally a Congress stronghold, will be key to who reigns in Manipur

:: Shantanu Nandan Sharma

It was the evening of August 31, 2015. The residence of Phungzathang Tonsing, six-time MLA and former Congress minister, in Churachandpur in south-west Manipur was reduced to ashes by a mob agitating against the state assembly passing three bills perceived to be against the interests of tribals living in the hills. The bills were later rejected by the President of India on technical grounds, but the damage was done. Houses of one member of Parliament and five members of the legislative assembly, Tonsing's included, were burnt down. And the police, which had



SHANTANU NANDAN SHARMA



2,181
 underground cadres living in SoO (Suspension of Operation) camps are provided postal ballots to vote after taking approval from the Union law ministry

18 of the 60 seats are considered sensitive. EC declares 352 villages as vulnerable

failed to anticipate such a violent reaction by citizens, made the blunder of firing at the crowd, leaving nine agitators dead.

The story did not quite end there. The agitators declared the dead as martyrs and refused to bury them. Eighteen months after the incident, eight of nine bodies are still lying in a morgue in Churachandpur, 60 km south of Manipur's capital, Imphal.

Hill versus Valley

In the last two months, Tonsing has got his two-storey home rebuilt, but he could not garner the courage to fight the assembly election on a Congress ticket. "There's a sentiment against the Congress. People have no grudges against me, but are against the party," says Tonsing, who left the Congress just three days before the last date for filing the nomination and even after the All India Congress Committee had cleared his name as a candidate from Churachandpur. After tendering his resignation, Tonsing joined the National People's Party (NPP) headed by Conrad K Sangma, son of former Lok Sabha speaker PA Sangma, and filed his nomination.

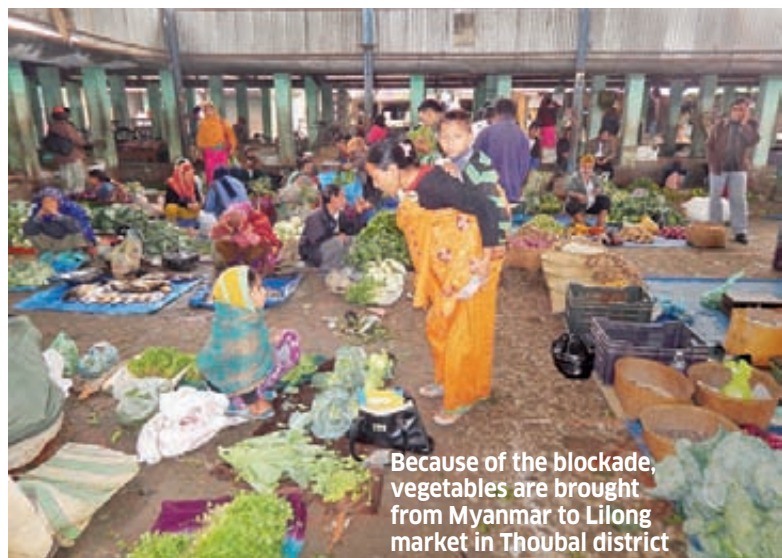
This sums up the prevailing mood against the Congress in the hills of Manipur that account for 20 of 60 seats. Yet, for Manipur Chief Minister Okram Ibobi Singh, the astute politician who survived many a storm, including a recent underhand attempt by rivals to snatch 20 of his MLAs and impose President's Rule, the hills-valley divide is part of a well-calibrated strategy to turn the upcoming elections on March 4 and 8 into one of sentiments. This would help Singh steer clear of a situation in which voters would demand a balance-sheet of the 15 years of Congress rule. Further, the Centre's decision to wrap the 2015 framework agreement with the Nationalist Socialist Council of Nagaland – Isak-Muivah (NSCN I-M) in secrecy, indirectly aided Singh's strategy of consolidating his party's position in the valley. It is the home of the Meiteis (including Muslims called Meitei Pangals) who comprise half of Manipur's population but occupy just one-tenth of the state's land. The I-M faction emerged from a split in the



Sword Vashum, elder brother of VS Atem, NSCN (I-M)'s former military chief, is contesting from Chingai constituency on a BJP ticket. State BJP president says the ticket was given "on the basis of winnability"



Blockade has led to petrol being sold in the black market in many places, including this village along Imphal-Moreh road



Because of the blockade, vegetables are brought from Myanmar to Lilong market in Thoubal district

Manipur
Total Seats: 60

Poll dates: **March 4 & 8**



Imphal Valley:
40 seats

Demographics: **Dominated by non-tribal Meitei ethnic community**

Main issues: **Territorial integrity of Manipur**, price rise arising out of economic blockade by Naga groups

Poll toll: **For Congress to win the state, it has to get two-thirds of seats in this belt. It's a traditional Congress bastion but BJP is fielding former Congress leaders and harping on issues like non-development and corruption under the Ibobi Singh government**

Hills of the Nagas:
11 seats

Demographics: **Nagas dominate these assembly segments in districts such as Ukhrul, Senapati and Tamenglong**

Main issues: **Government's decision of creating 7 new districts**, dividing voters along ethnic lines

Poll toll: **The contest is between BJP and the Naga People's Front; NPF is likely to join BJP post polls; the Congress is not a factor here**

Hills of the Kuki-Mizo-Zo clans:
9 seats

Demographics: **Comprise non-Naga tribes**

Main issue: **Passing of three bills by state government** (later rejected by the President) that led to a hills versus plains agitation in 2015

Poll toll: **Candidates matter more than parties; Congress is hoping to win a few Kuki-dominant assembly seats; but independents and small parties may score**

We will do well in most areas of the hills. Our main challenger will be the NPF (Naga People's Front, which is the BJP's ally in Nagaland). In Manipur, we decided not to have an alliance with the NPF because some of their ideologies don't fit well for Manipur. We initially thought the framework agreement with the NSCN (a 2015 pact signed by the Naga underground outfit and the Centre) would affect our prospects in the valley but it did not happen on the ground. We could clarify some of the apprehensions about the pact.

Union Home Minister Rajnath Singh has made it clear that the territorial integrity of Manipur won't be affected. As far as the economic blockade is concerned, people in the valley have noticed the sincerity of the Central government. Petroleum products were airlifted. We gave protection in the highways. The situation has improved. The worst is over. The Congress government wanted to make some mileage out of it. Initially, they succeeded. But now, people have understood the truth. It's a match fixed by the Congress and the United Naga Council (the group that enforced the blockade since November 1, 2016). CM Ibobi Singh has been playing with the sentiments of the people because he has no good work to showcase. People are fed up with the Ibobi Singh government. They want change. They want good governance. They want development. And PM Narendra Modi symbolises both.

"Ibobi is Playing with Sentiments"
K Bhabananda Singh,
Manipur BJP President



I am not ruling out the fact that there's no anti-incumbency in Manipur, but people here – on the plains and in the hills – are mostly happy with our performance. The BJP is underestimating us, but Manipur is not Assam (the BJP came to power in Assam in May 2016, ending 15-year-long Congress rule). We don't play any communal card. We don't subscribe to any divisive policy. We are confident that we will get 10 out of 20 seats in the hills. In the hills, the BJP and the NPF will say they are fighting separately, but post election they will ally. The BJP and the NPF are two sides of the same coin.

"Manipur is not Assam"
TN Haokip,
Manipur Congress President



The more the BJP and the NPF attack us, the better it is for us. They represent communal and divisive powers. If they attack us, it's a blessing in disguise for the Congress.

The BJP is financially strong. But money can't win hearts. The party first tried to make more than 20 MLAs defect from the Congress and impose President's Rule in the state. But it failed. We welcome our friends in the jungles (militants) too, to come forward and participate in the elections. Also, protests and agitations are not the real solution. The ballot is.

Irom Sharmila too has realised it after fasting for over 16 years. Now, she has faith in the ballot.

"Congress or BJP is not my challenge. The deep-rooted, dirty political system is"

Irom Sharmila,
founder, Peoples' Resurgence and Justice Alliance



NSCN, which was founded in the 1980s to carve out an independent land of Nagas.

For the Meiteis, the territorial integrity of Manipur is such an emotive topic that they are willing to ignore other issues for an assurance that their land will be preserved. While both the Congress and the BJP promise an uncompromising position on the territorial integrity of Manipur – the state BJP splashes advertisements with Union Home Minister Rajnath Singh's commitment to it – voters in the valley seem to have trusted the Congress more in this regard. After all, the Central government is a party, along with the NSCN (I-M), in scripting the pact which is yet to be disclosed. On Saturday, Prime Minister Narendra Modi reiterated at a rally that the framework agreement with the Nagas did not contain a word against the interests of Manipur, a statement primarily directed at the valley audience with a hope that the party's prospects in the 40-seat belt get resurrected. Modi claimed that CM Ibobi was deliberately spreading lies about the pact even after he had personally telephoned the CM on its content soon after its signing a year and a half ago.

This writer visited Imphal, Lilong, Thoubal, Kakching, Moirang and Churachandpur to gauge the mood of the people. "Ibobi is playing with people's sentiments because he has no good work to showcase," says K Bhabananda Singh, state BJP president, acknowledging that the Congress had an upper hand in the valley till recently, but is losing ground every passing day. Even the economic blockade imposed by the United Naga Council (UNC) on National Highways 2 and 37 since November 1, 2016, which has choked the valley and pushed up prices of essential commodities, including petrol and diesel, has indirectly helped the Congress. So much so that the BJP is now accusing the Congress

of match-fixing with the Naga group.

Early this week, this writer noticed open black marketing of petrol in Churachandpur and Thoubal with the price being quoted at ₹110 per litre as against ₹70 at authorised petrol depots. "The petrol price in the black market went up to ₹200 per litre a month ago. Now, the situation has somewhat eased", says Daniel Moirangthem who owns a petrol-run machine boat at Loktak lake, 40 km from Imphal. He charges ₹600 for one boat trip that costs him two litres of petrol. "We can't charge more from tourists. If the petrol prices go up, my margin reduces," he adds.

Despite consolidating his position in the valley, Chief Minister Singh knew it would be too much of a risk to put all the eggs in one basket. As a hedge, he engineered another masterstroke by creating seven new districts, including Sadar out of Senapati

district and Jiribam out of Imphal East district, a decision stiffly opposed by the Nagas. Though the Congress cited administrative conveniences as the reason for creating seven new districts, it may have well done

CM Ibobi Singh created seven new districts. This move resulted in a rift between Nagas and Kukis. Congress now becomes a contender in nine hill seats where non-Naga tribes dominate

the trick of consolidating some gains in parts of the hills. The move created a rift between the Nagas and Kukis, two dominant hill tribes with a history of major ethnic clashes.

"We are confident that we will get 10 of 20 seats in the hills," says Congress state president TN Haokip

who belongs to the Kuki tribe. Haokip seems to be exaggerating; yet by creating a rift, the Congress becomes a contender in nine hill seats where non-Naga tribes, mostly from Kuki-Mizo-Zo clans, dominate. As the Congress is likely to draw a blank in 11 Naga-dominated assembly segments, it has to win two-thirds of the valley seats plus

four-five seats out of nine in non-Naga areas to reach a majority.

BJP's Gambit

This is where the BJP sees an opportunity to topple the 15-year Congress regime and wrest the third Northeast state, after Assam and Arunachal Pradesh. In the last 15 days of campaigning, it concentrated mostly in the valley seats where the party has a chance provided there's a little push. In 11 Naga-majority seats, it's likely to be a contest between the BJP and its Nagaland ally, the Naga People's Front (NPF). The NPF may join the BJP post polls if need be.

Assam Chief Minister Sarbananda Sonowal campaigned for two days in six constituencies – only in the valley. Modi's sole rally on Saturday was also in Imphal. And three of five rallies scheduled for BJP national president Amit Shah will be in the valley constituencies. The party's last-minute game plan is crystal clear: restrain the Congress in the valley.

In this high-voltage game of politicking and strategising, if someone loses out it's Irom Sharmila, the "iron lady of Manipur" who went on a hunger strike for 16 years before forming a new political party, the Peoples' Resurgence and Justice Alliance (PRJA), in the process challenging Chief Minister Singh on his home turf, Thoubal.

"Many people tell me: 'We are sorry. We love you very much. But we won't vote for you.' Many voters have taken so many favours from the establishment that they are indebted. This is a dangerous trend. It's cheap politics," she tells *ET Magazine* while campaigning in Iromg Chesaba village in Wabgai assembly constituency. If Sharmila isn't too relevant in this election, her party symbol may well be in the next five years: it's a whistle. ■



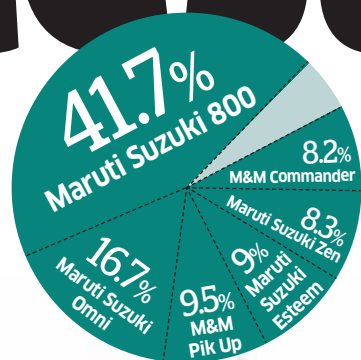
"Role of the Rain God"
Vivek Kumar Dewangan,
chief electoral officer of Manipur, explains why the state may not be able to declare all results on March 11

We are fully geared for a smooth conduct of election. Yes, there are some logistical issues. For example, road conditions worsen if there's rain. We will use chopper for ferrying polling parties with EVMs in 72 polling stations (out of 2,791) in some districts. If there's bad weather, choppers won't be able to take off, but we have made some contingency plan for such a situation. In phase 2, elections will be held on March 8 (in 22 of 60 constituencies, mostly in the hills that have a troubled past). If there's any repoll, we will have to conduct it on March 10. And the counting date is March 11. The rule is that if there's a repoll, the counting in those constituencies can't take place until and unless the repoll is over and the polling parties return. Our arrangement is that the polling parties will take the chopper at 6 am on March 11. But it all depends on the rain god.

Survival of the Fastest

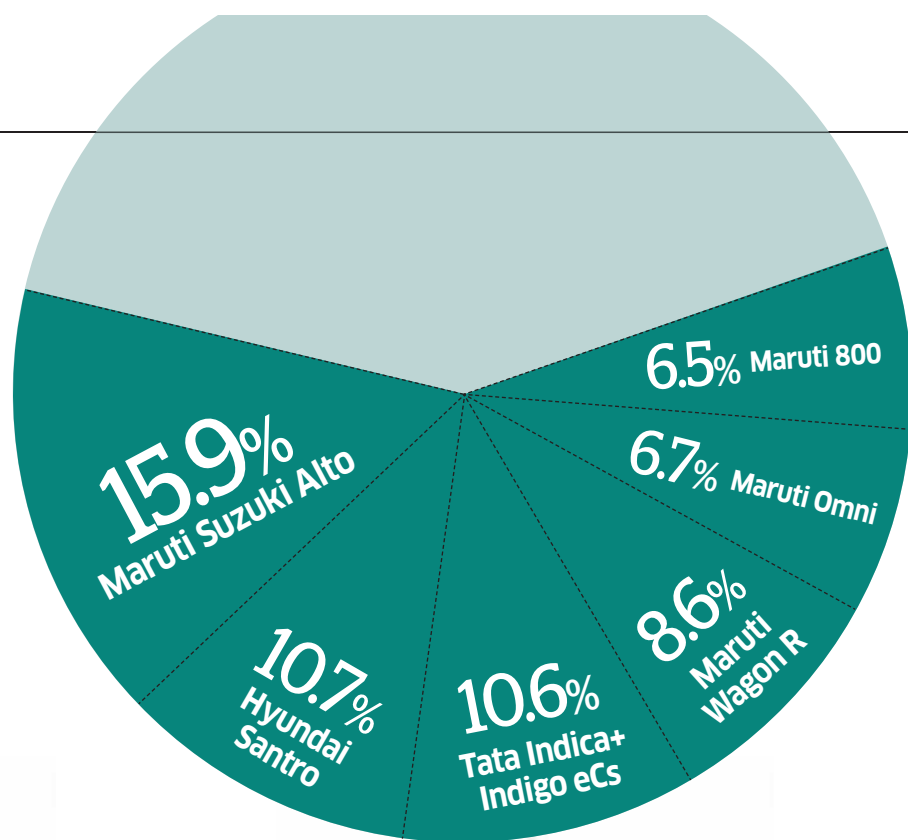
How Maruti Suzuki has led the evolution of the Indian car industry over the past three decades

TOP SIX CARS: THEN AND NOW



1996

PASSENGER VEHICLES SALES
4.68 Lakh



2006

PASSENGER VEHICLES SALES
13 Lakh

Malini Goyal

The leader and the No. 2 remain the same, but that is perhaps the only constant in the Indian automobile sector in the past two decades. Other than volumes of cars sold having surged, the number of models and variants along with the sheer number of carmakers in the fray have burgeoned, making it a market unrecognizable from the one two decades ago.

Between 1996 and 2016, India's GDP has more than quadrupled to over \$2 trillion. Per capita income has more than trebled to \$1,751. India's ₹4.5 lakh-crore passenger vehicle industry has kept pace. In 1996, with not even five car manufacturers, India sold 4.68 lakh passenger vehicles. By 2016, there were at least 17 carmakers, over 100 models and variants even as the annual industry sales nudged 3 million units.

In 1996, with little competition and a much smaller stable, Maruti reigned supreme with 60% market share. In 2016, in much more competitive environs, Maruti still stands tall with a 47.6% share.

The top six club – top selling car models by annual unit sales – mirrors this journey well.

Between 1996 and 2016, Toyota Qualis and Fiat Palio made fleeting entries into the club. Homegrown Tata Motors and Mahindra & Mahindra (M&M) have exited after over a decade in the top half of the stack. The constant themes over two decades? Maruti Suzuki as top dog, and Hyundai, which debuted in India in 1998, cementing its position as the No. 2 player. "It is clear

In 1996, Maruti 800 with 1.94 lakh cars had 41.66% volume share. In 2016, Alto led the pack with 2.45 lakh sales and just 8% share



FIVE BIG SHIFTS

CHOICES APLENTY:

In 1996, top six models accounted for 93.4% of total industry unit sales. In 2016, top six models contributed under 34%

SHRINKING MINIS:

With car penetration in India at 31/1,000 cars, entry-level mini cars still remain the biggest selling model. But its share has shrunk from 41.7% to 8.2% and will shrink further

SHIFTING CENTER OF GRAVITY:

More income and higher aspirations mean buyers are buying pricier cars like Swift, Dzire and Hyundai i20 making the compact car over ₹4 lakh the most popular segment

UNDISPUTED LEADER:

Maruti Suzuki, with a parent deeply focused on India, has maintained and in fact tightened its grip on the roads with four out of top six models from its stable

TWO-HORSE GAME:

Maruti and Hyundai have lorded over the market. It also means other MNCs are yet to get a grip on Indian roads and along with homegrown Tata Motors and M&M

that today nobody understands and caters to Indian car buyers better than Maruti," says Deepesh Rathore, co-founder, EMMAAA Consultancy. An analysis done by EMMAAA Consultancy exclusively for ET Magazine shows that in 1996, of the six top-selling models, the No. 1 player had five entries, with Maruti 800 leading from the front. In 2016, Maruti retained the top four slots with Hyundai taking the other two.

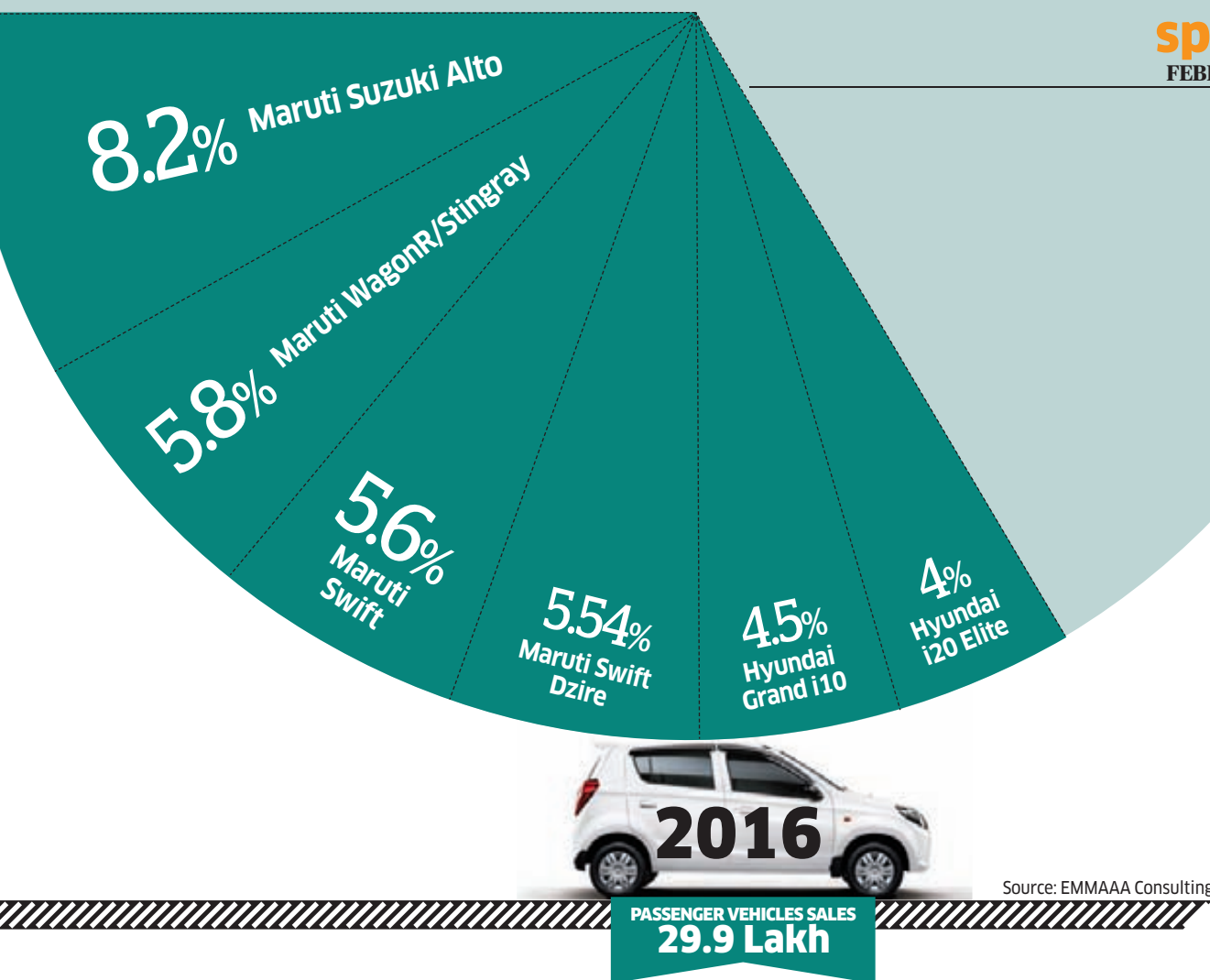
Top Six

Many trends that the data reveals are predictable. The loosening grip of the mini segment (in which Maruti once had the 800 and now Alto, Hyundai has Eon and Renault the Kwid). In 1996, Maruti 800 had a 41.66% share of total industry unit sales. Today, Maruti Alto still leads the pack with 2.45 lakh sales but its share in total volumes has slipped to around 8%.

In 1996 the top six models contributed 93.4% of total sales signaling a concentrated market with few choices for customers. By 2016, the share of the top six slipped to under 34%, indicating a more fragmented pie and more choices for buyers. Homegrown firms like M&M and Tata Motors have slipped. But even more telling is the fact that most global giants have struggled to get a grip on Indian roads.

In 1996, monthly sales of over 3,200 units could get a car model into the top six – like Mahindra Commander, which sold 38,451 units in 1996. Even the pricier Toyota Qualis, which sold 46,565 units in 2001 on the back of robust demand from the IT outsourcing industry to ferry their staff found a spot in the top six. But the bar for entry into this club has now substantially risen. Today, a Hyundai i20 Elite has to do over 10,200 units a month to get the





sixth slot.

With rising incomes, Indians have been upgrading to pricier models. In 1996, while the sub ₹3-lakh segment – represented by Maruti 800 – occupied over 40% of the market, today over 90% of the market belongs to the ₹4-lakh plus segment.

Hyundai's product strategy is a good reflection of this shift. Rakesh Srivastava, senior vice-president (sales & marketing), Hyundai Motors India Ltd, says the Santro in the ₹2.5-4 lakh price band was the focus between 1998 and 2005. Between 2005 and 2012, its thrust shifted to i10 in the over ₹4 lakh segment. But now he sees the center of gravity in the ₹6-9 lakh segment where i20 and Creta belong. Between the two, the company does 20,000 a month in that segment, ahead of i10's 14,000 units. "By 2021, I see the center of gravity shifting to the over ₹10 lakh category," guesstimates Srivastava.

By then, India's passenger vehicle industry and the top six will look very different. Here are some important sub-trends that will play out.

Undercurrents at Play

Government has announced a slew of policy changes by 2020 that will overhaul the regulatory framework around safety and emissions for the industry. For example, airbags will become a standard feature. While compliance will push up car prices across the board, the rise (in percentage terms) will be slightly higher for the price-sensitive minis that need to be upgraded to meet safety norms.

Fuel mix too will see some changes with diesel variants slipping on its appeal. V Ramakrishnan, cofounder of auto consultancy Avanteum, says compliance with new emission norms will widen the price-gap between diesel and petrol variants. It will likely push up prices of diesel vehicles by 15-20%, almost double those of petrol vehicles whose prices are estimated to rise by 7-8%. In contrast, electric vehicles are expected to gain popularity.

In 1996, monthly sales of over **3,200** units could get a model into the top-six club. The threshold has risen to **10,200** units a month

Tata Motors, which has had a consistent presence in the top six club since 1997, has been missing since 2013

Share of automatic variants is likely to double from 5-6% today to 10-12% by 2021. And women as a customer segment is likely to grow from 12% to over 20% in the next 5-7 years. This will push car companies to focus on women in both product design and marketing. For example, car dealerships might look to hire more women staff.

The used car industry too will be on a tear, expected to double to 6.6 million units by 2021.

Future Gaze

By 2020, the car market in India is likely to hover around the 4.5-5 million mark. Here's why. For the passenger vehicle industry globally, income of \$3,000 per capita is a golden milestone. The industry in most countries, the latest being China, has seen a J-curve in demand the moment per capita hits that threshold. India's per capita, which hovers around \$1,751 today, is likely to touch \$3,500 by 2020. So expect demand for cars to grow exponentially in India after 2020.

Today, car ownership in India is very concentrated. According to the Household Survey on India's Citizen, Environment & Consumer Economy (the ICE360 degree survey), households in the top quintile (1/5th) accounted for 69% of the cars sold in India. Rising per capita income will mean that car ownership will trickle down and will likely get more democratised.

How will the top-six club change in the next five years? While Maruti and Hyundai will likely continue to dominate the roads, competitive intensity is set to increase. New players like Peugeot, Kia Motors, Daihatsu (through Toyota) and a couple of Chinese companies are likely to make an entry.

Surge in IT and call center businesses in early 2000s meant rise in cab sales to ferry staff. This helped **Toyota Qualis** enter the top-six club



With growing competition, industry sales will get further fragmented. Experts feel that India today is one of the most concentrated markets in the world with Maruti Suzuki lording over almost half the industry. It is not just about the player but also per model sales. "8% for the top-selling model is still high. We will see this decline and eventually settle in the 4-5% region eventually," says Kumar Kandaswamy, senior director, Deloitte India.

In the US, which did 17.5 million passenger vehicle sales in 2016, the top model club is evenly split between Ford, General Motors, Toyota and Honda. The top selling model there is the Ford F Series of light-duty and medium-duty trucks, which had a 4.58% share of the total volume. In China, which sold 28 million units in 2016, the top selling model is the Wuling Hong Guang, a compact multi-purpose vehicle from the SAIC-GM-Wuling joint venture. It sold 6.5 lakh units, accounting for just 2.3% of the total volume share. So expect the percentage share of the top selling model in India to decline.

While relative importance of minis too will likely decline, experts feel the segment will continue to have a special place in the car industry. "The demand will largely be driven by rural buyers buying their first cars and upgrading from two-wheelers," says Rakesh Batra, national leader (automotive), Ernst & Young. And expect Maruti to continue to dominate for multiple reasons.

One, rural consumers prefer tried and tested brands with word-of-mouth as the biggest influencer. Also, "it has been a tough segment for competitors from the price, reach and product point of view," says Batra. Today, while the segment has two other models – Hyundai Eon and Renault Kwid – it is Maruti that will lead the charge.

Experts expect small SUVs to break into the top six models by 2021. The SUV segment has been seeing robust growth: in January 2014, the industry sold 46,000 (28%) SUVs out of the total 1.64 lakh vehicles. In January 2017, the number rose to 62,000 (33.3%) of the total 1.86 lakh. "Appetite for SUVs is huge across countries from the US to China. India too will join in," says Kandaswamy. ■

Crystal Ball Gazing

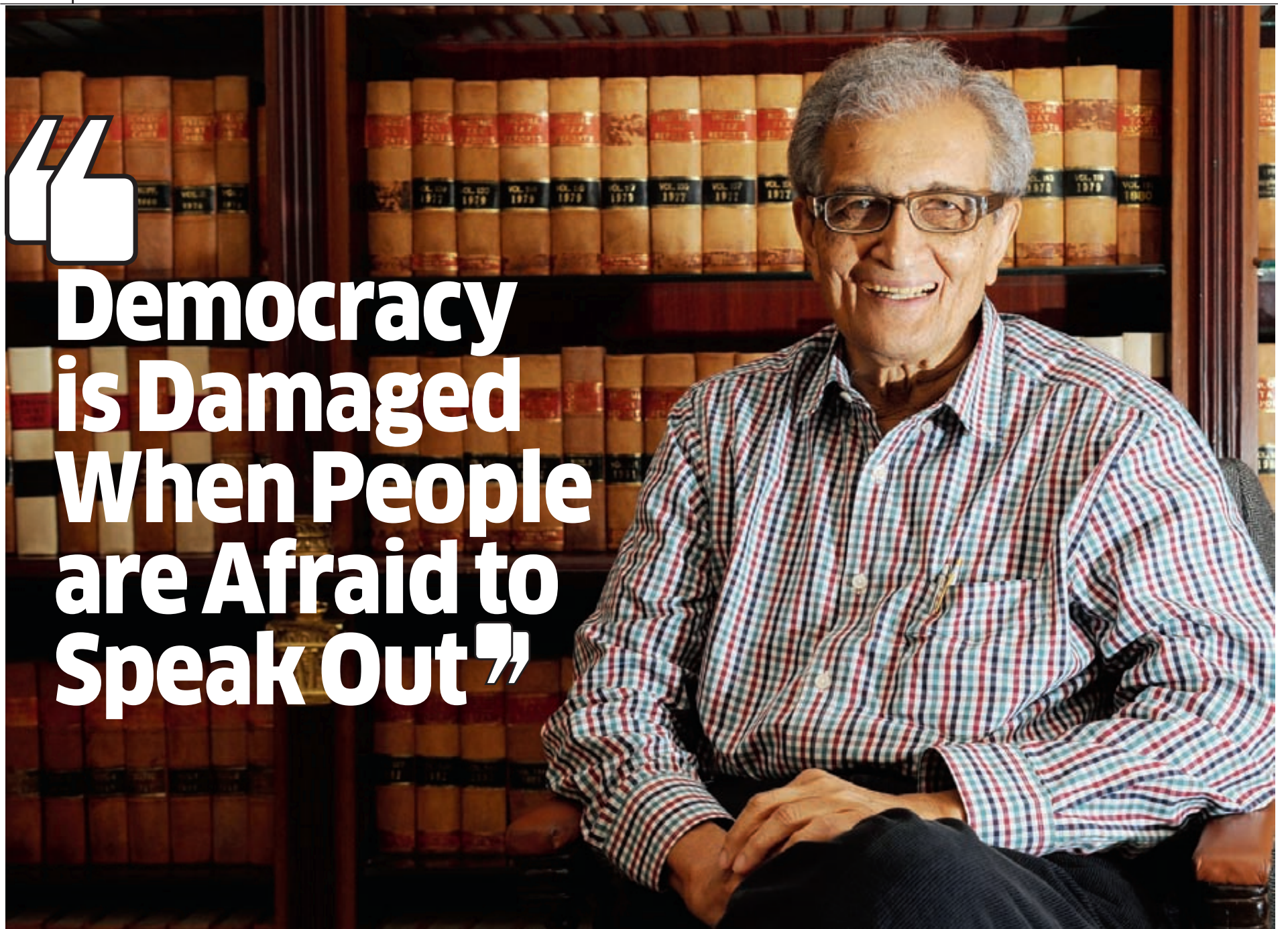
J-Curve growth: With India's per capita income likely to cross \$3,000 by 2020, the demand for cars will see a J-curve growth nudging 5 million mark

Tougher competition: New carmakers like Peugeot, Kia, Daihatsu and a clutch of Chinese firms like SAIC are looking to debut in India soon

Smaller Shares: The volume share of top-six club will decline further as competition and multiplying model options will fragment customer base

Pricier cars: Share of minis will shrink even as the center of gravity shifts to higher price band – some expect it to be in the ₹10-lakh plus segment

Reign of SUVs: Small SUVs to find a slot in the top-six club. Women buyers to grow sharply. Diesel cars to lose shine while electric to gain. Automatic variants too will grow



ASHWANI NAGPAL

Democracy is Damaged When People are Afraid to Speak Out

Economist and Harvard University professor **Amartya Sen** sat down for a conversation a few hours after the passing away of Kenneth Arrow, whose pioneering work was a great influence on him. As an expanded edition of Sen's 1970 book *Collective Choice and Social Welfare* comes out, he recalled how the first edition was very much in the Arrowian line. Arrow, he said, had gone through the manuscript and suggested improvements. In an interview with **Charmy Harikrishnan**, Sen, 83, spoke about a new climate of fear in India, how the government got someone "connected with the Hindutva school" as the chancellor of the Nalanda University, why universities are under threat and why the stifling of free speech needs to be collectively resisted. Edited excerpts:

The world has changed a lot since your book *Collective Choice and Social Welfare* came out in 1970. How do you look at the age of Donald Trump?

In terms of what my book is concerned with, particularly the issue of arriving at social assessments and social policies on the basis of the views, concerns and judgments of the people, perhaps the most worrying aspect of the changes going on right now is the decline in the quality and reach of public reasoning. Public reasoning can be both about factual matters, about getting the information right, and about judgmental matters, clearing one's mind by comparing the assessments of different people and putting these assessments through critical scrutiny. Factual information has suffered a lot through the championing of what has come to be called 'alternative

facts'. Clarity of discussion has also often gone down. Some of the things on which Trump fought the elections, including the alleged dire state of the US economy and worsening unemployment, were not true. There were systematic distortions that many people came to believe. Something similar also happened in Britain at the time of the referendum on Brexit. In India, too, a lot of non-truths have been cultivated. That worries me. But I am also worried that people are feeling less free and less confident to express their points of view. That decline has been quite prominent in India.

How do you make sense of demonetisation?

It is very difficult to make sense of demonetisation as it doesn't have much sense anyway. You take away 86% of the currency and expect that to yield dividend – it is a very peculiar thought. Initially, the reason given was managing corruption, which seemed a particularly weak argument since only about 6-7% of black money is held in cash. On top of that, those who deal regularly with the shadowy part of the economy were best placed to convert defunct money to new money. People who were more affected were those who did not have black money, for instance traders selling vegetables or fish or cereals. When it became clear that demonetisation was not working effectively against corruption, the justifying reason was recharacterised to say that this was done to jump rapidly to a cashless economy.

Cashless economy is not necessarily a grand thing anyway. But even if it were unequivocally good, you



"Cashless economy is not necessarily a grand thing anyway. But even if it were unequivocally good, you can't get there with the suddenness with which the change was being attempted"



can't get there with the suddenness with which the change was being attempted. A large proportion of towns and villages don't even have any banks. Also, electronic transactions require a certain level of skill, which is particularly difficult in a country with a quarter of the population still illiterate. In terms of reasoning – to stop corruption or to create a cashless economy – it is not easy to justify the steps that were taken. People often talk about the cost of demonetisation in terms of the percentage of GDP lost. That is one of the concerns. But actually the suffering is much more than that because that decline in GDP comes very often through the decline in the income of the poorer people – the small trader, the housewife with a little savings: they are the ones who are hit most. So the GDP decline underestimates the hardships that were created for the poor.

Is the liberal voice getting stifled?

The category 'liberal' is so undefined that I try not to use that expression. But no voice – liberal or conservative – should be shut down by fiat. Stifling expressions of private concern and public interest is very problematic for any kind of political participation, and it is particularly bad for the practice of democracy. There is a new climate of fear in India – about speaking freely on some subjects. Universities are imposing prohibitory rules on teachers

"We are still argumentative, but it is harder to argue if you have to check if you are being called an 'anti-national', or if people with sticks are trying to break up your lecture, or if you are being charged with sedition. People have reasons to worry. But my advice is to take it on. Together we are more powerful than our tormentors think"

and students so that they can't express themselves on some subjects. If they make their points, or even if they invite someone to present a point of view, they may be in danger of losing their job.

I was coming to the Jai Narain Vyas University of Jodhpur suspending an assistant professor for inviting Nivedita Menon of JNU to a seminar. On the one hand this is happening, and on the other the government says it wants to create world-class universities?

There is a confusion there. World-class universities have emerged in Europe and America through the use of academic autonomy and freedom. Even though governments have typically funded the educational expenses, they have not tried to dictate how the universities and colleges should be run. Autonomy has been central to the emergence of great educational institutions. To announce that the government is about to set up a certain number of 'world-class universities' reflects an inability to understand how such institutions emerge.

Academic autonomy was violated by India's earlier governments as well. But certainly the interference in the operation of universities has dramatically increased. I can say from my own experience in Nalanda. The government tends to take the view, 'we pay the money therefore we can call the tune'. My successor in Nalanda, former Singapore foreign minister George Yeo, who was an outstanding chancellor, was working hard to make it a wonder-

fully successful university. But when he wanted to do something which the government didn't want, there was an immediate clash, and of course the government made sure that it won. Since the Nalanda board was in favour of Yeo's proposal, one morning the entire board was dismissed. Then the chancellor – the great George Yeo – had to go.

Some people are concerned that with the dismissal of the Nalanda board, I was removed from it. But this is not the issue at all. I had already announced to the board that I would not continue on it, because I had done what I could, and there are many other things that I still want to finish. However, there were great members of the board who were willing to continue and who had great expertise on Nalanda's history and tradition apart from being outstanding academics, like Wang Gungwu, Sugata Bose, Meghnad Desai, Tansen Sen and others.

What was the last straw for you in Nalanda?

You mean when I decided to stand down from being chancellor? It was a natural decision when it became clear that if I stayed on as chancellor, Nalanda would have difficulty in getting support from the government – there would be constant hostility. But one reason for my stepping down without losing sleep was that it was agreed that George Yeo would become chancellor if I left. I had proposed his name and the government had agreed at that time. But they wanted to have somebody else more to their liking – more connected with the Hindutva school. Well, they have got one now.

Welfare economics has got a bad rap in India.

Indeed, it never had a good rap from policy makers in India. People taking governmental decisions never took much interest in welfare economics, but things are more extreme now with the government putting far less emphasis on the importance of removing inequality, particularly in education and healthcare.

How do you react to criticism that you are anti-growth?

The same way I would react if someone told me that my name is not Amartya Sen. But it is only two or three people who like saying that I am anti-growth. As people who know my work know well, I have written a lot on economic growth and its importance. In fact, my second book was called *Growth Economics*. However, while economic growth is very helpful, it is not adequate on its own. It is not a success in itself. Ultimately, for growth to be successful, we have to see how growth is used to improve human life. One can be strongly pro-growth and also pro-public services such as public education and public healthcare. China has combined the two pursuits brilliantly – so have many East Asian countries, from Japan to Singapore – and they do complement each other.

In 2008, at the inaugural Hiren Mukherjee memorial lecture in Parliament, you spoke about what should keep us awake at night. Almost 10 years on, what do you think

should keep us awake at night?

At that time I was particularly concerned that the poor in India did not get decent primary healthcare and decent primary education. They had no social safety net either. To that I will now add the fact that public discussion of unorthodox views has been recently hugely discouraged by the cultivation of a climate of fear, including the fear of being beaten up if some political activists think that you are 'anti-national'. This is a severe diminution of the very thing in which India had its limited success, namely democracy. Democracy requires open public discussion, and it is damaged when people are afraid to speak out. Fear to speak is debilitating for many different reasons, but it is particularly harmful for the practice of democracy.

"It is only two or three people who like saying that I am anti-growth. Ultimately, for growth to be successful, we have to see how growth is used to improve human life. **One can be strongly pro-growth and also pro-public services**"

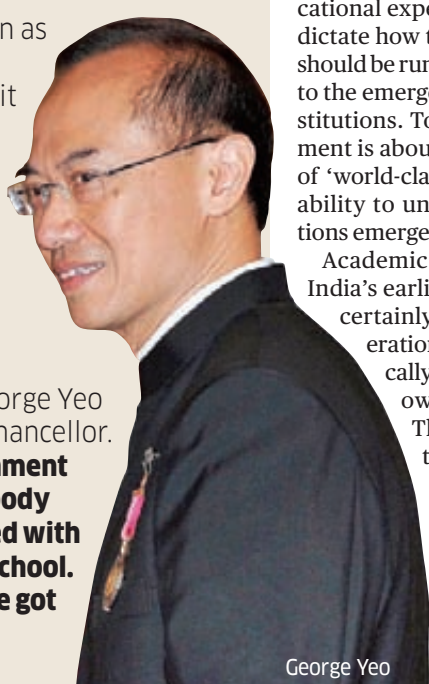


"Autonomy is central to the emergence of great educational institutions. To announce that the government is about to set up a certain number of 'world-class universities' reflects **an inability to understand how such institutions emerge**"

Is the Indian still argumentative?

Of course, we are still argumentative, but I wish we could argue with each other without any fear. It is becoming harder to argue freely if you have to look out to check if you are being called an 'anti-national', or if people with sticks are trying to break up your lecture, or if you are being charged with sedition, or if a fake video is being constructed aiming to show that you said things that you didn't say. Even the most argumentative people may have reasons to worry about such intrusion. But my advice is to take it on. Together we are more powerful than our tormentors think. ■

"I stepped down as chancellor of Nalanda when it became clear that if I stayed on, Nalanda would have difficulty in getting government support. It was agreed that George Yeo would be the chancellor. **But the government wanted somebody more connected with the Hindutva school. Well, they have got one now**"



George Yeo

Prince of Mince

How the galauti kebab assumed mythic proportions in the city of nawabs, Lucknow

:: Anoothi Vishal

As any community or nation progresses, its diet is the most salient guide to its refinement," writes Abdul Halim Sharar in his classic *Guzishta Lucknow*, an early 20-century Urdu narrative about the culture, lifestyle and cuisine of Awadh under the Nawabs.

But Lucknow's legendary "nawabi" sensibilities – often exaggerated and caricatured – have been in steady decline, with newer impulses taking over. Sharar's world does not exist today. However, when I was growing up in Lucknow, from the mid-1980s to the mid-90s, many of the old world courtesies and charm were still in evidence. The city was already in the throes of big change in that crucial decade. The politics of the Mandal commission and the Babri Masjid demolition had begun altering its social fabric. Beneath the unrest of a new emerging order lay layers of an older Lucknow – of several older Lucknows summoned up in the foods that we continued to eat and remained partial to.

An Assorted Palate

Surprisingly, the memories of eating out in Lucknow have nothing to do with kebabs, the food the "city of nawabs and kebabs" is perhaps best associated with today. They are about decadent cream rolls from JJ Bakers in Hazrat Ganj, bought surreptitiously after sneaking out of the back gate of La Martiniere, during school hours. They are about the occasional treats of kali mirch chicken, peppered and roasted, from a shop outside the magnificent Charbagh railway station; the chicken certainly not a nawabi delight but



a much later, post-Partition gourmet entrant to Lucknow. They are about special occasion dinners at Royal Café or Falaknuma, the rooftop restaurant at the Clarks Avadh; and excursions for chaat, nimish, thandai and falooda, whose charms were dimmed somewhat by the just emerging pleasures of chowmein at Mini Mahal.

They are also about the asli (pure) ghee nugdi ke laddoo from Ram Asrey, the sweet shop whose history went back to



RAVI DHINGRA

Usman set up a branch of Tunday Kababi in Aminabad in 1996



Shami kebab, the ancestor of the galauti, is more painstaking to cook



Galauti kebab and Tunday Kababi are now part of a much larger cultural consciousness around indigenous food traditions in India

1805, Lucknow's oldest. The tiny, dot-like orange boondi pearls of the laddoos held us enthralled. Why were these small grains made from chickpea flour called nugdi? Much later, I conjectured that the name was a reference to the Urdu "nuqta", the small dot used in the script. This was one of the finest expressions, literally, of India's Ganga-Jamuni culture that we gorged on! Different Lucknows, belonging to many different time periods and different communities, were expressed in each of these dishes.

Kebabs were always home cooked – and it was always shami kebab, the best of which are still only to be found in homes, not in restaurants. Galawat ke kebab, whose distinguishing feature is that the minced meat is tenderised with papaya (or raw mango), was not so well known. This, even though a small shop near Akbari Gate in Chowk, almost unreachable save on a rickety rickshaw, had been serving them up since 1905.

Galauti kebab and Tunday Kababi are now part of a much larger cultural consciousness around indigenous food traditions in India. You couldn't have not heard of them if you consider yourself a connoisseur or even an aspiring foodie – and who isn't one, these days? In 1996, the year I left Lucknow, Mohammed Usman – the grandson of the legendary one-armed cook Haji Murad Ali who had first



This small shop in Chowk, Lucknow, has been serving galauti kebab since 1905



The writer looks at restaurant trends, food history and culinary cultures

opened the tiny kebab shop in Chowk catering mainly to the working classes – set up a branch of Tunday Kababi in Aminabad, a market more accessible and more pop than the older part of the city.

That became the turning point for the re-discovery of the galawat ke kebab, or galauti as it is colloquially known. Instead of using exclusively “bade ka meat” or buffalo, like in the old days, the Aminabad branch also started using the more accepted goat meat, thus extending its audience. The establishment, however, kept to Haji Murad Ali’s cost consciousness. “My grandfather was known for his honesty. If we gave the customer even a slightly smaller kebab, he would shout at us, saying, ‘Logon ka gala kato ge kya (Don’t be a cut-throat, will ya)?’ So, even today, we try to maintain the same price-quantity ratio,” says Usman, when I meet him in Delhi at a rare food promotion that he has been roped in for at the JW Marriott in Aerocity. Even today, Tunday Kababi, says Usman, serves two paranthas (ultra tawe ke, the big ones made on an upside down karahi) and four kebabs, each weighing 22-23 g, for ₹64 at the Chowk outlet. The prices are slightly higher at the Aminabad and Kapurthala outlets in Lucknow, the only three legitimate Tunday Kababi restaurants.

A couple of years ago, Tunday Kababi decided to go national, giving out franchising rights to all and sundry. The quality dipped, prices soared and the brand suffered. Usman acknowledges it and says he has withdrawn from all those operations. He still gets about 10-12 queries every day for franchisee or partnership offers but declines them. “My daughter is doing her MBA and my son is studying too, we will see what they want to do later. You need to be careful in the food business,” he says.

The 120-masala Secret

Most of India’s food legends are focused on one-dish shops and stalls like Tunday Kababi. Many of these are, however, disappearing in



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Mohammed Usman, owner of Tunday Kababi and grandson of the legendary one-armed cook Haji Murad Ali



the march to modernity. Restaurant retail in the country has undergone a dramatic transformation. Chains are the order of the day. However, like Tunday Kababi, many of the old establishments find it hard to grow, despite the availability of capital and partnerships. At least part of the reason for this failure is exactly the reason for the success of these brands in the first place.

If personalised attention to detail propelled many of these brands to become the best in whatever they sold, that also becomes a limiting factor in building a chain. Till today Usman or his father, now 80 years old, supervise the procurement of the meat, the use of the right papaya in the mince and the mixing of the masalas. “My grandfather started me off as a child, dragging the



Tunday Kababi travelled from Lucknow to Delhi for a food promo

cart that brought in the meat from the butcher’s. He felt that I couldn’t learn unless I learnt the basics,” reminisces Usman, as he rejects a papaya for the mince being readied for kebabs. It’s an ethic that has stayed on. Then, there is the tale about the spices.

For several years now, since the late ’90s and the early 2000s when Tunday Kababi became more visible and India’s restaurant scene was coming into its own (the first lifestyle standalones were established in the country only in 2000), Usman and his family have had chefs of all hues knocking at their doors to learn the secrets of spicing.

If the story of the one-armed cook making kebab and slicing onion rings was so compelling that it established the “Tunday” (literally “one-armed”) brand, another delicious story, of an astounding 120-plus spices going into the galauti mix, nurtured it. According to Usman, that is the original recipe of his grandfather. Some of these ingredients are elusive unani prescriptions. The family keeps the names and proportions secret. The spice mix used at all the outlets is prepared by Usman, his wife or his father. Even at the festival in Delhi, five-star chefs eager to decipher

the mystery are denied a peek.

Finding what the galauti spices are has become a culinary holy grail for most Indian chefs. Many have made at least one trek from their fancy restaurant kitchens to Lucknow. Invariably, they have failed. The secret is not shared.

Taste the Tunday galautis and you will not be overwhelmed with spice. It tastes of mildly spiced mince (only lean meat is used, so there’s no flavour from fat) and there is no aftertaste either. Would it matter if there were just 12, not 120 ingredients, in this? To my palate, not. The romance, almost certainly, is in the story.

Sharar’s Lucknow was one of hyperbole, of truths couched in courtesies, of refined dissembling – where what seemed like a murraba (fruit preserve) could actually be a qorma (meat curry). Such were the games the courtly Lucknowites played with each other and their colonial guests, before the Revolt of 1857. It is this culture that the galauti with stories of 120 spices epitomises.

Without the seductive tales, you may perhaps see the galauti for what it is: an innovation. If you cook, you will realise that the shami kebab, the ancestor or at least cousin of the galauti, is more painstaking: keema (with some fat), dal and spices have to be boiled together, judiciously, so that the meat does not overcook and dry out; then it is ground on a *sil-batta* to maintain texture, the patties then have to be (in some homes) stuffed with mint and onions for extra flavour, and finally the kebab is pan-fried.

The galauti kebab relies on its smoothness alone for wowness. It is a simpler kebab because mince is used raw. It can be turned out quickly, so it is fitting that this should be a bazaar, not home, delicacy.

Did it come about because the *rakabdars*, cooks, who had a budget of up to ₹60,000 a month in those days to experiment with in-

redients (as Sharar says), realised that the exotic ingredient from the New World, papaya, which appeared in India only in the late 16th century, could be used as a tenderiser for delicacies that the ageing and toothless nawabs relished? Or, was it because the Awadhi high culture deemed chewing in public to be inelegant? Or, could it be, as some have suggested, the influence of the pate?

The galauti kebab relies on its smoothness alone for wowness. It is a simpler kebab because mince is used raw. It can be turned out quickly, so it is fitting that this should be a bazaar delicacy

The French influence in Lucknow is not often remembered. A look at Constantia or La Martiniere, the school it houses, can remind you of that. Claude Martin, the French soldier who shifted allegiance to the British and then the nawabs, built not just this elegant structure but also designed many Lucknow buildings commissioned by his patron nawab Asaf-ud-Daula. Even before him, French merchants were plying their trade in Lucknow. To think their silken pates influenced the galauti is not unfounded.

We may never know the truth. However, when in a modern restaurant you come across a smashed, pasted galauti – in all its spiced glory – served by a “contemporary Indian” chef as desi pate, you know the wheel has turned a full circle. In the word of food, that is often the case. ■

Frenchman Claude Martin, who designed many Lucknow buildings including the La Martiniere, amassed his fortune under Nawab Asaf-ud-Daula. To think the French’s silken pates influenced the galauti is not unfounded



La Martiniere



Claude Martin



Nawab Asaf-ud-Daula



Bend it in Barca

From football to beaches to good food, the Catalan capital is the epitome of Mediterranean culture

:: Neeta Lal

Barcelona is like an onion; each layer a different universe. To football fanatics, Spain's second largest city is home to the hallowed Camp Nou, one of the most celebrated soccer stadiums. To sun worshippers, the city's beaches offer the holy trinity of sun, sand and surf. For gourmets, the Catalan capital is all about luminous seafood, beautiful Iberico ham and aromatic wines.

Fringed by the Mediterranean Sea to its east, the Serra de Collserola mountains to the west and the Pyrenees to its north, Barcelona epitomises Mediterranean salubrity like no other European metropolis. And once you look past its tourists, Vespas and honking taxis, you will discover a city full of vitality and culture.

Barcelona's fascinating 2,000-year-old history is enshrined in its period buildings and Gothic churches. Most of the big daddies of the art world – Salvador Dali, Joan Miro, Pablo Picasso, Antoni Gaudi – have sprinkled fairy dust on the city's landscape through their creations.

Barcelona's 2,000-year-old history is enshrined in its period buildings and Gothic churches

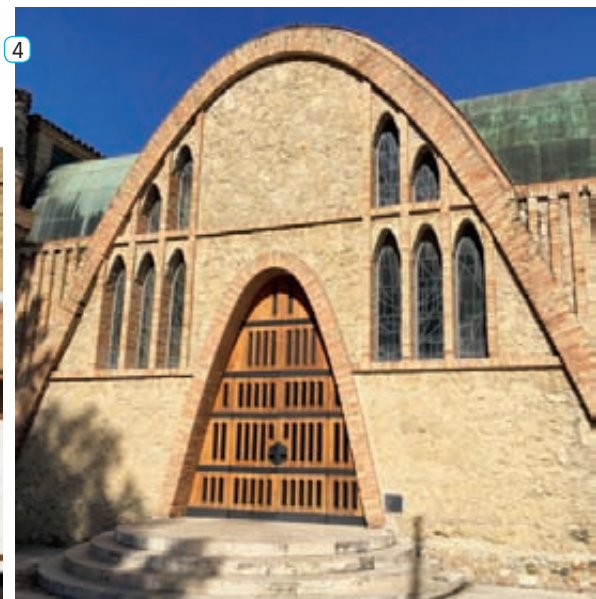
We pay our homage to Gaudi's La Sagrada Familia, which fuses Gothic and art nouveau styles. If there is a place for our egos to melt in the face of overwhelming concrete, it is here. We perambulated – in hushed reverence – the basilica's interiors, soaking in its Venetian mosaic-clad towers, stony representations of Nativity and the Passion, columns crafted like soaring trees and rich stained-glass windows of geometric patterns.

Over 130 years in the making and still unfinished, the church became the architect's obsession until he died in 1926. "Sagrada Familia's construction commenced in 1882 and by 1926, less than a quarter of it was complete," guide Stefano explained. "The construction progressed painfully as it was interrupted by the Spanish Civil War. Funds have been the project's greatest challenge and now its anticipated completion date is 2026, the centenary of Gaudi's death."

Contrasting sharply with the basilica's beatific environs is the electrifying street theatre on La Rambla – Barcelona's main street. Souvenir hawkers, buskers, pavement artists, mimes and living statues – all are part of the street's ever moving landscape. Art galleries, hair salons, cafes and hip bars add to the atmospherics.

Good Food & Fine Wine

Despite being a quintessentially Spanish city, Barcelona is unique, with fierce Catalan pride and individualism manifesting in everything from clothing to customs to cuisine. Once synonymous with the froths and foams of chef Ferran Adria, Barcelona is expressing itself through a new culinary vocabulary, offering food that's global in appeal, yet classically Catalan in character.



1. A street performer; 2, 3, 4 & 5. Codorniu Cava cellar, where cava-making goes back to the 16th century;

6. Barcelona's food is global in appeal yet Catalan in character; 7. Camp Nou; 8. La Rambla's streets are fun



The city has its own take on tapas – wickedly delicious pintxos that are slices of bread topped with whatever catches the chef's fancy. "The word pintxos comes from the verb 'pinchar', which means to poke or stab," a chef on Carrer Blai (Blai Street) – an enclave devoted to pintxos – tells us as we sample his fare. "This is because most pintxos are pierced with a toothpick when served in restaurants." Cods, anchovies, octopus, squids, lobsters with caviar, cured rabbit ragus and artichoke intertwined with pink Iberico ham tantalise our taste buds. Apparently, there are no rules when it comes to pintxos. And no two restaurants will ever offer the same mix or variety. On Carrer Blai, the rules are simple. Once we zero in on the bar, we are handed a plate that we fill up with the smorgasbord on display at the counter. Once the meal is over, the waiter ambles up to our table, counts the number of used toothpicks and bills us.

In our quest for more good food and wine, we cross Barcelona's borders to Codorniu Cava Cellar where the cava-making (bottle-fermented wine) business goes back to the mid-16th century. The building itself is a gorgeous slice of real estate designed by the celebrated architect Puig i Cadafalch, a student of Gaudi. The Cellar Gran, a vast space once used for fermentation, is now a popular social and business venue. We take an enchanting train ride through its capacious subterranean and functioning cellars, absorbing the sights, smells and sounds of the place. We stroll through Codorniu's landscaped gardens sipping cava, munching on pintxos and reflecting on life's finer things. ■



The writer is a Delhi-based journalist

Good Old Belief

The magnificent Hindu temples at Prambanan and the world's largest Buddhist shrine in Borobudur reveal a fascinating slice of Indonesia's past



Sunrise is the best time to see the Buddhist temple Borobudur

:: Charukesi Ramadurai

The sun began to set and the yellow electric lights of the theatre came on at the Prambanan temple complex near Yogyakarta (locally known as "Jogja") in Indonesia. I was there to watch the famous Ramayana ballet that takes place every night. In summer, the performance is in the open-air theatre, against the backdrop of the towering temples. But since it was cold, we had settled into the cosy indoors.



Charukesi is a Bengaluru-based writer

The orchestra at the back of the stage – complete with local versions of the mridangam and the harmonium – began to strum traditional tunes, signalling the start of the show. Having grown up with the epic, I was not sure what to expect, but I was looking forward to a new interpretation. As it turned out, the performance –

The Ramayana performance at Prambanan



The Prambanan temple complex

I had earlier gone to take in the Hindu temples dedicated to the trinity of Brahma, Vishnu and Shiva. All the shrines in this complex were built in the 9th and 10th centuries, when this Java region of Indonesia saw the intermingling of Hindu and Buddhist cultures.

Being at Prambanan was a bit like standing inside a forest of temples, the tall spires reaching towards the skies. There are over 200 monuments inside this complex, but only some of them have survived intact, most having been destroyed by earthquakes over the centuries. Every temple has a character of its own, with unique and profuse carvings on walls and pillars, particularly the bas-relief of the Ramayana in the central ones.

The Prambanan temples made it to the Unesco World Heritage Sites list a few decades ago. However, the highlight of a visit to this region is Borobudur, the world's largest Buddhist temple, in the world's largest Muslim country.

Out of Ashes

The best time to see Borobudur is early in the morning, I had been told, just at sunrise. I gave it a pass though, not relishing the idea of trudging up tall and uneven stone steps at 3 am. But even later in the morning, when the sun was still mellow, the Borobudur temple was a stunner. Decorated with over 500 Buddha sculptures and 2,500 relief panels, and located on a flat hilltop overlooking the green hills of Java and the active volcano Gunung Merapi, Borobudur was unlike any Buddhist temple I had ever seen.

Believed to have been built around 800 AD, the Borobudur temple is in the shape of a stepped pyramid of five square bases, topped by three circular terraces. Each of these is encircled by 72 miniature stupas containing a statue of the Buddha. While some of them are barely visible through the lattice holes of the stupas, many sit exposed, with the stupa peaks broken.

My arduous climb to the top became worth it when I saw these stone Buddhas staring out into the lush hills in the distance, as if contemplating the very future of humankind. I sat in the shade next to one of them, both to catch my breath and to take in the soothing silence.

Like many great monuments, the Borobudur was abandoned in the 14th century, and got buried under layers of volcanic ash and thick foliage for hundreds of years. Stamford Raffles, the British governor of Java, is credited with its rediscovery in 1814, but it appeared in the popular tourist circuit only after extensive renovation work by the Unesco in the late 20th century.

In an aerial view, the temple resembles a lotus, considered sacred in Buddhism. More interestingly, from the stories narrated by the guide, the entire monument is considered an ode to the Buddha's path to nirvana. Every carving at every level tells a story from Gautama's life – often extrapolated as a lesson for the larger world.

I had to skip the sprawling Kraton palace complex of the sultans and the boutiques selling exquisite batik work, but Yogyakarta stayed with me, as a grand reminder of how faiths coexisted in this corner of Indonesia. ■

with over 200 actors in traditional costume – was fascinating.

The performance was marked by dance and movement, with the characters, even the demons, seeming to glide with an easy grace, leaving no doubt that this was a ballet. The music was melodic and dramatic by turns. And there were no spoken words – in what would have been an unfamiliar language for me – to hamper the enjoyment.

The story began with Rama and Lakshmana leaving for the forest, a docile Sita in tow. The narrative was more or less traditional, following their path to Lanka, up to Ravana's gory end. Although the battle scenes were spectacular, it was Hanuman in his white costume that stole the show, first with his antics and finally the flair with which he set fire to Ravana's golden city.

This was my second trip to the magnificent Prambanan temple complex that day.

Minstrel in the Gallery

Parvathy Baul is on a mission to bridge the gap between the esoteric Baul akharas and world music

:: Ishani Duttagupta

*Kichhu din mone mone ghorer kone
 Shyamer pirit rakh gopone
 Isharaey koibi kotha gothe-mathe
 Rai lo Rai*

(For a few days keep your love for Shyam hidden away in your heart in a corner of your home/talking only in gestures when out in the open fields and pastures/O Rai)

— Traditional Baul song from Parvathy Baul's album *Mystic* released in 2013

Early morning last Sunday, visitors to the World Sacred Spirit music festival in Jodhpur who attended the closing programme at Jaswant Thada, an ornate centograph adjoining the majestic Mehrangarh Fort, were in for a treat. A handsome young Rajasthani folk singer, dressed in traditional white kurta-pyjama and donning a brightly coloured turban, played the traditional, bowed string ravanahatha and rendered a soulful song in a local dialect. The golden sunshine of dawn provided the perfect backdrop. A few people listened and some clicked photos, but a diminutive woman stood alone, listening, almost merging into the perfect frame.

She was dressed in a traditional sari, with a *tilak* on her forehead, her hair long, untied and matted. Her stillness was captivating as she listened to the young man's song.

The quietude of Parvathy Baul, singer, musician, dancer and composer, almost belied her power-packed performance of the previous evening when she had rendered song after song to a mesmerised audience at the Zenana Deodi courtyard of the Mehrangarh Fort. She had played the single-stringed *ektara* and the small *duggi* drum. And danced. When the young musician's song was over, she discreetly put some money in the little basket placed beside him and moved away. A dignified tribute from one musician to another.

The Baul Tradition

As one of the best-known exponents of Bengal's Baul tradition of mystic minstrels, Parvathy, 39, performs not just in India but all around the world, with a tour across America coming up in April. But her initiation into the ancient musical tradition of south Bengal was by sheer chance. "As a child, I was trained in Indian classical dance and vocals, under different teachers, because that was what my father wanted. I was not allowed to listen to any light music and had to go through the rigours of classical training," she recollected during a chat with *ET Magazine* after her show in Jodhpur, even as she wiped off make-up from her face.

She was born in a conservative Bengali Brahmin family

in Assam. Her father decided to relocate to Cooch Behar in North Bengal when Parvathy was just six years old. Her first encounter with Baul music was on a train journey to Bolpur, where she was going to join the Visva Bharati University in nearby Santiniketan, set up by Rabindranath Tagore – for a fine arts course at Kalabhaban, the art school. An aged and visually challenged Baul – one of Bengal's mystic minstrels – was singing in the train compartment and collecting money from passengers, a tradition that commuters on that route are familiar with. "I was instantly drawn to the vastness and openness of a whole new musical world – the Baul tradition. I had never heard anything like that before and the depth left me shaken."

As a student in Santiniketan, Parvathy was exposed to more Baul music on campus and started learning songs from Bipad Taran Das Baul and Phulmala Dashi, one of the few Baul women singers back then. Parvathy went on to join her in the practice of *Madhukori*, or sacred begging while singing in trains. "It was the world of Bauls that attracted me far more than the Visva Bharati campus life. I was willing to leave my small town and conservative Brahmin background for the Baul akharas because I could relate to the lifestyle and it was my calling."

She finally left the confines of university campus to become a disciple of the famed Sanatan Das Baul at his ashram in Bankura; he accepted her into the fold after a 15-day wait and only after he was convinced of her talent and sincerity.

Today Parvathy Baul performs a vast repertoire of traditional songs as well as her own compositions even as she plays two instruments along with the graceful dance movements. She is on a personal mission of bridging the gap between the esoteric world of Baul akharas – the music and mysticism – and other musicians in India and around the world who want to discover their genre of music. "There are a lot of misconceptions about the Bauls, and I want to share knowledge about them. We are not a closed cult and people around the world have to hear our music and learn about us," she says.

That is what took her out of her Baul masters' ashram for the first time – to perform in different places in India and later abroad. She is also keen to share stories about women Bauls, who usually maintain a low profile and are not very articulate. "There are many like Phulmala Dashi who was one of my first teachers. Women, in fact, are an important part of the Baul ashrams and their way of life often helps to keep the community together and nurture it. I would like to help develop the talent of young women Bauls, especially independent young girls." For this, she has acquired land to set up a school for Baul music near Santiniketan. She also plans to build it up as an archival centre for the tradition.

An Anarchist of the Sacred

Her own journey from her master's akhara in a Bengal village was to take her to Kerala to train under theatre person and puppeteer Ravi Gopalan Nair, whom she later married. Since 1997, the couple run *Ekathara Kalari* in Thiruvananthapuram, a gurukul for Baul traditions and Kerala theatre. It is a space for practitioners from the traditional streams of art, spirituality, theatre, puppetry, music and healing, merging the concepts of the Baul akhara and the Kalari, the traditional Kerala theatre practice.

Parvathy loves to travel with her music and believes in a global vision without boundaries. "My interactions with musicians around the world make my own work stronger. Age-old traditions, rituals and divine inspiration mingle with modern metaphors," she explains.

It doesn't matter whether the poetic ecstasy and the free-spirited dance are inspired by Buddhism, Hinduism or Islam. The Baul is somewhat of an anarchist of the sacred, singing everywhere: at home, on the road, in the boat crossing the river, in the train and in Jodhpur. A week after Mehrangarh, Parvathy swirled her arm in space toward the sky, caught in the spiral of the wind of a free spirit at Melbourne's arts centre for the Asia-Pacific Triennial of Performing Arts. Play it again, Parvathy. ■

The writer visited Jodhpur at the invitation of Mehrangarh Museum Trust

"My interactions with musicians around the world makes my own work stronger"

Super Eruptions

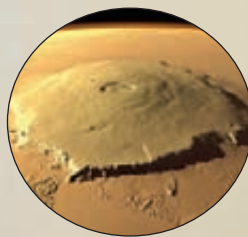
The Barren Island volcano in the Andaman & Nicobar archipelago, which had been lying dormant for more than 150 years until it saw a major eruption in 1991, started spewing ash and lava late last week. Check out some fascinating facts about volcanos:



that is home to **75% of the world's volcanic activity** and **90% of the world's earthquakes**

Located at the rim of the Pacific Basin, the Ring of Fire is a continuous chain of oceanic trenches and hundreds of volcanoes spanning some **25,000 miles**

The tallest volcano in the solar system is on Mars. **Olympus Mons** is a giant shield volcano that rises to an elevation of **27 km**, and it measures **550 km** across



Hawaii's **Kilauea volcano**, one of the most active on Earth, has been erupting continuously for 34 years, beginning **January 3, 1983**. It first erupted **200 years ago**, sending

speeding lava down its peaks and killing more than 400 people. It was the deadliest volcanic eruption on record in the US

The US ranks **third**, behind **Indonesia and Japan**, in the number of historically active volcanos, according to the US Geological Survey



The tallest volcano on Earth is Hawaii's **Mauna Kea**, with an elevation of **4,207 m**. If you measure the shield volcano from the base of the ocean to its peak, you would get a **height of 10,203 m (taller than Mount Everest)**

There are three kinds of volcanic eruptions. **Magmatic eruptions** involve the **decompression of gas within magma that propels it forward**. **Phreatic eruptions** are driven by the heat from magma creating **superheated steam**. **Phreatomagmatic eruptions** are caused by the interaction of **water and magma**

OSCAR WINNERS



The Academy Awards 2017 are scheduled in Los Angeles on Sunday night. Here's a look at some of the winners in history:



The three movies that have won **11 Oscars** are **Lord of the Rings: Return of the King (2003)**, **Titanic (1997)** and **Ben-Hur (1959)**



Midnight Cowboy (1969) is the only X-rated film to win the Best Picture award

At **234 minutes**, **Gone With the Wind (1939)** is the longest of all movies to win the Best Picture award



With **10 wins**, **Italy** is the country with the most number of wins for Foreign Language Film at the Oscars



Marlee Matlin is the first hearing impaired actress to win an Oscar, for the film **Children of a Lesser God** in 1987



Tatum O'Neal (left) won Best Supporting Actress for **Paper Moon** (1973) when she was only 10 years old. **Shirley Temple** won an honorary Oscar in 1934 when she was five



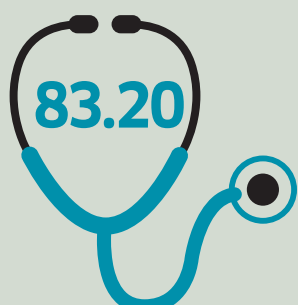
SOURCE: UNIVERSETODAY.COM, LIVESCIENCE.COM

SOURCE: MSN.COM, AWARDSANDSHOWS.COM

WEEKLY VECTOR

Healthcare Guide

These are the top ranked nations according to the Global Healthcare Index 2017:



SOUTH KOREA



NETHERLANDS



TAIWAN



AUSTRIA



THAILAND



SRI LANKA



INDIA

Scores are based on overall quality of the healthcare system, healthcare professionals, equipment, staff, doctors and cost; India is ranked 32nd

Let's Talk About...



ABRAHAM POINCHEVAL

PEOPLE, PLACES AND THINGS MAKING HEADLINES

WHO'S HE?

Poincheval is a renowned French artist.

OK. WHAT ABOUT POINCHEVAL?

The artist has embarked on a new feat by enclosing himself inside a giant block of limestone.

SAY WHAT NOW?

Poincheval has been entombed inside the boulder where he is to spend seven days on an 'inner journey to find out what the world is'.

'FIND OUT WHAT THE WORLD IS?'

Yes. In this act called *Stone*, he will spend a week stuffed into a hole matching the shape of his body inside the 12-tonne boulder at the Palais de Tokyo modern art museum in Paris.

I'M STILL NOT GETTING IT!

'The purpose is to feel the ageing stone inside the rock,' he said.

'There is my own breathing, and then the rock which lives, still humid because it was extracted not so long ago from the quarry. So there is that flow, that coming and going, between myself and the stone.'



HOW IS HE GOING TO SURVIVE?

Air holes have been bored in the boulder that will allow Poincheval to breathe. Cables will also be placed through the stone to monitor his heart and provide him an emergency video feed. He has a cushion and a niche inside the rock for supplies of water, soup and dried meat.

I HOPE HE MAKES IT!

If he succeeds in this performance, he will then prepare for his next act, to be called *Egg*, in which he will sit on a dozen eggs for three to four weeks until they hatch.

THIS IS PURE BIZARRE!

The artist said once the eggs hatch, the chicks will go and live with his parents. Then there's the time he crossed the Alps in a barrel, the week he spent on top of a 20 metre pole beside a train station in Paris. In 2014, Poincheval spent 13 days living inside a hollowed-out bear sculpture, eating worms and beetles to follow a bear's diet.

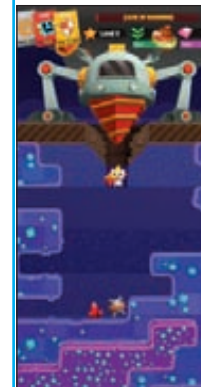
CAN THIS BE ANY WEIRDER?

His ambitions do not end there. Poincheval's big dream is to 'walk on the clouds'. 'I have been working on it for five years, but it is not quite there yet,' he said.

Digby Forever

Game for iOS; **Get it for:** Free

Digby is a fun arcade game with a simple goal – how deep can you dig? Your character Digby has a drill and you need to swipe down to drill deeper – the deeper you



go, the higher is your score. However, there are several enemies moving around and you must avoid touching them. In addition, there are bombs that activate if you touch them – you need to use these to clear a large block of rock and surrounding enemies (but you should be careful to stay out of the blast radius to avoid a game

over). As you progress through the levels, the difficulty increases with a larger number of enemies, random cave-ins that you have to avoid and addition of other road-blocks like lasers, lava and unbreakable rocks. You earn power cards by crossing the levels – these can be added to your character in the beginning of the level.

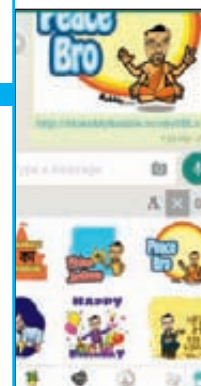
Each card offers a specific power (drill faster, double gem earning and regeneration) and you can choose any three power cards in each level. The graphics are pleasing to the eye and the gameplay is addictive. There are no visible ads in the game, but it gives you the option to view ads to double your earned gems if you want.

– Karan Bajaj

PLAY

Bobble Keyboard

App for Android; **Get it for:** Free



Many smartphone users are familiar with instant messaging apps that let you chat with friends, family or colleagues. This free app aims to make these daily interactions more personalised. Imagine if all the stickers and animated GIFs you send could have your face on them. That's exactly what Bobble does. When you

first open it, you take a selfie within the app – it takes your face and makes it into a cartoon. You can edit the cartoon image, remove any unwanted objects from the background as well as clean up blemishes. Once done, you can switch to Bobble keyboard in the chat app and then use these stickers and GIFs as you normally do. If you don't want to use the Bobble keyboard, you can even export images to your gallery and use them. A section called Stories places your cartoon avatar on comic strips for more shareable laughs. The keyboard has gesture support and gives you options to customise appearance (themes, adjustable height). If you register for a free account, keyboard settings can be saved on the cloud and synced with other devices.

– Karan Bajaj

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BROWSE

LISTEN

READ

PLAY

Portronics SeeSaw

Wireless Security Camera; **Get it for:** ₹3,999

If you think that setting up a wireless home security camera is a daunting task, this is something that you should look at. This tiny wireless camera from Indian company Portronics takes just two minutes to setup. It's not light on features though: you get 720p HD resolution, day-night viewing, two-way audio, motion detection and micro SD support for local video recording.

It needs a micro USB power source (a wall adapter and long USB cable is included in the box) while the U-Cam app takes you through the setup to bind it with your wi-fi network. Once done, you can remotely monitor the view with two-way audio. The app also allows you to stop/start recording, set motion detection or capture stills from the video. You can also choose to record video on the camera itself, by adding up to a 64GB micro SD card.

As for installation, it has a strong

magnetic base (the fridge is ideal) and there's a small metal plate that you can mount anywhere for the camera to stick to. In a pinch, it can also be powered by a battery pack. The video is clear, smooth (30fps) and shifts automatically to black & white night mode when the ambient light is low. Note that there is no motorised pan and tilt functionality here but the lens is sufficiently wide angle to capture most of a room when placed in a corner.

Now, consider the price: for ₹4,000, you are getting an expandable, DIY home security camera. You can move it around



the house as needed – maybe even use it as a baby monitor (video baby monitors from other brands usually cost upwards of ₹10,000). The camera is also compatible with Grandstream's GSurf Pro – a free video management software that supports viewing from up to 72 cameras.

– Hitesh Raj Bhagat