





INTERNATIONAL

FIRE ON WHEELS

Initially, Germany was apprehensive and reluctant. Chancellor Olaf Scholz was of the view that sending Leopard 2s, his country's main battle tanks (MBT), to Ukraine would escalate the conflict with Russia. His ruling coalition was divided. Polls showed that most Germans were against such a move. But as Russia started pushing through the frontlines, Berlin came under enormous pressure from Washington and other NATO allies to send the Leopard 2, one of the most advanced MBTs in the world, to Kyiv. On January 25, Germany decided to send the tanks and allow other NATO members to re-export the vehicle to Ukraine in what Kyiv's western allies think would be a game changing move.

The U.K. had already agreed to send 14 of its MBTs, the Challenger 2, to Ukraine. As part of a deal with Germany, the U.S. also overcame its early reluctance and decided to send 31 of its M1 Abrams battle tank. But it's the Leopards that Ukraine has always asked for, in large quantities. Germany will provide 14 Leopard 2s and other NATO members are planning to send two battalions — around 80 tanks. This means, Ukraine, which is currently operating the Soviet-era T-72s, will have over 100 western MBTs by the Spring.

Developed in the 1970s by the West German army, the Leopard 2 entered into service at a time when the Cold War was at its peak. By many standards, defence analysts say, the Leopard 2 is a superior MBT than the Soviet-era T-72 or T-90. According to the Royal United Services Institute, a London-based think tank, the Leopard 2, equipped with night-vision equipment and a laser range finder that can calculate the distance to a target, has a higher level of stabilisation than other MBTs — Leopard 2s can accurately fire at a moving target.

Armed with a 120mm smooth bore gun and two coaxial light machine guns, the Leopard 2 has a range of over 500 km (how far they can roll before refuelling) and a top speed of about 70 kmph, according to Krauss-Maffei Wegmann, the German maker of the tank. In comparison, the Abrams' top speed is 68 kmph and the Challenger 2's is 56 kmph. The T-90, Russia's most advanced MBT, has a range of 550 km and a top speed of 60 kmph.

Deployment in Europe

Leopard 2s, run on diesel, have been used in several theatres (from Afghanistan to Kosovo) and are available in large numbers in Europe — more than 2,000 Leopard 2s have been deployed across the continent. Poland, Ukraine's neighbour and a key supplier of military aid, has close to 300 Leopard 2s, while Finland, another neighbour, has 200 of them. This meant that Ukraine's allies could send the tanks and the spare parts rather easily.

The main barrier for supply was the German reluctance — other countries cannot export those tanks without Berlin's consent. Now that Germany has shown its greenlight, dozens of Leopard 2s are set to roll over into Ukraine.

But it's too early to say if tanks alone can shift the battlefield dynamics. The Leopard 2 is not an all powerful magic bullet. It has its shortcomings. Turkey, which has some 300 Leopard 2s, lost at least eight in an operation against Islamist militants in Syria in 2016. Experts say there are weak points in the tank's rear and side armour which can be exploited.





In the case of Ukraine, it would take months to train its soldiers to operate these complex weapons systems, which leaves a window open for Russia to expedite its offensive that's gathering storm in Ukraine's east and south. And Russia doesn't face any shortage of tanks — it has up to 1,000 T-90s, according to some estimates, and many more T-72s, besides light tanks such as T-70s.

But still, the remilitarisation of Ukraine should worry Russian President Vladimir Putin. Almost a year into the war, the free flow of weapons into Ukraine from the West is growing, not waning. If demilitarising Ukraine was one of the main declared goals of his "special military operation", Ukraine now has more advanced offensive and defensive weapons than what it had at the beginning of the war, including heavy battle tanks, armoured vehicles, munitions, medium range rockets and missile defence batteries.

THE RIGHT NOTE: AUSTRALIA DECIDED TO RID ITS \$5-NOTE OF BRITISH ROYALTY. IT'S ABOUT TIME

It's been nearly five months since the previous sovereign of the British empire died. But royalty, like so many other grand fictions, casts a long shadow. The image of Queen Elizabeth was ubiquitous not just in the British Isles, but also in the symbolic remnants of the empire. Now, with the Reserve Bank of Australia announcing that \$5-notes will no longer carry the image of the monarch — King Charles, now — it has severed an anachronistic tie with the "mother country". Better late than never.

This proclamation comes ahead of the July 2023 referendum that will vote on the inclusion of Aboriginal and Torres Strait Islander people in the country's constitution. The new currency notes will feature a design "that honours the culture and history of the First Australians". While one side of this note will feature Indigenous culture — as opposed to a portrait of Queen Elizabeth/King Charles — the other will continue to carry an image of the Australian Parliament. According to reports, the notes will take a few years to come into circulation and will be designed with inputs from the indigenous community.

The currency of a country says a lot about how it sees itself, the ideas and symbols it values. In the US, early presidents — those who had a role in writing the Declaration of Independence, ending slavery and winning early battles — find place on notes and coins. In India, Mahatma Gandhi accompanies the "promise to pay the bearer..." in multiple languages — a reminder of the country's diversity. Britain's fascination with and adherence to the head of a single household as a symbol of its nationhood confounds many across the world. Australia, which shook off "dominion status" in 1986, seems to be taking a step — if only symbolic for now — towards inclusion. After all, its new notes tell people that it is the "First Australians" — oppressed, targeted and exploited for centuries — who are a core part of the country's identity. That's a very welcome step down from the entitled plutocrat, half a world away.

CHINA'S SICHUAN PROVINCE ENDS LAW BANNING UNMARRIED COUPLE FROM REGISTERING CHILDBIRTH

Amid worries over falling fertility rates, a major Chinese province has done away with a law that required couples to be married to register the birth of their children, reported local media on Monday.

The Health Commission of Sichuan Province in southwestern China said that it is simplifying the birth registration process for infants from February 15, reported Beijing-based The Global Times.





"The new regulation has removed restrictions on whether people have to get married before they can register the births of their children and the number of children they can have, stipulating that all citizens who have children should register their births," it said.

The move comes weeks after China's population dropped for the first time in 60 years. The country's government said on January 17 that 9.56 million people were born in China in 2022, outnumbering the death toll of 10.41 million. This is the sixth consecutive year that the country's number of births has fallen.

Over the years, Beijing had tried numerous policies to encourage its women to reproduce, including lifting the controversial one-child policy. It then shifted to a two-child per couple policy, before shifting again to endorse a three-child policy in May 2021. However, critics have pointed out that the main obstacle to young people's decision to reproduce isn't policy — it's the high cost of living and child-rearing.

As Sichuan's policy shift sparked controversy, the provincial government asserted that it was not meant to encourage people to have children out of wedlock, but instead to ensure that single parents have the same access to services as traditional families, reported The Global Times.

In its report, The Guardian said that while China's reproduction policies do not explicitly ban unmarried women from having children, proof of marriage is often necessary for the parents to access free services like prenatal healthcare, salary during maternity leave, and job protection.

REIGN OF TERROR

Two years after it captured power through a coup, Myanmar's military is struggling to maintain its grip on power in a country that has become a land of many mutinies. On February 1, the second anniversary of the coup that toppled the elected government of Aung San Suu Kyi, thousands joined the opposition's call for a "silent strike" by shutting shops and staying at home. The junta's decision to extend the state of emergency — which would also mean that the August elections the Generals had announced seeking political legitimacy would be further delayed — points to the regime's weakening control. This is certainly not the scenario Gen. Min Aung Hlaing had anticipated when he grabbed power, citing fraud in the 2020 general election which Ms. Suu Kyi's party had swept. The Tatmadaw (the military) imprisoned the entire government and most of the ruling party lawmakers, including Ms. Suu Kyi, cracked down on democracy protests and started ruling the country directly — old tactics that have helped the Generals to rule through fear. But unlike in the past when the military faced democratic civilian resistance to its brutal rule, Myanmar fell into an armed civil war after the February coup. Whatever the military did to take control only made matters worse.

Now the junta is facing multiple crises in the face of a humanitarian disaster. The remnants of the old government have formed an alternative administration, the National Unity Government. Several cells of the People's Defence Force (PDF), the armed wing of the NUT, have sprung up in the otherwise peaceful Buddhist heartlands carrying out ambushes. In the borderlands, ethnic minority militias, which have been fighting the military, have joined hands with the urban guerillas of the PDF. The junta's response has been indiscriminate bombings. Since the coup, some 3,000 civilians have been killed, 40,000 houses destroyed and about 1.5 million people displaced. According to the UN, some 17.6 million people, roughly a third of Myanmar's population, will need humanitarian assistance. The junta is neither interested in nor capable of addressing these problems. And the war it is fighting against its own people is not helping the Generals' cause either





— a report by the Special Advisory Council for Myanmar, an independent group of international experts, says the junta has stable control over only 17% of the country. This is an unprecedented scenario. What Myanmar urgently needs is meaningful dialogue between the junta and the opposition to restore democracy and start talks with ethnic rebels. Regional and international players, especially ASEAN, China and India, should push the Generals to start talks with the opposition.

POLICY FOLLY

When the Taliban captured Kabul in August 2021, Imran Khan, then Prime Minister of Pakistan, said Afghanistan had "broken the shackles of slavery". Pakistan, which had harboured the Taliban leadership, was largely seen as one of the victors of the Afghan civil war. But the celebratory mood faded as the Taliban's triumph also emboldened the Tehreek-e-Taliban Pakistan (TTP), the Pakistani version of the Sunni Islamist insurgency. Since then, Pakistan has witnessed a rise in terrorist attacks, especially in Khyber Pakhtunkhwa bordering Afghanistan. Monday's blast in a mosque in Peshawar's highly fortified Police Line area, claiming at least 100 lives, was the deadliest in Pakistan in years and a sharp reminder of how its strategy of backing the "good Taliban" and fighting the "bad Taliban" has backfired. A TTP faction initially claimed responsibility, but a spokesperson denied any role. This demonstrates the divisions within the group rather than raising doubts about its involvement. The blast bears the hallmarks of a TTP attack — it took place in its stronghold and was targeted at security personnel. And no other group has claimed responsibility.

The TTP and the Afghan Taliban may be organisationally different, but they are ideologically brothers. What the TTP wants to do in Pakistan is what the Taliban have managed to do in Afghanistan. After the 2014 Peshawar school bombing, which killed over 150 people, mostly children, the Pakistani Army had cracked down on the group. But the Afghan Taliban's return to power changed the dynamics of insurgency in the border region. Mr. Khan adopted a policy of engagement towards the TTP. The Afghan Taliban hosted talks between the TTP and Pakistan which led to a ceasefire. But the year-long truce collapsed in November last year. Many believe that the TTP, which used the ceasefire to rearm and reorganise itself, is now spreading terror with greater firepower. The Peshawar blast has come at a time of continuing political instability, with Mr. Khan leading a relentless campaign against the government, Pakistan's currency tanking, its foreign reserves falling, inflation soaring and the power situation remaining grim. Unable to pay its debts, the government is in talks with the IMF for a bailout package. And now, there is a security challenge. Pakistan should realise that its policy of selectively fighting and selectively harbouring terrorism and extremism has done it more harm than good. It needs a paradigm shift in its approach towards terrorism, while, more urgently, amassing its resources and going after the TTP, which is posing the biggest internal security threat to the Pakistani state.

PARIS CLUB LIKELY TO PROVIDE FINANCIAL ASSURANCES TO IMF ON SRI LANKA DEBT: WHAT IS THIS GROUPING?

An informal grouping of mostly Western countries, the Paris group countries dominated bilateral lending in the last century. Its importance has receded over the last two decades or so, with the emergence of China as the world's biggest bilateral lender.

The Paris Club, an informal group of creditor nations, will provide financial assurances to the International Monetary Fund on Sri Lanka's debt, Reuters has reported quoting two unnamed





sources. An assurance from the Paris Club, as well as other bilateral creditors, is one of the conditions that Sri Lanka has to fulfil for the IMF to begin disbursing a \$2.9 bn bailout package to the beleaguered nation that all but collapsed last year under a severe economic crisis.

What is the Paris Club?

The Paris Club is a group of mostly western creditor countries that grew from a 1956 meeting in which Argentina agreed to meet its public creditors in Paris. Their objective is to find sustainable debt-relief solutions for countries that are unable to repay their bilateral loans.

It describes itself as a forum where official creditors meet to solve payment difficulties faced by debtor countries. All 22 are members of the group called Organisation for Economic Co-operation and Development (OECD). The members are: Australia, Austria, Belgium, Brazil, Canada, Denmark, Finland, France, Germany, Ireland, Israel, Italy, Japan, Korea, Netherlands, Norway, Russian Federation, Spain, Sweden, Switzerland, United Kingdom, United States of America.

How has Paris Club been involved in debt agreements?

According to the information on its website, since its beginnings, the Paris Club has reached 478 agreements with 102 different debtor countries. Since 1956, the debt treated in the framework of Paris Club agreements amounts to \$ 614 billion.

It operates on the principles of consensus and solidarity. Any agreement reached with the debtor country will apply equally to all its Paris Club creditors.

A debtor country that signs an agreement with its Paris Club creditors, should not then accept from its non-Paris Club commercial and bilateral creditors such terms of treatment of its debt that are less favourable to the debtor than those agreed with the Paris Club.

The role of the Paris Club over time

The Paris group countries dominated bilateral lending in the last century, but their importance has receded over the last two decades or so with the emergence of China as the world's biggest bilateral lender.

In Sri Lanka's case, for instance, China, Japan and India are the largest bilateral creditors. Sri Lanka's debt to China is 52 per cent of its bilateral debt, 19.5 per cent to Japan, and 12 per cent to India. With Japan a member of the Paris Club, Sri Lanka needed assurances from China and India as well. The Paris Club had tried to get both countries on board a centralised effort, but Delhi launched its own bilateral negotiations with Colombo. Last month, during a visit to Colombo, External Affairs Minister S Jaishankar announced that India had written to the IMF providing the necessary financial assurances, adding that it hoped others would follow suit.

The reported readiness by the Paris Club comes against this background. That still leaves China, whose Exim Bank offered a two-year moratorium on its loans soon after the Indian announcement.

This has been deemed to be insufficient. Victoria Nuland, the US under-secretary of state who is touring Sri Lanka, said the Chinese offer was "not enough". The IMF has not commented on the Chinese assurance, but described the Indian submission as a "good development".





NATION

EXPRESS VIEW | INDIA-US: THE HIGH TECH BOOST

The talks between India's National Security Advisor Ajit Doval and his American counterpart Jake Sullivan in Washington this week have concluded with the announcement of a new road map for deeper military and techno-economic cooperation between the two countries. If implemented with speed and purpose, the bilateral Initiative on Critical and Emerging Technologies (iCET) could lend a new strategic depth and breadth to the expanding engagement between India and the United States. The idea was first mooted in the meeting between Prime Minister Narendra Modi and President Joe Biden on the margins of the Tokyo summit of the Quadrilateral Security Dialogue (Quad) last May.

The iCET involves collaboration in a range of areas including quantum computing, semiconductors, 5G and 6G wireless infrastructure, and civilian space projects such as lunar exploration. The two sides are also focused on cooperation in defence production. While much of this cooperation will need to be fleshed out in the months ahead, Doval and Sullivan announced one concrete measure — the making of a fighter jet engine in India. GE Aerospace has applied for an export licence for jet engine production and phased transfer of technology to Indian entities. Washington promises to process this application expeditiously. This fits in nicely with Delhi's plans to modernise its rusty defence industrial base.

High technology cooperation has long been a major focus of US-India relations. Early advances in India's nuclear and space programmes in the 1950s and 1960s involved significant inputs from the US. But the US nuclear sanctions from the 1970s steadily whittled down the extent of bilateral high-tech cooperation. The historic civil nuclear initiative of 2005 opened the door for renewed technological cooperation. But residual restrictions on technology transfer in Washington and Delhi's political ambivalence and bureaucratic inertia prevented the best use of the new possibilities. The iCET process, which will be monitored and driven from the PMO in Delhi and the White House in Washington, will hopefully bring greater coherence to this round of India-US technological engagement. Lending urgency to the iCET is the growing convergence of Indian and US interests in managing the security, economic, and technological challenges presented by a rising and assertive China. India is also looking to reduce its over dependence on Russian weapons and military technology and to produce more weapons at home in partnership with western countries.

THE GENERAL WITH AN IRON GRIP

In early 2011, the eyes of democratic activists worldwide were on Tahrir Square, as thousands descended on the public square at the heart of Cairo to demand the resignation of Egypt's President Hosni Mubarak. At the time, Abdel Fattah El-Sisi was the Director of Military Intelligence, a powerful post in a regime that ruled by emergency powers for 30 years. As the crowds grew, the military seemed less inclined to support Mubarak, especially as reports grew in credence that Mubarak planned to install his son Gamal as his successor.

The tide turned immediately, and as Mubarak stepped down just weeks after the protests began, his resignation was seen as a massive victory for the Arab Spring movement. Within a year, Egypt saw its first civilian President, elected through a popular vote for the first time — Mohammed





Morsi, the Muslim Brotherhood (MB) leader, won with more than 50% of the vote, defeating a former Prime Minister of the Mubarak regime.

President Morsi made Mr. Sisi, who had won the hearts of many Egyptians for the military's role during and restoring stability after the Tahrir Square protests, his Defence Minister and Commander of the Armed Forces in August 2012. The post was significant — for decades, the military and the ultraconservative Muslim Brotherhood had been enemies, and the MB was proscribed and prosecuted in Egypt by every regime since 1948, accused of fomenting violence, terrorism and a string of assassinations. While many had misgivings about the MB, especially its ties to radicalised terror groups, most of the world welcomed the advent of real elections in Egypt, and Morsi was welcomed in many capitals, including New Delhi, Riyadh and Beijing.

In the short period since the protests began, Mr. Sisi had broken with his President (Mubarak), and superseded all his seniors in the military, a portent of things to come. Within a year, by June 2013, Mr. Morsi's Islamist policies, confrontation with the judiciary and economic misgovernance brought Egyptians out at Tahrir Square again — for what was called the 'Tamarrud' movement, or rebellion. Mr. Sisi, once again broke with his President, this time Morsi, and announced his dismissal. In a televised address on July 3, Mr. Sisi said Morsi was unfit to rule, and as a result it was for him, "based on the Army's historical and patriotic responsibility" to suspend the Constitution, and to appoint the Chief Justice as the provisional President.

Brutal crackdown

The coup was followed by a brutal crackdown on the Muslim Brotherhood and other opponents — Gen. Sisi, who was soon made Field Marshall Sisi, was accused of ordering the police and armed forces to clear protesters from the Rabaa square, in a night of bloodshed that saw more than 900 killed. Many countries expressed concern and even long-time ally the U.S. froze its military aid to Egypt.

In elections in 2014, however, Mr. Sisi ran for President, winning 96.91% of the vote. The staggering, if controversial, mandate led to a turnaround in Egypt's ties with the world. PM Narendra Modi invited and met President Sisi thrice, once for the India-Africa Summit in 2015, then for a full state visit in 2016, and last week, as the Chief Guest for the Republic Day Parade, the first time an Egyptian leader has been accorded the honour.

INDIA'S CALL TO MODIFY THE INDUS WATERS TREATY

The story so far:

In a notice to Pakistan on January 25, India said that it has been compelled to call for the 'modification' of the 63-year-old Indus Waters Treaty owing to Pakistan's persistent objections regarding India's Kishenganga (KHEP) and Ratle hydropower projects in Kashmir.

What is the Indus Waters Treaty?

In 1947, the line of partition, aside from delineating geographical boundaries for India and Pakistan, also cut the Indus river system into two. Both sides were dependent on water from the Indus river basin to keep their irrigation infrastructure functional and therefore, equitable distribution was needed. In 1951, when both the countries applied to the World Bank for funding their respective irrigation projects on Indus and its tributaries, the World Bank offered to mediate the conflict. Finally in 1960, an agreement was reached between the two countries, and the Indus





Waters Treaty (IWT) was signed by former Prime Minister Jawaharlal Nehru and then President of Pakistan, Ayub Khan. The former Vice President of the World Bank, W. A. B. Iliff, also signed it.

What are some of its key provisions?

The Indus river basin has six rivers — Indus, Jhelum, Chenab, Ravi, Beas and Sutlej — originating from Tibet and flowing through the Himalayan ranges to enter Pakistan, ending in the south of Karachi.

The treaty prescribed how water from the six rivers would be shared between India and Pakistan. It allocated the three western rivers — Indus, Chenab and Jhelum — to Pakistan for unrestricted use, barring certain non-consumptive, agricultural and domestic uses by India. Similarly, the three Eastern rivers — Ravi, Beas and Sutlej — were allocated to India for unrestricted usage. It also required both the countries to establish a Permanent Indus Commission constituted by permanent commissioners from both sides. The functions of the commission include serving as a forum for exchange of information on the rivers and as a first stop for the resolution of conflicts. Annexure D of the IWT allows India to build 'run of the river' hydropower projects (projects which do not require live storage of water). The treaty also allows Pakistan to raise objections over such projects being built, if it does not find them to be compliant with the rules.

What are Pakistan's objections over the Kishenganga and Ratle projects?

Kishenganga, a tributary of the Jhelum river, originates in J&K and joins the river in Pakistan occupied Kashmir. The work for KHEP started in 2007, with a proposal to build a dam on the Kishenganga, diverting its water for a 330 MW hydropower plant in Kashmir's Bandipora and sending it back. The work for the project was supposed to be completed by 2016, but before the construction started, Pakistan had raised objections regarding the height of the dam, fearing it would mean increased water storage for India. Consequently, India agreed to alter the design by lowering its height from 97 metres to 37 metres. In 2010, Pakistan took the matter to the International Court of Arbitration at the Hague, this time, objecting to the diversion of water from Kishanganga. The Court gave India a green signal for the project (subject to conditions) in its final ruling in 2013. The conflict however, did not end here, with Pakistan approaching the World Bank three years later in 2016 and again in 2018, objecting to the design. It also tried to stop the construction of the dam in 2016 by firing shells near the dam site. The project was however, finally inaugurated in 2018. As for India's 850 megawatt Ratle hydroelectric power project on the Chenab river, Islamabad has repeatedly raised concerns over its design, insisting that India would use the project's reservoir to create deliberate and artificial water shortage or cause flooding in Pakistan. India's new call for modification of the Treaty comes from what it describes as Pakistani "intransigence" over its implementation.

India says that the dispute over the two projects has been brewing since 2015, when Pakistan asked for the appointment of a Neutral Expert (NE) to look into its objections to the Ratle and Kishenganga projects. Later in 2016, Pakistan changed its request and requested that the Arbitration Court should examine the issue. India followed this up by sending its own request to appoint an NE. India now alleges that by unilaterally changing its request from one dispute resolution mechanism to another, Islamabad has violated the IWT. Besides, the World Bank recently moved to act on both requests. Indian sources told The Hindu that "such parallel considerations on the same issues" were not covered under any provision of the IWT. To resolve the long-standing dispute, India has called for the Treaty's modification so that Pakistan is





provided an opportunity to initiate "intergovernmental negotiations" within 90 days regarding the differences that the Indian side has described as a "material breach".

IS JUDICIAL MAJORITARIANISM JUSTIFIED?

The story so far:

As the recent majority judgment of the Supreme Court on demonetisation comes under criticism, the minority judgment by J. Nagarathna is being hailed for its challenge to the RBI's institutional acquiescence to the Central government. This questions our blind acceptance of numerical majorities in judicial decision-making.

What is judicial majoritarianism?

As opposed to standard matters heard by Division Benches consisting of two judges, numerical majorities are of particular importance to cases which involve a substantial interpretation of constitutional provisions. In such cases, Constitutional Benches, consisting of five or more judges, are set up in consonance with Article 145(3) of the Constitution. Such Benches usually consist of five, seven, nine, 11 or even 13 judges. This is done to facilitate decision-making by ensuring numerical majorities in judicial outcomes.

The requirement for a majority consensus flows from Article 145(5) of the Constitution which states that no judgment in such cases can be delivered except with the concurrence of a majority of the judges but that judges are free to deliver dissenting judgments or opinions.

What is at the heart of the debate?

As opposed to representatives of the people in legislatures who may act on hunches or popular perception, judges are experts of law and are aware of the arguments for and against the impugned matter. Given the same, Jeremy Waldron questions why is it that the judges too have to resort to head counting in order to resolve disagreements amongst judges.

All judges on a particular Bench give their rulings on the same set of arguments and written submissions. In light of the same, any differences in judicial decisions can be attributed to a difference in either the methodology adopted and the logic applied by the judges, or, as proffered by the legal realists such as Jerome Frank, upon their own 'judicial hunches' which may be an outcome of their subjective experiences, outlook, and biases. In such circumstances, it is entirely possible that the majority may fall into either methodological fallacies and errors or be limited by their 'judicial hunch' respectively.

In such situations, a meritorious minority decision, irrespective of the impeccability of its reasoning receives little weightage in terms of its outcomes. Our Constitutional history is replete with such meritorious dissents. The dissenting opinion of Justice H.R. Khanna in A.D.M. Jabalpur v. Shivkant Shukla (1976) upholding the right to life and personal liberty even during situations of constitutional exceptionalism is a prime example. Another example is the dissenting opinion of Justice Subba Rao in the Kharak Singh v. State of U.P. (1962) case upholding the right to privacy which received the judicial stamp of approval in the K.S. Puttaswamy v. UOI (2017) case.

Moreover, the rate of dissent itself is subject to influences. To exemplify, Yogesh Pratap Singh, Afroz Alam, and, Akash Chandra Jauhari (2016) found that the rate of judicial dissent at the height of the Emergency in 1976 was a mere 1.27% as opposed to 10.52% in 1980. The study also found





that the rate of dissent where the Chief Justice was a part of the Bench was lower than in those cases where the Chief Justice was not on the Bench. Such situations call into question the efficiency and desirability of head-counting procedures for a judicial determination on questions of national and constitutional importance.

What is the gap in our understanding?

Ronald Dworkin proffers a system which may either give more weightage to the vote of senior judges given that they have more experience or to the junior judges as they may represent popular opinion better. Such alternatives, however, can only be explored once we identify and question the rationales which underlie head-counting in judicial decision-making.

The absence of a critical discourse on judicial majoritarianism represents one of the most fundamental gaps in our knowledge regarding the functioning of our Supreme Court. As pending Constitutional Bench matters are listed for hearing, we must reflect upon the arguments of judicial majoritarianism on the basis of which these cases are to be decided.

WHY IS SC EXAMINING MARRIAGE LAWS FOR MINORS?

The story so far:

Earlier this month, the Supreme Court announced that it would examine whether minor girls, as young as 15 years, can marry on the basis of custom or personal law when such marriages are considered an offence in statutory law. The legal age for marriage is 18 years for women and 21 years for men. Marriage below this age is considered to be child marriage, and hence an offence. In 2017, the Supreme Court had ruled that sexual intercourse by a man with his wife, who is below 18 years, is rape, reading down Exception 2 to Section 375 (rape) of the Indian Penal Code which allowed the husband of a girl child — between 15 and 18 years of age — to have non-consensual sex with her.

What is the Supreme Court looking at?

On January 13, the Supreme Court said it would examine whether girls as young as 15 years old can enter into wedlock if their personal law allows it. A Bench led by Chief Justice of India D.Y. Chandrachud issued a formal notice on a petition filed by the National Commission for Protection of Child Rights (NCPCR) against a recent order of the Punjab and Haryana High Court that said a girl, on attaining puberty or the age of 15 years and above, could be married on the basis of Muslim personal law, irrespective of the provisions of the Protection of Children from Sexual Offences (POCSO) Act, 2012. The Supreme Court said the High Court order would not act as a judicial precedent for other courts. The NCPCR argued that when girls as young as 14 and 15 are being married off, a plea of personal law and custom cannot be used when the POCSO Act and the Indian Penal Code make such marriages an offence. The Supreme Court has also appealed to Parliament to lower the age of consent under the POCSO Act and the IPC which set it at 18 years, thus criminalising all adolescent consensual sexual activity. Last December, the government told Parliament that it does not plan to do that yet.

What are the various laws that govern marriage in India?

The Prohibition of Child Marriage (Amendment) Bill, 2021 has sought to amend the Prohibition of Child Marriage Act (PCMA), 2006, to increase the minimum age of marriage for women from 18 to 21 years. In December 2021, it was referred to a parliamentary standing committee for further





deliberations, and it has already got three extensions to submit its report, the last being in October 2022.

Last December, the Supreme Court had asked the government to respond to another petition filed by the National Commission for Women (NCW) to make the minimum age of marriage for Muslim women on par with persons belonging to other faiths. The NCW, like the NCPCR, had raised the question whether personal law could override statutory provisions of the POCSO Act and other laws. The NCW petition stated that under the Indian Christian Marriage Act, 1872, Parsi Marriage and Divorce Act, 1936, Special Marriage Act, 1954 and Hindu Marriage Act, 1955, the minimum age of marriage for a man is 21 years and for a woman it is 18 years. "However, under the Muslim personal law in India, persons who have attained puberty are eligible to get married i.e. on attaining the age of 15 years, while they are still minor," it said.

What has the Assam government decreed?

The Assam Cabinet recently announced that men who marry minor girls would be booked under stringent laws prescribing imprisonment from two years to life. Citing the National Family Health Survey-5 report, Chief Minister Himanta Biswa Sarma said an average of 31.8% of girls in Assam get married at the "prohibited age" and 11.7% become mothers before adulthood. The national average is 23.3% and 6.8% respectively.

Which are the other States where child marriage is high?

An analysis of Child Marriage in India based on Census 2011 by Young Lives, India and NCPCR in June 2017 identified 70 districts spread across 13 States including Assam, Bihar, Gujarat, Jharkhand, Karnataka, Madhya Pradesh, Maharashtra, Rajasthan, Uttar Pradesh and West Bengal where prevalence of child marriage is high. According to activists and health workers, targeted interventions including awareness campaigns on reproductive health and provisions of the law, are being carried out to prevent and reduce child marriage, and though NFHS-5 data show improvement, there's a lot of ground left to be covered. In Jharkhand, according to NFHS-5 (2021), 32.2% women married before they turned 18 compared to 37.9% in 2016 (NFHS 4); in West Bengal, 41.6% women got married before they turned 18 (NFHS-5) and the percentage was the same in NFHS-4; Madhya Pradesh has seen a reduction in child marriage (from 32.4% in NFHS-4 to 23.1% in NFHS-5), though the infant mortality rate is high — 41.3 per 1000 live births.

What are the effects of early marriage?

The Young Lives, India-NCPCR study pointed out that girls who got married before turning into adults lacked reproductive choices and were denied a host of other rights, including education, autonomy and often a lack of livelihood. With 59% of Indian girls in the 15-19 group suffering from anaemia — it stood at 54% in NFHS-4 — early child-bearing could result in poor maternal and child health and poor nutritional status.

Health experts tie maternal health to another crucial factor — education. The national percentage of women with 10 or more years of schooling is 41% (NFHS-5) compared to 35.7% in NFHS-4; the data varies from State to State. In West Bengal, according to NFHS-5, 32.9% of women have finished 10 or more years of schooling. In two villages of Birbhum district in West Bengal that the anthropologist Mukulika Banerjee has studied since 1998, she observed that while girls continued to be married off early for a variety of reasons, those that had completed school seemed to be making the radical decision to have only one child. They said they would prefer to raise one child with care, and were able to help them with homework, provide better nutrition and so on.





Are provisions of the PCMA misused?

Women's rights activists point out that parents often use the PCMA to punish their daughters who marry against their wishes or elope to evade forced marriages, domestic abuse, and lack of education possibilities. Hence, within a patriarchal setting, it is more likely that the change in the age limit will increase parents' authority over young adults. A 2008 Law Commission report on family law reform recommended a uniform age of marriage for boys and girls at 18 years and not 21. It held that since 18 is the age at which a citizen can vote, they should be allowed to marry at that age too.

SUB-CATEGORISATION COMMITTEE FOR OBCS GETS 14TH EXTENSION

The Justice G. Rohini-led commission for the sub-categorisation of other backward classes (OBCs) has been given yet another extension in its tenure by the President, according to a Gazette notification issued by the Union Ministry of Social Justice and Empowerment last week.

This is the 14th extension in tenure that the commission has been given. The commission, formed in October 2017, was initially given 12 weeks to finish the task of sub-categorising the nearly 3,000 castes within the OBC umbrella and recommend division of the 27% OBC quota among them equitably. Initially, the government cited more time required by the panel to gather information and data and then it cited the pandemic.

The fresh six-month extension comes weeks after multiple members of the commission told The Hindu in December 2022 that their report was "in the final stages" and that they were prepared to submit it to the government by the end of January 2023.

After the notification of the extension, one commission member told The Hindu on Sunday, "Nothing is left for the panel to do. We are now just attaching annexures as required and finalising the compilation of the report."

Even as the notification issued on January 25 said the commission "shall present its report by 31st July, 2023", the panel member said they might be finished with it before the fresh deadline.

As part of its work, the commission had identified dominant caste groups among all OBC communities in the Central list, finding that a small group of dominant OBC communities were crowding out a large number of communities from the 27% quota.

COMING TO A MOVIE HALL NEAR YOU: A VOTER AWARENESS SONG, COURTESY THE ELECTION COMMISSION

As a part of the Election Commission's voter awareness activities, cinema halls in Delhi on Thursday began playing the EC's recently-launched song 'Main Bharat Hoon' before screening movies, with all other states asked to also publicise the song through all means, EC officials said Friday.

As of Friday, all cinema halls in Southeast and East districts, and a few in South Delhi, had started playing the song, EC Special Officer for SVEEP (Systematic Voters' Education and Electoral Participation) and Delhi Chief Electoral Officer (CEO) Dr Ranbir Singh said. The CEOs of all state and Union Territories had been asked to publicise the song through various means, including on their social media handles, he said. They were not, however, specifically asked to reach out to cinema halls.





The song was a part of the revamped version of SVEEP that calls for a targeted approach towards awareness campaigns. Under the strategy document (2022-2025) for phase four of SVEEP, which the EC circulated to state and UT CEOs in October 2022, the focus shifted from "information, motivation and facilitation" alone to the addition of "education, engagement and empowerment", Singh said.

Launched on the occasion of National Voters' Day on January 25, the song had got over 3.5 lakh views on the EC's Facebook, Instagram, Twitter and YouTube pages, an EC statement said on Friday. The song, which was written and produced by Bollywood director Subhash Ghai, was sung in 12 languages by well-known singers, including Kavita Krishnamurthy, Alka Yagnik, KS Chithra, Hariharan, Mika Singh and Papon. Singh said Ghai, the singers and the actors who featured in the music video performed pro bono, while the EC bore the cost of the recording process.

"The song is dedicated to each voter who takes cognizance of their national duty and casts their vote, beating all odds," Chief Election Commissioner Rajiv Kumar said in the written statement.

BIRYANI AND RAGI: DISHES MADE FROM MILLETS WILL NOW BE SERVED IN ALL THE PARLIAMENT CANTEENS

The menu in Parliament has got a tasty and nutritious upgrade. Alongside the ever-popular biryanis and cutlets, Members of Parliament will now be able to partake of idlis, dosas, shorba, tikkis and khichdi made from the ancient grains of the Subcontinent. Dishes made from millets, such as jowar (sorghum), bajra (pearl millet) and ragi (finger millet), and pseudo millets, such as ramdana (amaranth), will now be served in all the Parliament canteens, and will also be delivered to MPs in the Central Hall. In the International Year of Millets — promoted by the UN after it was proposed by India — this is an important affirmation of the government's commitment to promote these grains.

It's not just that millets — for centuries, a dietary mainstay across India — have long suffered from state neglect, particularly when compared to the support provided for higher-yielding wheat and rice varieties. Millets have also been perceived as "humble", figuring more in animal fodder in recent decades than on dinner plates and thalis. The image problem is a tough one to fix, but it can be done. A key part of the government's communication as it pushes this agenda would be the message that millets are incredibly versatile and adaptable, even in non-traditional preparations, such as the Bajra Parmesan Khichdi served at the award-winning restaurant Indian Accent, for instance.

There are encouraging signs that the government has recognised this: A press release put out by the Ministry of Agriculture at the start of the year mentioned that there would be efforts to involve local restaurants and food bloggers in the national millets campaign. If the year-long efforts help in restoring millets to their proper place in the daily diet of Indians, the government can also consider reviving and promoting the incredible varieties of indigenous rice, wheat and other crops.

FIRE AND ICE

Picturesque Ladakh has been on edge ever since it was carved out as a Union Territory (UT) from the erstwhile State of Jammu and Kashmir in 2019. After a brief period of jubilation over the status of a separate UT, a long-pending demand from Buddhists of the region, the locals have only grown restive. An agitation demanding the inclusion of the region in the Sixth Schedule under Article 244





of the Constitution (special protection to tribal populations) boiled over last week after Sonam Wangchuk, a Magsaysay winner, went on a fast. Soon after its creation as a UT in August 2019, Ladakh came under a bureaucracy that the local population found to be hostile and irresponsive. The constant tussle between locals, elected representatives of two Hill Councils of Kargil and Leh, and the bureaucracy only widened over the months. Leh's political and religious bodies formed the Leh Apex Body (LAB) in 2020, headed by former BJP leader and former Member of Parliament Thupstan Chhewang (he is also an elected president of the influential Ladakh Buddhist Association). In Kargil district, political parties, including the National Conference and the Congress, and Shia Muslim-affiliated seminaries joined hands in November 2020 to form the Kargil Democratic Alliance (KDA). Kargil, unlike Leh, is for re-joining with the erstwhile J&K State and restoration of its special status under Article 370.

Despite the differences in their political stands, LAB and the KDA are now together over common goals. They have put forth four major demands before the Centre, which include restoration of full-fledged Statehood, constitutional safeguards under the Sixth Schedule, separate Lok Sabha seats for Leh and Kargil districts and job reservation for locals. They describe the demands as key to protecting Ladakh's identity, culture and the fragile environment. The Centre appears to be in a bind as the two committees it appointed to reassure the local populations have made little headway in the last two years. In fact the second committee appointed this year under Minister of State for Home Nityanand Rai has only deepened local anger, as it has no mandate to address the issues being raised. Ladakh witnessed a major military incursion from China in 2020, just 10 months after J&K's special status was scrapped and the erstwhile State divided. That conflict remains unresolved. In the absence of drastic measures to assuage the locals by meeting their genuine demands, the region will only remain embroiled to the advantage of those intent on fomenting trouble.

MAMATA STEPS INTO AMARTYA SEN-VISVA BHARATI ROW: WHAT IS THE LAND DISPUTE

West Bengal Chief Minister Mamata Banerjee on Monday met Nobel laureate Amartya Sen and backed him on his latest tussle with the Visva-Bharati University authorities over a land dispute.

Visiting Sen at his Santiniketan residence 'Pratichi', Banerjee handed over a state land and revenue department record, which states that 1.38 acres of land covered by the economist's ancestral property belongs to him by virtue of a mutation executed in 2006.

The Visva-Bharati University (VBU) had in December 2020 named Sen in a list of illegal occupants on its campus in Santiniketan. Then in January this year, the university and Sen exchanged letters on the issue, after which the CM stepped in.

Banerjee also announced Z+ security for Sen. Without naming the Visva-Bharati's Vice-Chancellor, she strongly criticised him, talking about the "saffronisation" of the university.

"I have been silently watching how an eminent citizen was being insulted all these days. I asked my officers to get the land records. I gave him proof that the land was transferred to his father in 1943. No man in the garb of the Bharatiya Janata Party should insult Amartya Sen. We look at Visva-Bharati through the eyes of Tagore, not through a saffron lens," said Banerjee.

The land dispute

Visva-Bharati recently released a statement saying that "the information and documents shared with Prof Sen vide our letters dated 24-01-2023 and 27-01-2023 make it amply clear that 1.38-





acre land was never leased to late Ashutosh Sen [Amartya's father]. Only 1.25-acre land was leased to late Ashutosh Sen. Following the application dated 31-10-2005 (which was supported by probated will of late Ashutosh Sen and other documents), lease of only 1.25 acre land was mutated in his favour, for the residual period of lease tenure, as permitted by the Executive Council of the University in its meeting dated 03-09-2006."

Amartya Sen's maternal grandfather Kshitimohan Sen, a Sanskrit scholar of repute, was invited to Santiniketan by Rabindranath Tagore in 1908. He played a key role in building the Visva-Bharati — set up in 1921 — along with Tagore. Sen, born in 1933, was named Amartya by Tagore.

Amartya Sen's house in Santiniketan, Pratichi. (Photo: Wikimedia Commons)

On the university campus, plots were given to many eminent persons on a 99-year lease since the time of Tagore. Sen grew up in Pratichi, the house built by his father, and visits it frequently.

Kshitimohan Sen was the second Vice-Chancellor of Visva Bharati. Sen's father, Ashutosh Sen, was a professor at the university, and he purchased sections of the land at the centre of the dispute.

The recent letters from the university

Visva-Bharati authorities on January 24 issued a letter to Sen, asking him to hand over parts of the plot. On January 27, the university issued a second letter with the same demand.

"You are in possession of 1.38 acres of land which is in excess of your legal entitlement of 1.25 acres. Kindly return the land to Visva-Bharati as early as possible since the application of the laws of the land will cause embarrassment to you and also to Visva-Bharati which you endear so much," read the letter dated January 27.

Amartya Sen's reply

Sen wrote to Visva-Bharati V-C Prof Bidyut Chakraborty two days later, saying that his father had purchased the free-hold land from the market and not from Visva-Bharati, and they have been paying taxes for it. He also sent a legal notice to the V-C, asking him to withdraw "your false allegation made to the news agencies that a plot of land owned by Visva-Bharati is unlawfully occupied by me."

He further wrote in the letter, "To measure the area of our homestead, Pratichi, to compare with the long term lease of land taken by my father in 1940 from Visva-Bharati... This sudden abuse of an 80-year-old document is clearly a crude attempt at harassment or worse."

He also said, "Among other errors it ignores the big fact, which I have stated many times (even in the context of this dispute), that a substantial amount of free-hold land was purchased by my father (in the market — not from Visva-Bharati) to add to our homestead on which khajna and Panchayat taxes are paid by me yearly.

The politics around it

When the university first named Sen among illegal occupants in 2020, Mamata had backed the Nobel laureate.

After that, in August 2022, sections of the TMC were unhappy with Sen when he said he would not be able to accept the state government's Banga Bibhusan award because he was out of the country, but accepted the Muzaffar Ahmad Memorial Prize at a CPM event weeks later.





However, this year, the party warmed up to him again after Sen said Banerjee had the ability to become India's next Prime Minister. Soon after Sen's interview, Banerjee, speaking to a news channel, responded, "Amartya Sen is a world-renowned intellectual. His insights show us the path. His advice is an order for us. His evaluation of the present situation of the country should be taken seriously by everyone."

Just after Sen's statement on Banerjee, the land dispute row flared up again, and the TMC claimed this was because "Sen became an enemy of the University as he praised Banerjee".

The CM's nephew and TMC General Secretary Abhishek Banerjee said, "The statement made by the Vice-Chancellor of Visva Bharati is extremely unfortunate. The main reason behind the move was that Amartya Sen had praised CM Mamata Banerjee. BJP leaders cannot accept this, which is why they are targeting him."

TAMIL NADU'S PROPOSED PEN MONUMENT TO KARUNANIDHI'S MEMORY — THE PLAN AND THE CRITICISM

An environmental impact assessment done by the Tamil Nadu Pollution Control Board has said there are no sensitive marine flora and fauna species such as coral reefs, sea grass, or Olive Ridley turtles near the proposed monument.

A planned offshore memorial to the late DMK patriarch M Karunanidhi was opposed by representatives of some opposition parties and fishermen's and environmental groups on grounds of environmental damage and loss of livelihoods in Chennai this week, and the leader of a Tamil nationalist party threatened to break the installation if it was built.

The proposed 'Muthamizh Arignar Dr Kalaignar Pen Monument' off Marina

beach falls under Coastal Regulation Zones (CRZ) IA, II, and IVA, and requires clearance under Section 4(ii)(j) of the Union Environment Ministry's Coastal Regulation Zone Notification, 2011 (amended up to March 22, 2016).

The Rs 81-crore 'Pen Monument', standing in the Bay of Bengal 360 m from the coast, was proposed by the government last year, and is expected to become a Chennai landmark on completion.

It has been planned as a representation of Tamil culture and architecture, and will incorporate regional motifs, architecture, and designs with Tamil heritage elements.

The Memorial

The Pen Memorial pays tribute to Karunanidhi, one of the most influential figures in Tamil Nadu and Dravidian politics who, apart from being president of the DMK from 1969 to 2018 and Chief Minister of Tamil Nadu for five terms between 1969 and 2011, made significant contributions to Tamil literature as an orator, poet, and writer of non-fiction and fiction, plays, and films.

The memorial in the shape of a pen represents his many contributions to Iyal (poetry and literature), Isai (music), and Naadagam (theatre), the three fundamental pillars of both ancient and contemporary Thamizh, or Tamil, according to an official document.

Karunanidhi, the document says, ruled Tamil hearts and developed into a mass leader using the pen, a "symbol of [his] greatest talent and prowess".





The design of the monument is based on the Veena, a traditional Carnatic music instrument that is handmade in Tamil Nadu with extreme precision, the document says. The Thumba is used to represent the pen pedestal, the neck portion the long bridges, the music hole a pen statue, and the peg the tensile canopy seating on the bridge.

The frets are used to represent the distance between the bridge's columns, and the strings are used to represent the Meru or Kudira, according to the project document.

The design for the landscaped garden on the memorial pedestal is inspired by Sikku Kolam, a traditional drawing made by Tamil women in their homes, in which a geometric shape is created using dots and circles. Locally procured granite will be used for the memorial, the project document says.

The Access Bridge

The idea of a monument on water derives from the metaphorical catamaran to which Karunanidhi compared himself. The monument will be 42 metres tall and 2.60 metres in diameter, and will be accessible by a lattice bridge from the existing Karunanidhi memorial on Marina beach.

Two hundred and ninety metres of the 650-metre bridge will be above land (the Marina seashore), the remaining portion will be above water. There will be wave patterns on the parapet walls of the bridge.

The floor of the bridge will be made of non-slip material such as rough semi-polished granite to make walking safe even in the rainy season. Other proposed safety features include a public address system, emergency exits at strategic locations, life rafts and lifeboats, at least two buggies on site to support the elderly and special-needs visitors, and a display of meteorological information and warnings at the entrance.

PUBLISH UNDERTAKING ON PRIVACY POLICY IN PAPERS: SC TO WHATSAPP

Online instant messaging platform WhatsApp in the Supreme Court on Wednesday agreed to undertake that it will not limit the access of users who have not agreed to its 2021 privacy policy.

A Constitution Bench led by Justice K.M. Joseph directed WhatsApp, appearing through senior advocate Kapil Sibal, to publish its undertaking in full-page advertisements on two occasions in five national newspapers.

The court agreed with WhatsApp's submission that it would abide by an undertaking given in a letter to the government on May 22, 2021.

WhatsApp, in the letter, had said it would "not limit the functionality of how WhatsApp works in the coming weeks as previously planned. We will continue to display our update from time to time to people who have not yet accepted. In addition we will display the update whenever a user chooses relevant option features... We hope this approach reinforces the choice that people have in how they use WhatsApp. We will maintain this approach till the forthcoming Data Protection Bill comes into existence."

The court said the undertaking given in the 2021 letter would be complied with until the next date of hearing on April 11.





The government has submitted in court that it intended to introduce a new digital data protection Bill in the latter half of the Budget Session. It has urged the court to wait and see if the Bill passed muster in Parliament and be made into a law.

The court is hearing a batch of petitions challenging WhatsApp's policy to share users' data with Facebook group of companies.

CENTRE SETS UP THREE GRIEVANCE COMMITTEES TO TAKE UP USER COMPLAINTS AGAINST SOCIAL MEDIA PLATFORMS

According to the notification, issued late Friday night, each of the three grievances appellate committees (GACs) will have a chairperson, two whole-time members from different government entities and retired senior executives from the industry for a term of three years from the date of assumption of office.

The Union government has notified the formation of three grievance appellate committees that will address user complaints against social media and other internet-based platforms. These panels will also be empowered to oversee and revoke content moderation-related decisions taken by these platforms.

According to the notification, issued late Friday night, each of the three grievances appellate committees (GACs) will have a chairperson, two whole-time members from different government entities and retired senior executives from the industry for a term of three years from the date of assumption of office. The proposal has previously drawn criticism over fears that government appointed panels will be able to dictate content-moderation decisions taken by social media firms.

The first panel will be chaired by the chief executive officer of the Indian Cyber Crime Coordination Centre under the Ministry of Home Affairs. Retired Indian Police Service (IPS) officer Ashutosh Shukla and Punjab National Bank's (PNB) former chief general manager and chief information officer Sunil Soni have been appointed as the whole-time members of the panel.

The second panel will be chaired by the joint secretary in charge of the Policy and Administration Division in the Ministry of Information and Broadcasting. Indian Navy's retired Commodore Sunil Kumar Gupta and Kavindra Sharma, the former vice-president (consulting) of L&T Infotech, have been appointed as the whole-time members of this panel.

The third panel will be chaired by Kavita Bhatia, a senior scientist at the Ministry of Electronics and IT. Former traffic service officer of the Indian Railways Sanjay Goel and former managing director and chief executive officer of IDBI Intech Krishnagiri Ragothamarao have been appointed as the whole-time members of the third panel.

Minister of State for Electronics and IT Rajeev Chandrasekhar told The Sunday Express that the disputes the GACs will deal with are under two categories: "One is violation of law and rights of users including the right to free speech and privacy, and two, if there is any contractual dispute between a platform's community guidelines and a user."

"We will give the GACs around 30 days before they can start dealing with users' appeals so that all platforms can start logging their grievances and responding to 100 per cent of the complaints that users raise, so that when there is an appeal that is filed by a user with the GACs, they can easily search for it and resolve it," Chandrasekhar added.





Asked how the three GACs will segregate the complaints among each other, Chandrasekhar said that they will have to figure this out going forward. "Whether it would depend on volume of complaints or subject wise distribution. For example, on issues related to national security, it is best to have a GAC where there is Home Ministry representation or at least people with a capability to understand and deal with such issues. If it's an issue related to child sexual abuse material, it is better to get in women and child development experts, or officials from the National Commission for Protection of Child Rights (NCPCR)," he said.

According to sources at the IT Ministry, the GACs will act also act as a layer of a tech-sector regulator that the ministry is expected to prescribe under the upcoming Digital India Bill, which is the successor to the Information Technology Act, 2000.

In October last year, the government notified that it will start the process of selecting GACs amid criticism from civil society activists who had raised concerns about the government's involvement in the appeals process, and even as the government had initially said that it would be open to social media companies setting up a self regulatory body among themselves provided that the government found the body's functioning satisfactory.

What the changes essentially mean is that in case a user is not satisfied with the content moderation decision taken by a social company's grievance officer, they can appeal that decision before the proposed government-appointed appeals committee. The government's initial proposal had stemmed from users' complaints about being deplatformed, or being removed from a social media site, without companies giving them an adequate avenue of hearing.

GACs can also seek assistance from people who may have adequate expertise and experience in a subject matter while dealing with users' appeals. The GACs will adopt an "online dispute resolution mechanism" where the entire appeal process, from its filing to the final decision, will be done online. Social media companies will also have to compile every order passed by the GACs and report them on their respective websites.

Any person aggrieved by a decision of the grievance officer of a social media intermediary will be allowed to file an appeal to the GAC within a period of thirty days. The GAC will have to deal with the appeal and resolve it within a month of the receipt of the appeal.

The government's proposal to oversee content moderation and user grievance decisions taken by social media platforms had drawn the ire of civil society activists. For instance, the Delhi-based digital rights group Internet Freedom Foundation, in a submission to MeitY in July, had said that the provision could "make the Central Government (rather than an independent judicial or a regulatory body) the arbiter of permissible speech on the internet. It would incentivise social media platforms to suppress any speech that may not be palatable to the government, public officials or those who can exert political pressure".

The government had previously kept the option open for social media platforms to create a self regulatory body to handle user grievances, provided that the companies could prove their system was effective. Social media companies, along with industry body Internet and Mobile Association of India (IAMAI), had chalked up contours of a self-regulatory mechanism in response to that. However, The Indian Express had earlier reported that while firms like Meta and Twitter had supported the self regulatory body, Snap and Google had opposed certain contours of it, flagging concerns over the potential inability to legally challenge any final content moderation decisions of a self-governing body, in addition to the difference in the moderation policies of different platforms.





WELFARE SCHEMES WILL FALTER IN THE ABSENCE OF ACCURATE POPULATION DATA

The Census is necessary since it forms the basis of all the plans and programmes that the government wants to implement. Postponing the Census has immediate and long-term negative consequences for India. The government should take urgent steps to conduct the Census

India aspires to be a \$10 trillion economy by 2035. To achieve this, conducting population Census, due in 2021 but postponed indefinitely because of Covid, is necessary. Census data is essential for planning at the village or block level to usher in economic and social development, ensure better governance, and increase the transparency of public schemes and programmes.

There are many reasons why conducting a Census has become a prerequisite for economic development. At present, the biggest challenge facing demographers, planners, and other stakeholders is how to estimate the district population — the district is the basic administrative unit for governing, planning, and executing government projects and schemes. In the absence of updated Census data, demographers estimate the annual population count at the district level using past Census information for the intercensal or postcensal period. Say, to estimate the population of a district in India in the year 2015, they use the district-level population growth rate between the 2001 and 2011 Census. Such demographic exercises give reasonably fair estimates when the year of population estimation is within the range of a maximum of 10 years. Beyond this period, estimations can be erroneous, particularly at the district level due to dynamic patterns of population components, among them fertility, mortality and migration. Many districts of India are experiencing a faster demographic transition with varying fertility and mortality rates. So using the growth rate of 2001-2011 for the period after 2021 becomes more of an assumption-based model than a model that reflects empirical reality. Covid-19 further makes the situation complex as it impacts the fertility and mortality situation in the country. Since many states (and districts) lack a complete civil registration system with a full count of birth and death data, demographers face enormous challenges in providing population counts at the district level. For the above reasons, in several instances, estimates tend to be far off the mark, especially for newly formed districts and states.

Second, migration data collected in the Census has great implications for economic activities and social harmony. As India progresses economically, the pattern of migration within the country, within states as well as outside the country has been changing in unprecedented ways. For instance, even in smaller towns and cities, job patterns have changed. The migration pattern in India in the present decade is very different from what the data in Census 2001 and 2011 suggest. Hence, in the absence of Census data, it is difficult to draw conclusions about migration in India.

Third, the Census counts everyone across regions, classes, creeds, religions, languages, castes, marital status, differently-abled populations, occupation patterns etc. Most national-level surveys such as NFHS and NSSO do not have representative data at the population subgroup level, unlike the Census. The existence of numerous faiths and languages as well as the expansion or extinction of such communities will be known only via population Census.

India has a long history of conducting Census without interruption from 1881 with the rare exception of Assam in 1981 and Jammu Kashmir in 1991 due to sociopolitical unrest and secessionist movements. A regular Census at the national and sub-national levels has been a matter of pride for India. It has to be continued until India achieves a fool-proof civil registration system and a dynamic National Population Register.

3RD FLOOR AND 4TH FLOOR SHATABDI TOWER, SAKCHI, JAMSHEDPUR

Telegram: http://t.me/DreamIAS Jamshedpur





Conducting the population Census is a mammoth task, of course. Full involvement of the government system is necessary to organise it. But the Census is necessary since it forms the basis of all the plans and programmes that the government wants to implement. Postponing the Census has immediate and long-term negative consequences for India. The government and other stakeholders should take urgent steps to conduct the Census as early as possible.

POST-COVID, READING ABILITY OF STUDENTS WORSENED MORE THAN MATH SKILLS

The Data Point published on January 23 showed that the math skills of rural schoolchildren in the southern and western States were impacted most due to COVID-19. However, further reading of the Annual Status of Education Report (2022), based on which the story was written, shows that the reading abilities of rural schoolchildren were impacted even more than math skills.

In 15 of the 27 States for which relevant data were available, the share of students in Class VIII who could carry out division problems decreased in 2022 compared to 2018. In 19 States, the share of them who could read Standard II-level text decreased in 2022 compared to 2018. Thus, the adverse impact of COVID-19 on reading abilities was seen in more States.

Moreover, the decline in the share of students who could read such texts was steep in most States. Across India, the share of Class VIII students who could read Standard II-level text decreased by 3.5% points in 2022 compared to 2018, whereas those who could solve division problems in fact increased by 0.6% points.

AISHE REPORT SHOWS THAT THE PANDEMIC THREATENS TO UNDO GENDER PARITY GAINS IN HIGHER EDUCATION

The Covid-19 pandemic seems to have made the road to gender equality rockier than before. Reports have documented that the economic blow of the public health emergency has fallen disproportionately hard on women — men had more job security, and could negotiate higher wages, compared to women during the crisis years. Now the All India Survey of Higher Education (AISHE) for 2020-21 has revealed that crucial gains made in closing the gender gap in undergraduate programmes suffered a setback during the pandemic. In classrooms where men were already in majority — computer science, business administration, pharmacy, technology and law courses, for instance — the number of women has gone down further. And in fields of study where the gender gap had, by and large, been plugged — medicine and commerce — the reverses are significant. The gender ratio in the B.Com course is down to 2016 levels.

Cultural notions about careers appropriate for women have traditionally held back their mobility. However, the spurt in aspirations in recent years exercised a steady influence on the gender composition of classrooms. In 2014, for instance, for every 100 male students enrolled in undergraduate commerce programmes, there were 90 female students. This gap was plugged in 2019. In MBBS and B.Sc programmes, the skew was addressed a year earlier. The Covid-related setback to gender equality in college and university classrooms is in contrast to developments in school education. The ASER report, released two weeks ago, shows that exigencies of the pandemic have not diminished parents' keenness to get their daughters enrolled in schools. However, in a society where women's education still does not receive adequate importance and the burden of caring for the family falls disproportionately on them, the effect of the crisis on higher education is telling.





In the wake of the pandemic, the government was quick to respond to several welfare and equity-related issues. Relief packages under PMJDY and Pradhan Mantri Garib Kalyan Rozgar Abhiyaan — ASHA workers were brought under this package — were announced within days of the lockdown. The SVANIDHI scheme was launched for street vendors, a large percentage of whom are women. But the skew in classrooms threatens grim implications for women's empowerment, which, in turn, could have a bearing on the nutrition, health and education of future generations. The Centre, state governments and educational institutions must find ways to enable women to return to institutions of higher education. In the short term, this could mean increasing the outlay for scholarships and creating more dorms and hostels. In the long run, this should mean catalysing processes of social change that enable half of the country's population to attain its aspirations.

COMMAND POSTINGS FOR WOMEN OFFICERS IN THE ARMY

The story so far:

The Army has stated that the process for selection of women officers to command assignments in the rank of Colonel, a major step towards bringing them at par with their male counterparts, has been conducted. This flows from the Supreme Court judgment of 2020 upholding an earlier judgment granting permanent commission (PC) as well as command postings to women officers in all arms and services other than combat.

What is the process?

The Army has conducted a Women Officers Special No 3 Selection Board from January 9 to 22 for promotion from the rank of Lieutenant Colonel to Colonel. A total of 244 women officers are considered for promotion. This is against the 108 vacancies released by the government to promote the affected women officers who are from various Arms and Services which include engineers, signals, Army Air Defence, Intelligence Corps, Army Service Corps, Army Ordnance Corps and electrical and mechanical engineers.

Based on the selection by the board, the first set of such postings will be issued by the end of January 2023. Following judicial intervention, the Army has granted PC to women officers at par with their male counterparts in all Arms and Services other than combat arms which are infantry, mechanised infantry and armoured.

Additionally, Army Chief General Manoj Pande announced that women officers would soon be inducted into the Corps of Artillery as well.

What do command postings mean?

Apart from medical and dental streams, since 2008 the Army had granted PC for women officers in the Education Corps and Judge Advocate General (JAG) branches where they already go to the rank of Colonel. However, they are largely administrative appointments unlike the regular arms and services where Colonels command officers and men and lead them from the front. A Commanding Officer (CO) is a very coveted position in the Army and therein lies its significance in it being opened up for women. In the past, women were recruited in various arms and services only as short service commissions, which meant they would have to leave service after 14 years, much short of the pensionable service of 20 years. In a landmark judgment in the Babita Puniya case in February 2020, the Supreme Court directed that women officers in the Army be granted PC as well as command postings in all services other than combat. Further, on March 25, 2021 the Supreme Court in Lt. Col. Nitisha versus Union of India held that the Army's selective evaluation





process discriminated against and disproportionately affected women officers seeking PC. With reduction in the age profile of COs over the years, an officer now becomes a Colonel after about 16-18 years of service.

What is the way forward?

All women officers who were granted PC are undergoing special training courses and assignments to empower them for higher leadership roles. For the first time last year, five Women Officers (WOs) have cleared the Defence Services Staff Course and Defence Services Technical Staff Course Exam, which is held annually in the month of September. The five WOs will undergo a one year course which will give them adequate weightage while being considered for command appointments. These developments will allow women officers to assume challenging leadership roles, akin to their male counterparts, and also to go further up the rank structure. Women are being inducted in the ranks of sailors by the Navy under the Agnipath scheme and will soon be deployed onboard warships while the Army has inducted women as soldiers in the Corps of Military Police.

SHORTFALL OF SPECIALIST DOCTORS IN RURAL AREAS WAS 80% IN 2022

The shortfall of specialist doctors in community healthcare centres (CHCs) in rural areas has increased over the past decade in India. Surgeons, obstetricians, gynaecologists, physicians and paediatricians were considered specialists for this analysis. In 2012, the shortfall of specialists was already high at 69.7%, but it increased further to 79.5% in 2022.

As per the norms of the Indian Public Health Standards, a CHC is required to be manned by four medical specialists: surgeon, physician, obstetrician/gynaecologist, and paediatrician. As on March 31, 2022, according to the 2021-22 Rural Health Statistics, released recently, 21,920 specialist doctors were required in rural areas across India. However, only 4,485 were available, which means that there was a shortfall of 17,435 specialists. This translates into a shortfall of 79.5% (17,435 as a percentage of 21,920), which is nearly 10% points more than a decade ago (Chart 1). The shortfall of obstetricians/gynaecologists was 74.2% in 2022, which is a 9.1% point increase from a decade ago. The shortfall of surgeons was 83.2% in 2022, a 8.3% point increase from 10 years ago.

There was a shortfall of specialists in urban CHCs too, but this was far lower than the shortfall in rural CHCs. In urban CHCs, there was a 46.9% shortfall in 2022, which is 32.6% points less than the shortfall in rural CHCs. Therefore, the crisis was more acute in rural areas.

While these numbers show a shortfall of specialists, it is important to understand that the calculation is done with the assumption that there should be four specialists in every CHC. This is crucial because a State with a lower number of CHCs than what is required can escape scrutiny when it comes to the shortfall of specialists, as the number of such doctors required is low to start with. So, it becomes important to analyse the number of CHCs in each State.

'OUT-OF-POCKET HEALTH SPENDING STILL HIGH, DESPITE GOVT. CHIPPING IN'

Almost half of all health spending in India is still paid by patients themselves directly at the point of treatment, though out-of-pocket expenditure has dropped as the government's share of spending on health went up significantly after 2013-14, the Economic Survey 2022-23 says.





The share of government in the total health expenditure was just 28.6% in the financial year 2013-14, but rose to 40.6% by 2018-19, the latest year for which data are available. There was a concomitant decline in out-of-pocket expenditure from 64.2% in 2013-14 to 48.2% in 2018-19.

Out-of-pocket expenditure is the money paid by households at the point of receiving health care. This occurs when services are neither provided free of cost through a government health facility, nor is the individual covered under any public or private insurance or social protection scheme.

Govt. hikes spending

For 2018-19, India's total health expenditure was estimated at ₹5,96,440 crore, which is 3.2% of the GDP and ₹4,470 per capita. This includes current and capital expenditures incurred by the government and private sources, including external funds. Government health expenditure for that year amounted to 40.6% of the total, while out-of-pocket expenditure remained marginally higher at 48.2%. In States such as Uttar Pradesh, the out-of-pocket estimates were as high as 71.3%.

It has been recommended several times that government's health expenditure be raised from the existing 1.2% to 2.5% of the GDP by 2025. The Survey states that Central and State governments' budgeted expenditure on the health sector reached 2.1% of the GDP in the Budget estimates for 2022-23 and 2.2% in the revised estimates for 2021-22, an increase from 1.6% in 2020-21.

Falling short

Under the Health Ministry's largest cashless health insurance scheme — the Ayushman Bharat Jan Arogya Yojana — approximately 21.9 crore beneficiaries have been verified, including 3 crore beneficiaries verified using State IT systems. This is less than 50% of the targeted approximately 50 crore beneficiaries under the scheme. "As of January 4, approximately 4.3 crore hospital admissions, amounting to ₹50,409 crore, have also been authorised under the scheme through a network of over 26,055 hospitals," the Survey added.

DOMESTIC GOAT AS A DRUG FACTORY

The domestic goat (Capra hircus) is a familiar presence in the rural landscape of India and in many developing countries. The goat has played an important economic role in human communities from the time it was domesticated about 10,000 years ago. It has even been argued that the domestication of goats was an important step in mankind's shift from a hunting-gathering lifestyle to agricultural settlements.

The Food and Agriculture Organisation (FAO) estimates that the world has 830 million goats belonging to about 1,000 breeds. India has 150 million from over 20 prominent breeds. Rajasthan has the most number of goats — the Marwari goat found here is hardy and well-adapted to the climate of deserts. Another hardy breed, found in the dry regions of Maharashtra, Telangana and North Karnataka is the Osmanabadi.

The Malabari (also called Tellicherry) of North Kerala is a prolific breed with low-fat meat, and shares these traits with the beetal goat of Punjab.

The east Indian Black Bengal goat is a vital contributor to the livelihoods of the rural poor of Bangladesh. It contributes over 20 million square feet of skin and hides to the world's demands





for leather goods, from firefighters' gloves to fashionable handbags. As many farmers lack the space or funds to rear cattle, the goat is rightly called "the poor man's cow".

Indian highlands have scant populations of wild goats, from which domestic goats or sheep have evolved. These include the markhor and the Himalayan and Nilgiri tahr.

Genes from Indian goat breeds spread to all parts of the world during the golden age of steamships. Goats laden on ships heading to Europe from India provided milk and meat on the months-long journey. The Jamunapari goats of Uttar Pradesh were favoured as they yield 300 kg of milk during eight months of lactation. Once in England, the Jamunapari was bred with local breeds to produce the Anglo-Nubian, a champion producer of high-fat milk.

Producing therapeutics

With a generation time of about two years, and plenty of milk production, it is not surprising that goats have attracted the attention of biotechnology companies wishing to produce therapeutic proteins in bulk.

The first success came with ATryn, the trade name for a goat-produced antithrombin III molecule. Antithrombin keeps the blood free from clots, and its deficiency (usually inherited) can lead to serious complications such as pulmonary embolisms. Affected individuals need antithrombin injections twice a week, usually purified from donated blood.

Transgenic goats carrying a copy of the human antithrombin gene have cells in their mammary glands that release this protein into milk. It has been claimed that one goat could produce antithrombin equivalent to what was obtained from 90,000 units of human blood.

Recently, the monoclonal antibody cetuximab, which has been approved by the FDA as an anticancer drug against certain lung cancers, has also been produced in cloned goat lines. Large quantities can be made this way (10 grams per litre of milk). It is not yet known whether this 'Farmaceutical' will clear regulatory hurdles regarding safety and efficacy. Will other monoclonal antibodies be produced some day in large quantities using goats as drug factories?

NIMHANS DEVELOPS WORKPLACE STRESS TEST: WHY YOU NEED TO TAKE IT FOR YOUR HEART HEALTH

NIMHANS researchers develop a tool to map the mental health of employees and help companies ease the work environment. 'Measuring stress is important because long-term stress has been linked to an increased risk of heart diseases and other non-communicable diseases,' says Dr Gautham M S, additional professor in the department of epidemiology.

Has your work been stressing you out? Is it leading to symptoms like irritability and disturbed sleep? Will it impact your health in the long run? You will find your answers in a colour-coded, 16-question tool that has been developed by researchers from the National Institute of Mental Health and Neurological Sciences (NIMHANS). It measures work stress and helps employers build a conducive work environment.

Not only that, the questionnaire –to be anonymously filled by employees – can inform employers which departments are the most stressed out and why.

"The employees will get a score after assessment depending on the demands made by the organisation, their ability to cope with it, and physical manifestation, if any, of this stress. This 3RD FLOOR AND 4TH FLOOR SHATABDI TOWER, SAKCHI, JAMSHEDPUR





score will be colour-coded green, yellow, and red. People in the green category are those who report little or no stress and have no symptoms – for them, only follow-ups are suggested. Those in the yellow category need repeated counselling. And, those in the red category should immediately be screened for non-communicable diseases in addition," says Dr Gautham M S, the corresponding author of the validation study for the tool, which was recently published in the PLOS One journal, and additional professor in the department of epidemiology at NIMHANS.

In addition, he says, employers will know where to make investments to get the best returns because the employees have already stated the reasons for their stress like excessive workload, less pay and lack of job security. And, if the assessment is made a part of annual health check-ups of employees, companies can measure how much their interventions have made a difference.

Called TAWS-16, the tool combines employees' exposure to work-related stressors, their coping abilities to these stressors and their experience of psychosomatic symptoms. The three attributes are judged by questions on whether employees face a heavy workload constantly, are they required to multitask, whether they find the working conditions comfortable, whether they feel supported by seniors, and whether they experience symptoms like excessive tiredness, lack of energy, lack of motivation, frequent fights with colleagues, and disturbed sleep among others.

Dr Gautham says that this is the first tool designed to assess work stress that can be directly attributable to the employers. "Stress can be due to several reasons such as domestic situations. Existing tools cannot delineate between work stress and stress caused by other reasons. This tool, we have shown, can accurately measure work-related stress," he explains. He also believes that while some stress is important in a competitive job scenario, trouble erupts if it lasts over a long period and the employee does not have a coping mechanism. This is the reason TAWS-16 looks at whether these complaints and symptoms have persisted over a period of six months.

The 16 questions take about 10 minutes to answer and a web application for the same has also been developed by the institute. The tool is available in six to seven languages and NIMHANS is in the process of using it to test professionals in different fields like IT, public health, textile and other sectors and re-assess its reliability.

Why should companies be worried about stress? Dr Gautham says that excessive work stress can increase burnout, absenteeism and presenteeism (being present at work but not performing the job role) leading to a loss of productivity for companies. As for workers, measuring stress is important because long-term stress has been linked to an increased risk of heart diseases and other non-communicable diseases.

The tool was developed by the researchers from NIMHANS keeping in mind the changing disease profile of India. "Exposure-related diseases like silicosis and asbestosis have reduced over the years among employees with government laws and regulations. However, there is an increase in non-communicable disease in the general population and consequently the workforce. So, we need more regulations to ensure protection against stress that is a public health risk factor," he adds.

RESEARCHERS OFFER TIPS TO SAVE KERALA'S SINKING ISLAND

A study conducted by the National Centre for Earth Science Studies (NCESS) has revealed anthropogenic interventions as the main reason for the plight of Munroe Thuruthu residents,





Kerala's first set of climate refugees. The islanders are facing steady land subsidence, tidal flooding and lower agricultural productivity, all of which have triggered a mass exodus from the region.

The study by the research organisation proposes reverse landscaping, a plan integrating all aspects of earth and social sciences, to retrieve the landscape's original geomorphic state. Since Ashtamudi Lake is emerging as an important tourist destination, the study stresses for sustainable management plans to protect the Ramsar-listed wetland. Apart from strict regulatory measures to control sand mining from Ashtamudi Lake and the Kallada river, the current construction methods on the island should be replaced with well-studied engineering techniques.

NOBLE'S HELEN: ARUNACHAL YIELDS INDIA'S NEWEST BUTTERFLY

Three butterfly enthusiasts — Atanu Bose, Loren Sonowal and Monsoon Jyoti Gogoi — recorded the "extremely rare" Noble's Helen (Papilio noblei) from three locations in the Namdapha National Park of Arunachal Pradesh in the year to September 2021.

Their report was published in the latest edition of the Journal of Entomology and Zoology Studies.

The Noble's Helen, closest to Papilio antonio from the Philippines and characterised by a large dorsal white spot, was once common in the montane forest at moderate elevations in northern Thailand. This species of swallowtail butterfly has also been reported from the Myanmar, Yunnan and Hubai regions of China, Laos, Cambodia and Vietnam. "The species has not disappeared from Thailand but is now known to be very rare in the ranges it was previously recorded. The recording of Noble's Helen for the first time in India is encouraging for nature lovers," Mr. Bose told The Hindu.

Butterflies are considered vital indicators of the state of biodiversity and key ecosystem functions.

The trio of Mr. Bose, Mr. Sonowal and Mr. Gogoi photographed Noble's Helen live from 19th Mile, Lunkai Nala, and near Deban Camp within the 1,985-sq.km Namdapha, also India's easternmost tiger reserve.

The locations are approximately 80 km aerially from Putao of Myanmar's Kachin State, where this species of swallowtail butterfly was last recorded in April 1999.

Mr. Sonowal said Noble's Helen with a wingspan of 100-120 mm was initially thought to be an aberration of Papilio helenus, though the former has an extra white spot in the dorsum of the forewing. A closer study showed Papilio noblei sports a consistent white spot and has a complete row of red lunules on the underside of the hind wing and discal white areas on the upper side.

CITES DATABASE REVEALS RED SANDERS SMUGGLING

The CITES trade database has recorded 28 incidents of red sanders confiscation, seizure and specimens from the wild being exported from India, a fact sheet prepared by TRAFFIC, a global wildlife trade monitoring organisation has revealed. CITES (Convention on International Trade in Endangered Species of Wild Fauna and Flora) is an international agreement between governments, whose aim is to ensure that international trade in wild animals and plants does not threaten the survival of the species.

"These consignments were exported to China (53.5%), Hong Kong (25.0%), Singapore (17.8%) and the United States of America (3.5%) from 2016 to 2020," the fact sheet said. Red Sanders





(Pterocarpus santalinus), or red sandalwood, is an endemic tree species with distribution restricted to the Eastern Ghats of India. The species found in Andhra Pradesh and growing up to a height of 10 to 15 metres is reported to be one of India's most exploited tree species, and is under severe pressure from illegal logging and harvesting. Under the foreign trade policy of India, the import of Red Sanders is prohibited, while export is restricted.

"India reported an export of more than 19,049 tonnes of logs. In comparison, the importing countries reported about 4,610 tonnes of logs, 127 tonnes of sawn wood, 20 tonnes of transformed wood and 980 kg of wood products, clearly indicating a discrepancy in reporting of red sanders trade," the fact sheet said.

China remains the largest importer with more than 13,618 tonnes of the products, followed by Hong Kong (5,215 tonnes) and Singapore (216 tonnes).

"Red sanders is under severe pressure from illegal logging and harvesting. Its heartwood is in demand in both domestic and international markets and is used to make furniture and handicrafts, while the red dye obtained from the wood is used as a colouring agent in textiles and medicines. Rampant illegal logging has been reported across its range State," Merwyn Fernandes, coordinator of TRAFFIC's India office, said.

Listed under Schedule IV of the Wildlife Protection Act and categorised as endangered as per the IUCN Red List, red sanders is a very slow-growing tree species that attains maturity in natural forests after 25-40 years.

"Enforcement agencies such as the Forest Department, Customs, Railways, Police, DRI (Directorate of Revenue Intelligence), and Coast Guard must coordinate efforts to curb Red Sanders trafficking by sharing information on hotspots and transit routes and real-time intelligence," TRAFFIC has said. It has also called for forests within the species' geographical range to be declared as "high conservation areas".

90 FOSSIL NESTS BELONGING TO INDIA'S LARGEST DINOSAURS UNCOVERED

Researchers have uncovered 92 nesting sites containing a total of 256 fossil eggs in central India's Narmada Valley belonging to titanosaurs, which were among the largest dinosaurs to have ever lived.

The finding, published in the journal PLOS ONE, reveals intimate details about the lives of titanosaurs in the Indian subcontinent.

The Lameta Formation, located in the Narmada Valley, is well-known for fossils of dinosaur skeletons and eggs of the Late Cretaceous Period that lasted from about 145 to 66 million years ago, the researchers said.

Detailed examination of these nests allowed researchers at the University of Delhi, New Delhi and colleagues to make inferences about the life habits of these dinosaurs.

Diverse titanosaurs

They identified six different egg species, suggesting a higher diversity of titanosaurs than what is represented by the skeletal remains from this region.





Based on the layout of the nests, the team inferred that these dinosaurs buried their eggs in shallow pits like modern-day crocodiles.

Certain pathologies found in the eggs, such as a rare case of "egg-in-egg", indicate that titanosaur sauropods had a reproductive physiology that parallels that of birds and possibly laid their eggs in a sequential manner as seen in modern birds.

The presence of many nests in the same area suggests that these dinosaurs exhibited colonial nesting behaviour like modern birds.

On their own

However, the close spacing of the nests left little room for adult dinosaurs, supporting the idea that adults left the hatchlings (newborns) to fend for themselves.

These fossil nests provide a wealth of data about some of the largest dinosaurs in history, and they come from a time shortly before the age of dinosaurs came to an end, the researchers said.

The findings contribute significantly to paleontologists' understanding of how dinosaurs lived and evolved, they added.

SEA WINDS ERODE SUNDARBANS TEMPLE

To prevent corrosion of the 11th century terracotta temple, the ASI plans to replace damaged bricks and plant trees as a protective barrier

An ancient terracotta temple in West Bengal's Sundarbans, which has survived the ravages of time for a millennia, is now facing a very modern threat.

The impact of climate change, especially the increase in air salinity, is gradually eroding the outer wall of Jatar Deul, an 11th century Shiva temple, which is located at Raidighi in South 24 Parganas, only a few kilometres from the sea.

"For the past several years, we have noticed that the outer brick wall of the temple is getting eroded, with the edge of bricks suffering steady corrosion. We have deduced that this is due to increase in air salinity," Shubha Majumder, Superintending Archaeologist, Kolkata Circle, ASI, told The Hindu. The ASI plans to carry out restoration and conservation work at the temple later this year. "We are going to remove the damaged bricks and replace them with new bricks of similar size," he said.

While the temple is 98 feet high, the archaeologist said the erosion is particularly seen in the bricks on the outer wall up to a height of 15 feet. "The temple stands on a vacant site. There are some trees to provide a barrier to coastal winds, particularly on the upper part of the temple, and that can be the reason that erosion is less on the upper side of the temple," Dr. Majumder said.

Amphan, the tropical cyclone that ravaged coastal West Bengal, particularly the Sundarbans, in May 2020, had destroyed three trees at Jatar Deul, further exposing the temple to the gusty salt-laden coastal winds.

The archaeologist said that along with the restoration of the structure, the ASI has also planted trees at the site so that they can serve as a barrier to the temple.





The ASI website states that Jatar Deul is traditionally connected to an inscription, no longer traceable, by one Raja Jayantachandra, purported to have been issued in 975 AD. The Archaeological Survey of India website says that the temple is datable to the 10th or 11th century AD on the basis of its architecture.

Sharmila Saha, an expert on West Bengal temples, disagrees with the dating estimate, saying that the temple was more likely to have been built around the beginning of the 13th century based on its architectural features.

However, she agreed that the temple was facing erosion because of air salinity. "The base of the temple has suffered damage because of hydraulic action or air salinity. At the upper level of the temple, these climatic factors will take more time to have an impact," she said.

Dr. Saha who has a Ph.D on the Bishnupur temples of West Bengal, pointed out that an early brick temple at Mandirtala in Sagar Island — not far from Jatar Deul — had been completely destroyed because of the hostile climate.

She explained that stone temples located along the coast — such as the famed Konark temple of Odisha — are less affected by salinity since the porosity of stone is far less than that of brick.

Jatar Deul is the tallest standing temple in the Sundarbans on the bank of the river Moni, said Dr. Saha. "The temple has a curvilinear tower similar to temple architecture of the Nagara order of Odisha temples," she added.







BUSINESS & ECONOMICS

KEY TAKEAWAYS FROM IMF'S LATEST WORLD ECONOMIC OUTLOOK UPDATE

India will remain the world's fastest growing major economy both in 2023 as well as 2024, even as worries of a global recession dissipate.

In its January update of the World Economic Outlook (WEO) report, the IMF has marginally improved the forecast for global growth in 2023 — a relief, given the fears of a global recession in 2023. The turnaround reflects "positive surprises and greater-than-expected resilience in numerous economies".

The IMF releases the WEO twice every year, in April and October, apart from updating it twice — in January and July.

Here are three key takeaways from the latest update:

Global growth will bottom out in 2023

In the October 2022 WEO, the IMF forecast that the global growth rate will decelerate from 3.4% in 2022 to 2.7% in 2023. In fact, at that time the IMF painted a grim picture: "More than a third of the global economy will contract this year or next, while the three largest economies—the United States, the European Union, and China—will continue to stall. In short, the worst is yet to come, and for many people 2023 will feel like a recession."

In the January update, however, the IMF effectively rules out a global recession: "Negative growth in global GDP or global GDP per capita—which often happens when there is a global recession—is not expected."

Instead, it expects global growth to bottom out in 2023 before starting to gather speed in 2024.

As such, the global growth, which was estimated at 3.4 percent in 2022, is now projected to fall to 2.9 percent in 2023 before rising to 3.1 percent in 2024.

"Compared with the October forecast, the estimate for 2022 and the forecast for 2023 are both higher by about 0.2 percentage point, reflecting positive surprises and greater-than-expected resilience in numerous economies," stated the IMF.

China, Russia, the US, Germany, and Italy are some of the key economies that have seen the most significant upward revisions in their 2023 GDP forecasts. The United Kingdom saw a substantial (almost 1 percentage point) downgrade in its 2023 GDP.

Global inflation has peaked but relief will be slow

Inflation, which destabilised the global economy, is expected to have peaked in 2022 but the disinflation (the fall in inflation rate) will be slow and take all of 2023 and 2024.

"About 84 percent of countries are expected to have lower headline (consumer price index) inflation in 2023 than in 2022. Global inflation is set to fall from 8.8 percent in 2022 (annual average) to 6.6 percent in 2023 and 4.3 percent in 2024—above pre-pandemic (2017–19) levels of about 3.5 percent," stated the IMF.





Price rise is slowing for two main reasons. One, monetary tightening all across the world — higher interest rates drag down overall demand for goods and services and that, in turn, slows down inflation. Two, in the wake of a faltering demand, prices of different commodities — both fuel and non-fuel — have come down from their recent highs.

In 2023, advanced economies are expected to have an inflation of 4.6% while emerging economies will continue to face an inflation of 8.1%.

India will stay the world's fastest growing major economy in 2023 and 2024

There's been no change in India's growth outlook since October 2022.

"Growth in India is set to decline from 6.8 percent in 2022 to 6.1 percent in 2023 before picking up to 6.8 percent in 2024, with resilient domestic demand despite external headwinds," states the IMF

This means India will remain the world's fastest growing major economy both in 2023 as well as 2024.

India's GDP growth rate is expected to be significantly higher than all its comparable economies, especially China (which is set to grow at 5.4% in 2023 and 4.5% in 2024).

US FEDERAL RESERVE RATE HIKE: WILL INDIA FOLLOW SUIT?

Over the course of this week, central banks across major developed economies have continued to raise interest rates in their fight against inflation. On Wednesday, the US Federal Reserve raised the benchmark interest rate by 25 basis points. On Thursday, the Bank of England increased interest rates by 50 basis points to a multi-year high of 4 per cent. Also on Thursday, the European Central Bank raised interest rates by 50 basis points. However, with data pointing towards a softening of prices, the commentary accompanying the policy announcements suggests that, globally, the monetary policy tightening cycle may be nearing its peak.

The signals from the central banks are clear. After hiking interest rates by 75 basis points in four consecutive meetings, the US Fed has in the last two meetings slowed the pace of its rate hikes. And inflation in the US has begun to trend lower — the consumer price index rose 6.5 per cent in December, down from the high of 9.1 per cent in June. As Jerome Powell, US Fed chairman, acknowledged, "inflation data received over the past three months show a welcome reduction in the monthly pace of increases." Powell, however, cautioned that "we will need substantially more evidence to be confident that inflation is on a sustained downward path." This indicates that while the fight against inflation is not yet over, the terminal rate — at which central banks will stop hiking and take a pause — is approaching. In a similar vein, even as the European Central Bank said that it "intends" to raise interest rates by another 50 basis points at its March meeting, the outlook for inflation is improving. Headline inflation dipped to 8.5 per cent in January, down from 9.2 per cent in December. The Bank of England's latest forecast also expects inflation to ease from 10.5 per cent in December to less than 4 per cent by the end of the year, dropping below the target of 2 per cent in 2024.

Early next week, the monetary policy committee of the Reserve Bank of India will meet for the first time in this calendar year. Recent data released by the government shows that headline retail inflation has stayed below the upper threshold of the inflation targeting framework for two consecutive months. The Union budget has also stuck to the path of fiscal consolidation. The





benchmark 10-year government bond yield has softened since its presentation, indicating that the markets are comfortable with the new fiscal's sovereign borrowing programme. As monetary policy acts with a lag, a pause at this juncture would allow for the implications of the rate hikes carried out so far to be observed across the broader economy. While it is possible that the MPC may choose to opt for another rate hike, the growing dissent within the committee suggests that the rate hike cycle in India is also nearing its end.

GOVERNMENT MUST CONSIDER IMPORTING WHEAT AND MILK FAT TO KEEP FOOD INFLATION UNDER CHECK

Wheat and atta prices are on fire, retailing at an average of Rs 30 and Rs 35 per kg respectively, as against Rs 20 and Rs 25 a year ago. As a mitigatory measure, the Narendra Modi government has approved offloading three million tonnes (mt) of the cereal from the Food Corporation of India's (FCI) warehouses into the open market over the next two months. The expectation is that this will help cool prices ahead of the arrival of new crops from end-March. But there are two possible hindrances. The first is that public wheat stocks, at 17.17 mt on January 1, are already at a six-year-low and marginally above the required minimum of 13.8 mt for this date. While the discontinuation of the additional 5-kg per-person per-month free grain supply through the public distribution system has given more leeway for the FCI to undertake open market sales, the overall stocks position is still quite precarious.

The second source of uncertainty relates to the size of the 2022-23 wheat crop. Right now, it looks in good condition, with farmers also sowing a near-record 34 million-plus hectares on the back of high prices, adequate soil moisture and reservoir water levels, and improved fertiliser availability. But the crop has barely entered the flowering stage, leave alone grain formation and filling that typically takes place over March and early-April. Knowing from last year's experience — when a sudden temperature spike after mid-March took a heavy toll on the standing wheat, whose kernels were just about ripening and accumulating starch — it would be foolhardy to make any predictions of output at this point. A second consecutive poor wheat harvest can have adverse consequences, more so given that consumer price inflation has only in the last two months fallen below the RBI's 6 per cent upper limit target.

That being so, the Modi government should consider import of 2-3 mt wheat as insurance against a not-too-good crop back home. Wheat from Russia — the world's cheapest supplier — is currently quoting at \$305-310 per tonne free-on-board, which works out to a landed price of around \$350 per tonne or Rs 28.5/kg in India. Similar imports on government account may also be required of milk fat, especially with domestic ghee and butter prices going through the roof. Demand for milk products, from curd and lassi to ice-cream, will peak during the summer months. That's when milk production, particularly by buffaloes, too will fall. Excess volatility in food price is neither in consumer nor producer interest — and a veritable nightmare for an inflation-targeting central bank. The government cannot afford to be lax on supply management, at a time when cereals and dairy products are among the highest contributors to consumer inflation today.

WHY ARE MILK PRICES SO HIGH, AND WHAT CAN BE DONE ABOUT IT?

Milk prices rose by around Rs 8 in 2022 — the last time this happened was almost nine years ago. This is in part a consequence of the way dairy farmers underfed calves during the Covid-induced squeeze in business. How can the govt prepare for the summer?





Within the last year, the Gujarat Co-operative Milk Marketing Federation has raised the maximum retail price (MRP) of its Amul brand full-cream milk (containing 6% fat and 9% SNF or solids-not-fat) in Delhi from Rs 58 to Rs 64 per litre. The National Dairy Development Board (NDDB)-owned Mother Dairy went further — from Rs 57 to Rs 66 per litre — between March 5 and December 27, 2022.

The last time milk prices went up by Rs 8/litre was between April-end 2013 and May 2014. From the table, it can be seen that the MRP rise in Amul milk wasn't very significant after May 2014, when the Narendra Modi government came to power. It rose by just Rs 10/litre over almost eight years until February 2022.

Since then, prices have rocketed — and more for full-cream milk. The MRP revision in toned milk (3% fat and 8.5% SNF) by Mother Dairy has been only Rs 6 per litre (from Rs 47 to Rs 53), as against Rs 9 for full cream.

What explains this recent inflation?

There are multiple factors.

The most important probably has to do with the crash in prices following the Covid-induced lockdowns, which forced the closure of hotels, restaurants, canteens and sweetshops, apart from cancellation of weddings and other public functions. The demand destruction led dairies to slash procurement prices of cow milk (with 3.5% fat and 8.5% SNF) to Rs 18-20 per litre during April-July 2020 and that of buffalo milk (6.5% fat and 9% SNF) to Rs 30-32. This was accompanied by ex-factory prices of skim milk powder (SMP) collapsing to Rs 140-150 per kg, along with Rs 200-225/kg for cow butter and Rs 280-290/kg for ghee.

Farmers responded first by shrinking — or at least not expanding — the size of their herds, as milk prices would not cover the cost of feeding and maintaining the animals. Two, they underfed them — particularly the calves and the pregnant/ dry cattle not giving milk.

A newborn crossbred typically reaches puberty and is ready for insemination in 15-18 months. Adding 9-10 months of pregnancy, it will deliver and start lactating after 24-28 months. The age of first calving in buffaloes is higher, at 36-48 months.

The calves that were underfed during the lockdown — which extended past the second Covid wave until June 2021 and beyond — are today's cows. Most of them, even if they have survived, would be poor milkers. This is evidenced by dairies across India reporting lower milk procurement, with the year-on-year drop up to 15-20% for the cooperative federations in Karnataka and Tamil Nadu. The same dairies that were refusing to buy from farmers in 2020-21 are at present paying Rs 37-38/litre for cow milk and Rs 54-56/litre for buffalo milk.

Is the legacy of underfed animals the only reason?

There are others too, both on the supply and demand fronts.

On the supply side, the average cost of cattle feed spiked from Rs 16-17 per kg in 2020-21 to Rs 22-23 by mid-2022, on the back of more expensive ingredients such as cotton-seed, rapeseed and groundnut extractions, soyabean meal, maize, de-oiled rice bran and molasses.

Availability of straw (particularly wheat, due to a poor 2021-22 crop) and fodder (because of near-incessant rains, especially in the South, from October-December 2021 through 2022, which did





not allow the grass to fully come out) has also been an issue. On top of these came the outbreak of lumpy skin disease among cattle in July-September 2022, and seemingly impacted milk output further.

On the demand side, the lifting of lockdown restrictions and revival of economic activity from late-2021 coincided precisely with the building up of supply pressures. This was exacerbated by India exporting about 33,017 tonnes of milk fat worth Rs 1,281.15 crore in 2021-22 and 13,360 tonnes (Rs 664.82 crore) during April-November 2022, against a mere 15,600 tonnes (Rs 717.17 crore) in 2020-21. Higher exports of butter, ghee, and anhydrous milk fat, enabled by soaring international prices, have added to the domestic shortage — and as noted earlier, full cream milk has become dearer, with branded ghee and butter also disappearing from store shelves.

What can the government do now?

A shortage of milk, more specifically fat, is a concern at this point when dairies would ordinarily be building up stocks for the summer. Since that's not happening, it makes sense to allow duty-free imports of butter oil and SMP. The most recent price of \$5,337 per tonne (Rs 435/kg) for anhydrous milk fat at New Zealand's Global Dairy Trade fortnightly auction works out to below the corresponding domestic rate of Rs 520-525/kg. This wasn't the case in March 2022, when global prices had topped \$7,100 per tonne.

Butter fat imports currently attract 40% duty. For SMP imports, it is 15% up to 10,000 tonnes per year and 60% for quantities beyond that. The government can permit NDDB to import fat and SMP at zero duty for building up a buffer stock necessary for the summer, when milk supplies will dry up in the normal course. Domestic production should hopefully recover by the next "flush" season, when farmers would be enthused enough to milk more animals that have no dearth of feed or fodder.

SUPREME COURT INCOME TAX ORDER ON SIKKIM, AND THE PROTESTS IT HAS TRIGGERED

Political parties in Sikkim, including the ruling Sikkim Krantikari Morcha (SKM), have been protesting against the court's observation that Sikkimese Nepalis were immigrants while allowing exemption from income tax to all old settlers cutting across ethnic lines.

A review petition has been filed in the Supreme Court for rectification of the court's observation on Sikkimese Nepalis, Sikkim's Chief Minister Prem Singh Tamang announced on Twitter on Thursday.

Political parties in Sikkim, including the ruling Sikkim Krantikari Morcha (SKM), have been protesting against the court's observation that Sikkimese Nepalis were immigrants while allowing exemption from income tax to all old settlers cutting across ethnic lines.

In its judgment delivered on January 13, the apex court said that under the Sikkim Income Tax Manual, 1948, "all persons engaged in business were subjected to tax irrespective of their origin. Therefore, there was no difference made out between the original inhabitants of Sikkim, namely, the Bhutia-Lepchas, and the persons of foreign origin settled in Sikkim like the Nepalis or persons of Indian origin who had settled down in Sikkim generations back."

The judgment also recorded the petitioner's contention that migrants from other countries or erstwhile kingdoms like "Nepalese migrants", who "migrated to and settled in Sikkim at the same time or even after migrants/settlers of Indian origin", were benefiting from Section 10(26AAA) of





the IT Act, 1961, "while arbitrarily excluding settlers of Indian origin such as the petitioners herein".

On February 2, state Health Minister Mani Kumar Sharma resigned in protest against the government's failure to respond to the court's observation, PTI reported. A day previously, Additional Advocate General Sudesh Joshi had resigned in the face of allegations — which Joshi denied — that he had not briefed the court adequately about the distinction between the Sikkimese Nepali population and other old settlers, which had led to the observation.

What the Supreme Court ruled

On January 13, the Supreme Court held that the benefit of tax exemption provided in Section 10 (26AAA) shall be extended to all Sikkimese people. (Association of Old Settlers of Sikkim vs Union of India)

Before this judgment, the tax exemption excluded "old Indian settlers", who had permanently settled in Sikkim before the merger of the state into the Indian union on April 26, 1975, even if their names were recorded in the register maintained under the Sikkim Subjects Regulations, 1961, read with the Sikkim Subject Rules, 1961 (also referred to as the "Register of Sikkim Subjects").

A Bench of Justices M R Shah and B V Nagarathna directed the state to amend the Explanation to Section 10 (26AAA) to include a clause to extend the exemption from payment of income tax to all Indian citizens domiciled in Sikkim on or before April 26, 1975.

The court struck down the proviso (an article or clause that introduces a condition) to Section 10 (26AAA), which excluded Sikkimese women who had married non-Sikkimese men after April 1, 2008, from the benefit of tax exemption, as violative of Articles 14, 15, and 21 of the Constitution.

"This direction is being issued...so as to eliminate discrimination and disparity in respect of the aforesaid category of Sikkimese, who subsequently have become citizens of India w.e.f. 26th April 1975 and to save the Explanation from being rendered unconstitutional vis-à-vis such individuals who form a small percentage of Sikkimese," the court said.

In a judgment written separately but concurring with Justice Shah's, Justice Nagarathna observed: "When the Explanation refers to an 'individual', it includes both Sikkimese men and women, in fact, all genders; it cannot have a restrictive or myopic reference to only Sikkimese men and exclude those Sikkimese women covered under the proviso. A proviso cannot overarch a provision."

The court also accepted the petitioner's submission that a woman is not a chattel and has an identity of her own, which cannot be taken away by the mere factum of marriage, as the apex court has previously held in G. Sekar vs. Geetha & Ors (2009).

JO JOHNSON, BROTHER OF UK EX-PM, RESIGNS AS DIRECTOR OF ADANI LINKED FIRM

Lord Jo Johnson, younger brother of former British prime minister Boris Johnson, has resigned his non-executive directorship of a UK-based investment firm linked with the now-withdrawn Adani Enterprises Follow-on Public Offer (FPO).

'The Financial Times' newspaper referenced UK Companies House records to reveal that 51-yearold Lord Johnson had been appointed as a director of London-based Elara Capital Plc in June last 3RD FLOOR AND 4TH FLOOR SHATABDI TOWER, SAKCHI, JAMSHEDPUR





year and resigned on Wednesday, the day when the Adani Group announced the withdrawal of the FPO.

Elara, which described itself as a capital markets business raising funds for Indian corporates, was among the bookrunners on the FPO. Johnson insisted he has been assured of the company's "good standing" and has stepped down due to his own lack of "domain expertise".

According to the newspaper, it is Elara's asset management business that is under the spotlight after US short seller Hindenburg Research linked Mauritius-based funds run by the London firm with Adani Group companies.

The Adani Group has categorically denied Hindenburg's accusations, calling them a "malicious combination of selective misinformation and stale, baseless and discredited allegations".

Raj Bhatt, Elara Capital's chief executive and founder, referred the newspaper's request for comment to its compliance officer, who is yet to respond.

WARNING BELLS

The latest stock market gyrations induced in large measure by the stock rout in leading infrastructure and commodities intensive conglomerate, the Adani group, over the last two trading sessions last week has cast the spotlight back on India's regulatory environment. The highly leveraged group's market troubles, in the wake of a U.S.-based short seller's report alleging 'stock manipulation and questionable accounting practices', dragged down banking shares led by the State Bank of India and even the state-owned LIC appreciably on Friday, triggering investor concern about broader financial sector stability. And while a media report citing sources said the Securities and Exchange Board of India (SEBI) had stepped up scrutiny of the conglomerate's transactions, there has been no official word from the markets regulator. The conglomerate itself has rubbished the short seller's allegations as being 'baseless and discredited and born of mala fide intent to hurt the group's reputation', and is weighing legal action. Notwithstanding how the conglomerate might move to address the concerns raised in the short seller's report as well as those of domestic investors who appear to have turned chary of the group's stocks, India's regulators including SEBI and the Reserve Bank of India have an opportunity, nay an obligation, to clear the air by allaying fears of any broader systemic contagion.

Even granting that the group's stocks do not have a significant presence or weight on the major benchmark stock indices, and private equity research reports have sought to downplay concerns about the banking sector's overall exposure to the group, there can be little argument that the major state-owned banks and the LIC are key pillars of the country's financial system. Given the extent of public trust reposed in these companies in the form of savers' deposits and life insurance policies as well as taxpayer resources that have been invested to keep the PSU lenders adequately capitalised, financial system regulators would be serving the larger public interest by preemptively communicating messages of reassurance. Regulators could also enhance credibility in India as an investment destination by tightening not just the listing requirements but more crucially the enforcement actions in case of egregious breaches of the laws. The global debate over the credibility of credit ratings that has surfaced from time to time, whether in the wake of the Asian financial crisis of the late 1990s, or the global financial crisis of 2007-08, is also a concern that India's regulators need to re-engage with. At a time when India holds the G-20 presidency, authorities must ensure the regulatory framework is seen in nothing less than the best light.





WITH AN EYE FOR FRAUD

The first known instance of short selling dates back to the early 17th century and involved stock in the Dutch East India Company, which is widely considered the first ever joint-stock company. According to Ludwijk Petram, an economist and historian from the Netherlands who was featured on U.S.-based National Public Radio's 'Planet Money' show in 2015, Isaac Le Maire, a disgruntled former director of the Dutch East India Company, sought to wreak revenge on the company for being expelled by betting that the company's stock price would fall. To this end, he is said to have started spreading rumours that were aimed at pushing the stock's price down.

The company is reported to have sought a ban on short selling, citing the economic injury it contended was being caused to the wider public, and succeeded in obtaining both a partial ban on short selling and a prohibition on Le Maire accessing any of his shares, thus thwarting the short seller's plans.

Over the centuries, short sellers were viewed with suspicion by the establishments of the day.

For all the opprobrium, short sellers have often enough served a valuable socio-economic function by helping expose financial irregularities in corporations big and small that have raised capital from the public. Given that they take the risk of a substantial financial loss in case their bet that a company's share value is going to decline over a certain time period, short sellers invariably spend a lot of time and effort researching the company they are looking to short.

From predicting the fall of the once powerful energy provider Enron Corporation, to accurately foreseeing the financial meltdown in 2007, short sellers have earned themselves a reputation of serving as early warning systems of corporate and market malfeasance.

Hindenburg Research, a small firm founded by Nathan 'Nate' Anderson in 2017 that operates out of the Upper West Side in New York City, is a short seller that has built its reputation over its focus on forensic financial research. Over the space of just two months in 2017, Hindenburg published more than four articles on four different Nasdaq-listed companies, including a bitcoin miner and a biotech firm that subsequently resulted in charges being filed by the U.S. Securities and Exchange Commission (SEC) against key officials at these firms.

Chinese company

The following year, Hindenburg published its first major article on a then \$2 billion market capitalised Chinese logistics provider, Yangtze River Port & Logistics. Hindenburg's investigation into the Nasdaq-listed firm revealed that the company's key asset didn't appear to exist.

While the China-based firm sued the short seller for defamation, Hindenburg says on its website that "multiple independent media outlets and a law firm corroborated our reporting". Yangtze River Port, which lost over 98% of its market cap, was subsequently delisted from the Nasdaq and its lawsuit against the short seller was dismissed.

However, it was in 2020, that the short seller came into its own, taking on at least seven companies in the space of an equal number of months.

Hindenburg's September 2020 report on electric vehicle maker Nikola Corp. titled "Nikola: How to Parlay An Ocean of Lies Into a Partnership With the Largest Auto OEM in America" was its most significant investigation until its latest report on the Adami Group





With the help of whistle-blowers and former employees, the short seller established that Nikola had resorted to several falsifications including a promotional video for its Nikola One semi [truck trailer] that was "nothing more than the truck being rolled down a hill in the Utah desert". The report led to the resignation of Nikola's founder and executive chairman Trevor Milton, with a jury last October convicting Mr. Milton on charges of having defrauded investors.

Howsoever the denouement in the Adani case may end up, Hindenburg's latest salvo has shown that the firm and its founder Mr. Anderson have the appetite to take on the rich and the powerful.

ADANI CRASH STALLS PARLIAMENT; OPPOSITION SEEKS JPC PROBE

Parliament failed to function on Thursday, in the face of persistent demands by the Opposition for a debate on the high exposure of public financial institutions — mainly the State Bank of India (SBI) and the Life Insurance Corporation (LIC) — to the Adani Group, and the impact on them following the Hindenburg report alleging round-tripping of money by the group.

On January 30, the LIC said the amount it had invested in the Adani Group, over a period of time, stood at ₹36,474.78 crore. The SBI, on its part, has lent a significant amount of money to the beleaguered group.

While sources say that not all Opposition parties are on board for such a mode of investigation, the issue has united several major parties, with the DMK, Samajwadi Party, JD(U), Shiv Sena, RJD, NCP, IUML, CPI, CPI(M), National Conference and Kerala Congress participating in a strategy meeting called by Mr. Kharge on Thursday morning.

The Lok Sabha also saw similar scenes. Opposition MPs rushed to the well of the House and started raising slogans on the Adani stock market crash. The protests continued in the post-lunch session, forcing adjournment for the entire day.

RBI SAID TO SEEK DETAILS OF BANKS' LOANS TO ADANI GROUP

The Reserve Bank of India (RBI) has sought details from banks regarding their exposure to the Adani Group, banking sources said, a day after the conglomerate withdrew a ₹20,000-crore follow-on public offer of Adani Enterprises.

On Wednesday, Swiss lender Credit Suisse is reported to have stopped accepting bonds by Adani Group companies as collateral for margin lending.

The going has been tough for the diversified conglomerate over the past week ever since U.S.-based short seller Hindenburg Research levelled a slew of allegations about the group's accounting practices. The Ahmedabad-headquartered group has denied all the allegations.

The RBI gets access to details of loans by banks to large corporate borrowers on a regular basis as part of the central repository of information on large credits (CRILC) database, the banking sources said.

If lending takes place against pledged securities, a significant decline in the price of the equity shares of the borrower could lower the value of the pledged securities.

The country's largest lender SBI has said its exposure to the Adani Group was fully secured by cash-generating assets.





CENTRE TO ROLL OUT PROCESS TO SET UP 16TH FINANCE COMMISSION SOON

The Union government will soon kick off the process to set up the 16th Finance Commission, with the Finance Ministry likely to notify the terms of references for the constitutional body, tasked with recommending the revenue sharing formula between the Centre and the States and their distribution among the States, towards the latter half of this year.

The 15th Finance Commission was set up in November 2017 with a mandate to make recommendations for the five-year period from 2020-21. While the Constitution requires a Finance Commission (FC) to be set up every five years, the 15th FC's mandate was extended by a year till 2025-26, breaking the cycle.

"In the normal course of things, the next Finance Commission should have been appointed by now, but since our report covered six years instead of five, it must be appointed this year," the 15th FC's chairperson N.K. Singh told The Hindu. In late 2019, the commission was asked to give a standalone report for 2020-21 and another report for an extended five-year period till 2025-26.

The last time an FC was granted a six-year time frame was for the 9th Finance Commission, formed in June 1987. It was asked to submit a single year report for 1989-90 and a five-year report for the five years till 1994-95. These reports were submitted in 1988 and 1990, when the country's Finance Ministers were S.B. Chavan and Madhu Dandavate, respectively. The 10th Finance Commission was still constituted in June 1992 within the five-year deadline specified by Article 280 of the Constitution, which has not been the case this time.

"The commission is usually granted about two years to deliberate on its terms of reference, consult States and frame its recommendations, and the government should ideally have its report by October 2025 to consider it in time for Budget 2026-27 — where it will have to place its action taken report on the Commission's report," explained Arvind Mehta, secretary of the 15th FC.

The key challenge

A key new challenge for the 16th FC would be the co-existence of another permanent constitutional body, the GST Council, Mr. Singh pointed out, as the Council's decisions on tax rate changes could alter the revenue calculations made by the Commission for sharing fiscal resources.

"What recourse mechanism can be put in place for the Commission, which is not a permanent body, to revisit its numbers due to the Council's decisions," he underlined.

ECONOMIC SURVEY 2023: HERE ARE THE KEY TAKEAWAYS

On Tuesday, the government tabled the Economic Survey 2022-23. The Survey laid out the outlook for India's growth, inflation and unemployment in the coming years.

What is the Economic Survey?

The Survey provides a detailed report of the national economy for the year along with forecasts. It touches upon everything from agriculture to unemployment to infrastructure. It is prepared by the Economic Division of the Department of Economic Affairs (DEA).

The comments or policy solutions contained in the Survey are not binding on the government.





What are the main takeaways this year?

GDP growth: The Survey said India's growth estimate for FY23 is higher than for almost all major economies.

"Despite strong global headwinds and tighter domestic monetary policy, if India is still expected to grow between 6.5 and 7.0 per cent, and that too without the advantage of a base effect, it is a reflection of India's underlying economic resilience; of its ability to recoup, renew and re-energise the growth drivers of the economy," said the Survey.

Inflation: The RBI has projected headline inflation at 6.8% in FY23, outside its comfort zone of 2% to 6%. High inflation is seen as one big factor holding back demand among consumers. However, the Survey sounded optimistic about the inflation levels and trajectory, saying "it is not high enough to deter private consumption and also not so low as to weaken the inducement to invest."

Unemployment: The Survey said "employment levels have risen in the current financial year", and that "job creation appears to have moved into a higher orbit with the initial surge in exports, a strong release of the "pent-up" demand, and a swift rollout of the capex."

It pointed to the Periodic Labour Force Survey (PLFS), which showed that urban unemployment rate for people aged 15 years and above declined from 9.8% in the quarter ending September 2021 to 7.2% one year later. The Survey also underlined that the fall in unemployment rate is accompanied by an improvement in the labour force participation rate.

Outlook for 2023-24

The Survey projected a baseline GDP growth of 6.5% in real terms in FY24. However, it detailed some downside risks. For instance, low demand for Indian exports, thanks to poor global growth, may widen India's trade deficit and make the rupee depreciate. Similarly, sustained monetary tightening (higher interest rates) may drag down economic activity in FY24.

What does it mean for India's economy?

The central thrust of this year's Survey is that India's economy has recovered from the Covid disruption and, at long last, is poised to see sustained robust growth in the rest of the decade.

CEA V Anantha Nageswaran said the phase between 2014 and 2022 — when the BJP has been in power — has witnessed "wide-ranging structural and governance reforms that strengthened the economy's fundamentals by enhancing its overall efficiency".

He clarified that these reforms had not yielded the desired results because banks were getting rid of their non-performing assets (NPAs) and business firms were deleveraging. Shocks such as the Covid pandemic and the Ukraine war made matters worse.

"As the health and economic shocks of the pandemic and the spike in commodity prices in 2022 wear off, the Indian economy is thus well placed to grow at its potential in the coming decade, similar to the growth experience of the economy after 2003. This is the primary reason for expecting India's growth outlook to be better than it was in the pre-pandemic years," said the Survey.

What is the reference to 2003?

The Survey argued that the situation in 2023 is similar to how the economy was poised in 2003.





It said the period between 2014 and 2022 is analogous to 1998-2002, when despite transformative reforms by the government (also led by the BJP), the Indian economy lagged growth returns. This was due to temporary shocks such as the US sanctions after India's nuclear test, two successive droughts, the collapse of the tech boom, etc. But once these shocks faded, the structural reforms paid growth dividends from 2003. The Survey claims the same story is set to repeat from 2023.

How likely is this?

The first thing to note is that even before Covid, India's potential growth rate — that rate at which it can grow without inflation becoming a problem — had fallen to just 6%. In the 2003-2008 period it was 8%. Between 2009 and 2015, it was 7%. In the next few years, it is unlikely to rise much above 6%. Secondly, during the 2003-2008 phase, the global economy was booming — exactly opposite of the situation now.

Thirdly, in India, unemployment rates underestimate the alarming stress in the labour market, because labour force participation rate (or the proportion of people demanding jobs) is itself quite low. Moreover, over the past two decades, India's growth has become increasingly capital-intensive (using relatively less labour). This trend is likely to worsen as automation eats into routine jobs.

Widespread joblessness translates to lower incomes and lower consumer demand. That, in turn, dissuades private sector investments and eventually acts as a drag on economic growth.

India is the world's most populous country with a growing youth bulge. It has the world's largest pool of poor people and the largest pool of malnourished children. Given the low levels of per capita income, it requires much faster growth than many developed countries. A growth rate of 4% in India can feel like a recession and even though a 6% growth should be achievable, it may not create enough jobs to satisfy a growing population.

EXPRESS VIEW ON ECONOMIC SURVEY 2023: REASON FOR OPTIMISM

The Economic Survey 2022-23, the annual flagship document of the Ministry of Finance, is carefully optimistic in its assessment of the prospects of the Indian economy over the coming year. The optimism is striking, particularly when the global situation isn't exactly rosy, with tightening financial conditions and subdued trade growth. The Survey has projected the Indian economy to grow at 6.5 per cent in 2023-24, a tad lower than the forecast of 7 per cent for the ongoing financial year. This assessment is at odds with the more pessimistic forecasts by international agencies and other independent evaluations. In its latest World Economic Outlook released on Tuesday, the International Monetary Fund has pegged India's economic growth to slow down from 6.8 per cent in 2022 to 6.1 per cent in 2023. On similar lines, rating agency Crisil has projected growth at 6 per cent, while investment house Nomura has pegged it even lower. While the Survey's projections of the decline in growth may not necessarily be incorporated in the Union budget, they nonetheless provide an insight into the government's views on the state of the economy.

The Survey's growth prognosis is based on expectations of robust domestic demand and a pick-up in capital expenditure. It notes that as export growth moderated in the ongoing financial year, domestic consumption rebounded, providing a fillip to economic activity. However, this was largely due to the release of "pent-up" demand. While the Survey expects this rebound to have "lasting power", to what extent it is sustainable — in the context of elevated inflation eroding





purchasing power and an uneven recovery impacting sales of both consumer durables and non-durables — is debatable. On investment activity, the Survey highlights the increasing trend in project announcements and private capex spending. While there are some signs of an uptick in the private investment cycle, these indicate a skew in favour of specific sectors, not a broad-based pick-up. Moreover, the continuing downturn in exports will have ramifications. While the Survey does acknowledge the prospects of sluggish exports, a detailed articulation on the risks to growth from a slowdown in the developed economies — if interest rates remain "higher for longer" — is absent.

The Survey has devoted an entire chapter to India's medium-term growth outlook. The broad conclusion is encouraging — the twin balance sheet crisis does not appear to be an impediment to growth anymore. Both corporate and banking sector balance sheets are in far better shape, and the credit cycle is poised for an uptick. The Survey emphatically states the Indian economy is well placed to embark on a growth trajectory similar to what it experienced post 2003. This is reassuring. Thus, while the short-term outlook is challenging, favourable demographics, formalisation and digitisation are reasons for optimism in the long run.

THE ECONOMIC SURVEY THAT WASN'T

It is generally acknowledged that the Budget of 1991 which was presented by the then Finance Minister, Dr. Manmohan Singh, is one of Indian economic history's landmark events. The Budget is still widely lauded by neo-classical economic commentators because it marked a structural shift in India's economy away from the hands of the government to the hands of private enterprise, and embraced free trade. That was the prevailing wisdom then, dubbed as the 'Washington Consensus'.

Three decades later, many developed economies, including America, Britain and Germany, are now reversing course to economic nationalism and increasing the role of government in their economy through industrial policy, ostensibly as a response to China's economic might and a weaponisation of trade. This is a profound shift in economic thought — and perhaps the greatest symbolic victory for China's economic model — that has forced the 'Washington Consensus' champions to back-pedal.

A disappointment

In this context, what should India's economic strategy be? Should India too revert to increased state control of the economy through an active industrial policy? In which case, should India exercise greater control over the exchange rate of the rupee? And impose trade restrictions? The Russia-Ukraine conflict has had enormous geo-economic consequences by recreating a stark bipolar world order of a China/Russia bloc vis-à-vis western bloc of nations. How will India's economy be impacted by this, especially as we seem to have harked back to bi-lateral currency arrangements with Russia for trade, abandoning the dollar? These are all questions that are immensely important and imminently urgent, calling for serious discussion and debate among policy thinkers and makers.

The Economic Survey presented by the Chief Economic Adviser a day before the Union Budget has typically been the medium to raise issues for public discussion and ponder over such strategic economic matters. At least, that has been the case over the past decade or so. Surveys of the previous years had put out various ideas and issues such as universal basic income, economic divergence among States, steps to improve property tax revenues using satellite technology, new





ways to calculate inflation using the Indian thali, estimating internal migration of people and so on. Many of these may not have even been fully fleshed out or well-researched policy ideas, but at least served as an intellectual public good by triggering a debate and forcing policy influencers to think about these issues.

Disappointingly, the Economic Survey of 2022-23 did not provoke any such deliberation or discussion. It is a rather dry compilation of data to substantiate the Narendra Modi government's economic performance. The Economic Survey has 66 tables and 246 charts with cherry-picked data points (e.g. fig. II.8) that seek to portray a stellar image of the government's economic management and blame the previous regime for all ills, which is perhaps an occupational hazard and an inevitability in the current climate of politics and government. But the Survey had some new and interesting data — on the housing market, digital infrastructure, etc. — and putting out such copious amounts of economic data in the public domain in itself is a yeoman service to be appreciated.

Unlike previous years, this year's Survey has only one volume and also a separate 'Highlights' volume that lays out the key messages creatively and simplistically for a larger audience. The broad story is that the Indian economy has recovered from the novel coronavirus pandemic but is still at the mercy of global geo-political developments; and so the Economic Survey has been honestly cautious about future growth and inflation. Unsurprisingly, it has painted a rosy picture of both Good and Services Tax (apparently because it has improved tax buoyancy) and of the corporate tax cuts of 2019 (because it seemingly helped clean up bloated corporate balance sheets). The chapter on the social sector has delved deeper than previous surveys have done into issues of employment, rural wages, demand under the Mahatma Gandhi National Rural Employment Guarantee Act and other important human capital topics supplemented with vast amounts of data. But an analytical discussion on the employment intensity of contemporary economic growth models and ideas to boost job creation is missing. Instead, the chapter inexplicably concludes that the 'PM's Minimum government Maximum governance vision will hold the key to equitable economic growth', sounding like a Bharatiya Janata Party manifesto.

A mirror of the government's line

The Survey rightly exults over the increase in government capital expenditure from 12% of total expenditure in 2014 to 19% now. With much global uncertainty, tepid corporate investment and precarious asset markets, the emphasis on public capital expenditure to boost the economy is prudent and wise. On private sector investment, it waxes eloquent about manufacturing and Production Linked Incentive schemes with grandiose but unsubstantiated claims of attracting ₹3 lakh crore in capital investment and generating six million new jobs in the next five years.

Like the government of the day, the Economic Survey also suffers from the 'take credit for the rains but blame nature for the drought' malaise when, for all the 'Make in India' hype, manufacturing gross value added (GVA) grew only at 4% (real) even before the pandemic hit, which it blames on corporate 'indigestion' from too much debt accumulated during the previous regime.

Yet, it is neither unreasonable nor unfair to have expected a little more intellectual acuity into some of the pressing economic issues of trade, industrial policy, capital account and inequity that the whole world is ruminating over now. More so because the Chief Economic Adviser is eminently qualified and wise, who would have thought deeply and formed an opinion about the direction that India should take in the current crossroads of economic strategy.





The Economic Survey is really the only medium in the country for a rigorous, thoughtful and nuanced discussion of new economic ideas. Perhaps it was a deliberate and intentional move to stick to data and facts to provide a report card of the government's economic performance, and not a doctoral thesis on the economic road map to prompt discussion in the public sphere, like the previous surveys. Regardless, it is always easier to be a commentator than a player, albeit less fun and impactful.

EXPRESS VIEW ON UNION BUDGET 2023: KEEPING A CLEAR HEAD, STAYING THE COURSE

Union Finance Minister Nirmala Sitharaman's latest budget, the last full-fledged one before next year's general elections, can be commended on three counts. First, for staying the course on fiscal consolidation. The finance minister has targeted the Centre's fiscal deficit for 2023-24 at 5.9 per cent of GDP, down from 6.4 per cent in the current fiscal and 6.7 per cent in 2021-22. She has done this by not announcing new grandiose schemes having significant fiscal implications — on the scale of, say, PM-Kisan or MGNREGA. Besides, the spending on food, fertiliser and petroleum subsidy will be Rs 1.47 lakh crore lower compared to the revised estimates for 2022-23. Sitharaman has also budgeted a lower outlay on MGNREGA (Rs 60,000 crore versus Rs 89,400 crore), while maintaining it at the same level for PM-Kisan. There is no increase, for now, in direct income support to farm households under the scheme from the current Rs 6,000 per annum. These savings in expenditure have created the space to bring down the revenue deficit even more appreciably, from 4.1 per cent to 2.9 per cent of GDP.

The second positive feature is the emphasis on changing the composition of government expenditure in favour of capital, as against revenue, spending. The Centre's budgeted capital expenditure for 2023-24, at over Rs 10 lakh crore, will be almost twice the Rs 5.9 lakh crore that was spent in 2021-22. That's a huge step up and necessary in the present context of slowing global trade and tightening of financial conditions. It is obvious that the stimulus for growth in the coming year has to come from domestic, not external sources. The Narendra Modi government will be hoping that the government's capex push will help crowd-in private sector investments.

The finance ministry's Economic Survey presented on Tuesday has highlighted the fact that the balance sheets of both corporates and banks have been sufficiently cleaned up to enable the former to invest and the latter to lend. But whether India Inc would respond to the government's exhortations remains to be seen. The Modi government can, on its part, claim to have done its best—right from cutting the basic corporation tax rate from 30 per cent to 22 per cent in September 2019, to increasing allocations for building infrastructure. For roads and highways alone, it has gone up from Rs 1.13 lakh crore in 2021-22 to a budgeted Rs 2.59 lakh crore for 2023-24. State governments have been provided an interest-free loan of Rs 1.3 lakh crore for undertaking capital investments, which is itself a 30 per cent increase over the current year.

The third welcome move has been on personal income taxation. The budget has made annual incomes up to Rs 7 lakh free from taxation. This should provide relief to new entrants in the job market, many of whose salaries would be well within this limit. The savings will allow them to increase discretionary spending, including loan-financed consumer durable purchases. By linking the lower rates to non-availing of exemptions — even individuals with annual income of Rs 15 lakh will only have to pay Rs 1.5 lakh, as against Rs 1.87 lakh under the existing regime — the budget has signaled a simplification of the tax system. There is merit in eventually moving towards a low tax regime with fewer and targeted exemptions such as those for pension and health insurance plans.





A RAFT OF CONCESSIONS AMID CONSOLIDATION

If budget making is a complex task, interpreting the Union Budget can be hazardous given the amount of fine print that one has to pore over. Finance Minister Nirmala Sitharaman's fifth Budget, and the current Bharatiya Janata Party-led government's final full-fledged one before next year's general election, ticks all the right boxes on the face of it. Inclusive development that ensures prosperity for all, especially the youth, women, farmers, Other Backward Classes, Scheduled Castes and Scheduled Tribes, a focus on infrastructure and investment that serves as a multiplier for growth and employment, policies to enable green or environmentally sustainable growth, the rationalisation of direct taxes, including a raft of concessions to the middle and salaried classes, and pensioners, and, most importantly, doing all this while staying the course on fiscal consolidation. Terming it the "first Budget in Amrit Kaal", Ms. Sitharaman sounded the poll bugle by emphasising the ruling dispensation's achievements since 2014, when Prime Minister Narendra Modi first assumed office. Per capita income, she said, had more than doubled to ₹1.97 lakh as a result of the economy's growth to being the world's fifth-largest and the government's efforts to ensure a better quality of living for all. She also cited an increase in formalisation of the economy and the widespread adoption of digital technologies, especially in the payments sphere, as other significant achievements.

With an eye on 'India at 100', the Budget proposals, Ms. Sitharaman said, were aimed at actualising a "technology-driven and knowledge-based economy with strong public finances, and a robust financial sector". Emphasising that the economic agenda for achieving this vision would, among other things, require a focus on giving a strong impetus to growth and job creation, the Minister laid out her Budget proposals that were heavy on this government's trademark acronyms describing the various schemes, but relatively light on details. PM VIKAS or Pradhan Mantri Vishwakarma Kaushal Samman, for instance, would for the first time offer traditional artisans and craftspeople, or Vishwakarmas, a package of assistance aimed at helping them improve the quality, scale and reach of their products, she said. Specifics, including a financial outlay and the likely mechanics of implementation, were, however, not spelt out. Similarly, a 'Mangrove Initiative for Shoreline Habitats & Tangible Incomes' or 'MISHTI', aimed at undertaking mangrove plantation along the coastline and on salt pan lands leaves the funding to a "convergence between MGNREGS and a compensatory afforestation fund". With the rural sector's mainstay employment guarantee scheme, one that was introduced during the Congress-led United Progressive Alliance government's term, itself increasingly being starved of budgetary support, it is hard to fathom how the new initiative to protect and regenerate the ecologically sensitive mangroves will be funded. The decrease in outlay comes at a time when the rural economy is still to regain vigour from the ravages of the pandemic, the fallout on incomes from the uneven distribution of last year's monsoon rainfall, and the relatively greater impact of high food inflation on hinterland households.

At a broader level, the Budget estimate for expenditure on rural development in 2023-24 is pegged at ₹2.38 lakh crore, a marginal 0.1 percentage point increase when measured as a proportion of overall expenditure at 5.3%, compared with the 5.2% in the previous Budget Estimate. When viewed against the revised estimate, the outlay is a good 0.6 percentage point lower. Food subsidy too has been sharply pared: at ₹1.97 lakh crore, it is almost 5% lower than the 2022-23 Budget estimate and a steep 31% down from the revised estimate. To be sure, the government's resolve to stay the course on fiscal consolidation, especially after the COVID-19 pandemic had led it to spend more even as revenue receipts dipped amid the unprecedented economic contraction, left Ms. Sitharaman with little leeway on the expenditure front once she

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had decided that the government would concentrate its resources on increased public outlays on infrastructure and investment. Capital expenditure has been allocated ₹10 lakh crore, a 33% jump from this fiscal's Budget estimate. If one adds the almost ₹3.7 lakh crore set aside for grants-in-aid to States for the creation of capital assets, the Minister's laudable intent to apply the force multiplier of government capital spending as the primary lever to spur economic activity becomes clearly evident. With global demand uncertain this year on account of the slowdown in the developed economies, as the Economic Survey pertinently pointed out, India's domestic market will necessarily have to serve as the economy's bulwark. Ms. Sitharaman has also attempted to woo the middle class with a raft of changes in personal income tax that would, in combination with tweaks to customs duties, in total cost the government ₹ 37,000 crore in foregone direct tax revenue. Some of these changes are aimed at leaving more money in the hands of the salaried and pensioners, cash that the Budget planners hope would find its way back either as savings or increased spending on vital consumption. The biggest beneficiaries of the income-tax changes though are likely to be those in the highest income bracket, where the effective rate has been cut by 3.74 percentage points reinforcing a perception that this government bats for the affluent.

A SHOT FOR SCIENCE

The Budget speech in the year preceding a general election is usually one that seeks to appease as wide a swathe of society as possible. It follows that ministries that fund the bulk of research and development (R&D) too would see a healthy jump in allocation. The Ministry of Science & Technology has received an allocation of ₹16,361.42 crore this year, on paper an impressive 15% increase from the previous estimate. However, between 2021-22 and 2022-23, the Ministry had seen a 3.9% decrease. The bulk of the hike has gone to the Department of Science and Technology (DST) — ₹7,931.05 crore, up 32.1% from last year. It was ₹2,683.86 crore for the Department of Biotechnology, or DBT (a nominal hike of 3.9%), and ₹5,746.51 crore (1.9%) for the Department of Scientific and Industrial Research (DSIR). The Deep Ocean mission — which includes among other components developing a deep-submersible vehicle — and the National Research Foundation have got substantially higher hikes than in previous years, a sign that they are the Centre's immediate focus.

There were multiple references in the Budget speech for investing in dedicated centres for excellence in 'Artificial intelligence' research, initiatives to scale up technology to produce laboratory-made diamonds and a centre for research in sickle cell anaemia. While all of these efforts could be spread out across multiple arms of government, none of the budgetary allocations suggests a significant scale up of basic research. As with previous governments, this government too has not succeeded in increasing the percentage of spend on research and development to beyond 1% of GDP. While different countries define R&D spends variously, a rule of thumb suggests that developed and technologically advanced countries spend over 2% of their GDP on R&D, and India, according to a 2022 estimate by the Global Innovation Index, continues to hover around 0.7% despite being among the world's largest producers of scientific literature. While funds are not the only challenge to research and development in India, the lack of significant raises across departments shows that the absorptive capacity of scientific institutions in the country is limited. A major challenge continues to be research scholars not getting promised funds on time and the wait for the quality equipment required by researchers, continuing to be mired in a maze of bureaucratic whimsy. The bulk of research continues to be funded by government and the participation of the private sector has grown only incrementally. In the next few years, the government must not only increase the size of the funding pie but also ease the procedures to make the most efficient use of it.

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REVISIT THE TAX TREATMENT OF TOBACCO PRODUCTS

Adam Smith, in his famous work The Wealth of Nations, argued that commodities such as sugar, rum and tobacco, though not necessary for life, are widely consumed, and thus good candidates for taxation. Research in India and around the world supports the use of taxes to regulate tobacco consumption. However, in India, tobacco taxes have not increased significantly since the implementation of the Goods and Services Taxation (GST) over five years ago, making these products increasingly affordable, as recent studies show.

In 2017, the economic burden and health-care expenses due to tobacco use and second-hand smoke exposure amounted to ₹2,340 billion, or 1.4% of GDP while India's average annual tobacco tax revenue stands at only ₹537.5 billion. Despite the government's goal of making India a \$5 trillion economy, the increasing affordability of tobacco poses a threat to this vision and could harm GDP growth. Tobacco use is also the cause for nearly 3,500 deaths in India every day, which impacts human capital and GDP growth in a negative way.

The issue is with the tax system

The current GST system for tobacco taxation in India has features that are hindering efforts in regulating consumption. One issue is the overuse of ad valorem taxes, which are not effective in reducing consumption. Many countries use a specific or mixed tax system for harmful products. The GST system in India relies more on ad valorem taxes than the pre-GST system, which primarily used specific excise taxes. Many countries with a GST or value-added tax (VAT) also apply an excise tax on tobacco products. In India, the share of central excise duty in total tobacco taxes decreased substantially from pre-GST to post-GST for cigarettes (54% to 8%), bidis (17% to 1%), and smokeless tobacco (59% to 11%). A large part of the compensation cess as well as the National Calamity Contingent Duty, or NCCD (it is levied as a duty of excise on certain manufactured goods specified under the Seventh Schedule of the Finance Act, 2001) currently applied on tobacco products is specific. If specific taxes are not revised regularly to adjust for the inflation, they lose their value. Inflation indexing should be made mandatory for any specific tax rates applied on tobacco products.

Discrepancies in product taxation

There is a large discrepancy in taxation between tobacco products. Despite cigarettes accounting for only 15% of tobacco users, they generate 80% or more of tobacco taxes. Bidis and smokeless tobacco have low taxes, encouraging consumption. Taxes should be made more consistent across all tobacco products, as none is more or less harmful than the others. The main principle behind tobacco taxation should be in protecting public health. Notably, bidis are the only tobacco products without a compensation cess under GST, despite being just as harmful as cigarettes. This lack of a cess on bidis has no public health rationale. The current six-tiered tax structure for cigarettes is complex and creates opportunities for cigarette companies to avoid taxes legally by manipulating cigarette lengths and filters for similarly named brands. Instead, the tiered system should be eliminated or reduced to two tiers, which can then be phased out over time to have a single tier.

The GST rates on certain smokeless tobacco ingredients such as tobacco leaves, tendu leaves, betel leaves, areca nuts, etc. have either zero or 5%-18% GST. It is important that all products that are exclusively used for tobacco making are brought under the uniform 28% GST slab. This will

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generate the right public health message — that all tobacco products are bad and their consumption needs to be discouraged.

Smokeless tobacco products in India are taxed ineffectively due to their small retail pack size (often 1/2 gram or less) which keeps the price low. To standardise and increase the retail price, mandatory standardised packing should be implemented for smokeless tobacco pouches (at least 50 g-100 g). This will also make it easier to implement graphic health warnings on the packaging.

GST currently exempts small businesses with less than ₹40 lakh annual turnover. Many smokeless tobacco and bidi manufacturers operate in the informal sector, which reduces the tax base on these products. While these exemptions are intended to protect small businesses, the public health rationale requires that they not be extended to businesses that produce or distribute tobacco products. Therefore, conditions should be imposed on these exemptions so that tobacco businesses do not benefit from them.

Before GST, taxing tobacco was a way for State governments to increase revenue and regulate consumption. For example, Rajasthan had a 65% VAT on tobacco products. After GST, States can no longer raise taxes on tobacco, which hinders their ability to increase revenue and regulate consumption. While a uniform tax across the country is good, not increasing it at the national level at regular intervals harms public health.

It is cause for concern that while most countries regularly increase taxes on tobacco products to make them less affordable, India has not increased taxes on any tobacco products in over five years. This may undo much of the progress seen in a 17% reduction in tobacco use from 2009-10 to 2016-17. Both the GST Council and the Union Budget should take the opportunity to significantly increase taxes on all tobacco products, including bidis, cigarettes, and smokeless tobacco, through hikes in excise duties or compensation cess.

THE FUNDING AND DEMAND FOR MGNREGA

The story so far:

The Economic Survey 2022-23 presented on January 31, a day ahead of the Budget, showed that 6.49 crore households demanded work under the Mahatma Gandhi National Rural Employment Guarantee Scheme (MGNREGS). Of these, 6.48 crore households were offered employment by the government and 5.7 crore actually availed it. The survey credited the scheme on having a positive impact on income per household, agricultural productivity, and production-related expenditure. It added that this helped with "income diversification and infusing resilience into rural livelihoods".

How important is MGNREGA to rural employment?

The Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) was passed in 2005 and aimed at enhancing the livelihood security of households in rural areas. Under it, the MGNREGS is a demand-driven scheme that guarantees 100 days of unskilled work per year for every rural household that wants it, covering all districts in the country except those with a 100% urban population. There are currently 15.51 crore active workers enrolled under the scheme. The types of projects undertaken for employment generation under MGNREGA include those related to water conservation, land development, construction, agriculture and allied works.





Under the scheme, if work is not provided within 15 days from when it is demanded, the worker has to be given a daily unemployment allowance. Additionally, the wages of unskilled workers also have to be paid within 15 days and in case of a delay, the Centre has to compensate them. Beyond being a form of insurance or safety net for the country's poorest rural households, the scheme proved to be beneficial not just for rural workers but migrant labourers as well especially during the COVID-19 pandemic which saw large-scale reverse migration.

During the first COVID-19 lockdown in 2020, when the scheme was ramped up, and given its highest-ever budget of ₹1.11 lakh crore, it provided a critical lifeline for a record 11 crore workers. Studies gave empirical evidence that wages earned under MGNREGA helped compensate somewhere between 20% to 80% of the income loss incurred because of the lockdown. This is reflected in the fact that the demand for work under MGNREGA spiked to record-high levels during the pandemic years. About 8.55 crore households demanded MGNREGA work in 2020-21, followed by 8.05 crore in 2021-22, compared to a total of 6.16 core households asking for work in the pre-pandemic year 2019-20.

While Finance Minister Nirmala Sitharaman said in the Lok Sabha during the Winter Session in December 2022 that the demand for jobs under MGNREGA has been declining in the recent past, the new economic survey data revealed that as of January 24 this year, 6.49 crore households had already demanded work under the scheme with two more months till the financial year ends. Notably, this demand-side figure is still larger than pre-pandemic levels, which indicates that despite the lifting of pandemic curbs and changes in migration trends, rural households are still demanding work under the scheme. Besides, the pandemic-induced demand surge notwithstanding, the Ministry of Rural Development informed Parliament in August last year work that demand under MGNREGS has doubled in the last seven years, that is, 3.07 crore households demanded work in May 2022 compared to 1.64 in the same month in 2015.

How has the Centre's allocation for MGNREGS changed over the years?

Budgetary allocations to the flagship scheme has increased successively since 2013 from ₹32,992 crore in the 2013-14 Union Budget to ₹73,000 crore in 2021-22. However, in recent years, the actual expenditure on the scheme has successively been higher than the amount allocated to it at the budget stage. For instance, in 2021-22, while ₹73,000 crore was allocated to MGNREGS, supplementary allocations made later pushed up the revised estimates to ₹98,000 crore, as funds had run out in the middle of the year. Even so, the Central government once again allocated ₹73,000 crore (25% lower than the previous year's revised estimate) for the scheme in budget 2022-23, then seeking an additional ₹45,000 crore as supplementary grants in the Winter Session in December.

The Parliamentary Standing Committee on Rural Development last year questioned the rationale behind the Centre's budgetary allocations to MGNREGA. Pointing out that despite the total expenditure on the scheme in 2020-21 being around ₹1,11,170.86 crore, the panel found it "perplexing" that the budget estimate (BE) for 2021-22 was just ₹73,000 crore. It also flagged the substantial hike in allocation at the revised estimates stage in order to augment the initial sum each year. Advocacy group NREGA Sangharsh Morcha noted that "every year, about 80-90% of the budget gets exhausted within the first six months", leading to a slowdown of work on the ground and a delay in wage payments to workers.





What are the challenges to its implementation?

While the scheme guarantees 100 days of employment per household per year, an analysis by PRS Legislative Research shows that since 2016-17, on average, less than 10% of the households completed 100 days of wage employment. Besides, the average days of employment provided per household under the MGNREGS fell to a five-year low this financial year. As of January 20 this year, the average days of employment provided per household is just 42 days, while it was 50 days in 2021-22, 52 days in 2020-21, 48 days in 2019-20 and 51 days in 2018-19. While a full 100 days of employment has not been provided per year, the Parliament Committee and activist groups have strongly recommended an increase in the number of guaranteed days of work per household from 100 to 150 so that rural populations have a safety net for a longer period in the year.

Notably, Peoples' Action for Employment Guarantee (PAEG) and the NREGA Sangarsh Morcha said in a joint statement on Tuesday, that if the government intends to provide legally guaranteed 100 days of work per household for at least those that worked in the scheme in the current financial year, that minimum budget for it in the upcoming financial year 2023-24 should be at least ₹2.72 lakh crore.

Another issue that continues to hamper the scheme's proper implementation is the delay in wage payments. As per data released by the Centre, it owed ₹4,700 crore in MGNREGA wages to 18 States as of December 14, 2022, when just three months remained for the financial year to end. Notably, In 2016, the Supreme Court of India directed the government to ensure that wages were paid on time, calling the act of making workers wait for wages for months equal to "forced labour". Additionaly, as of December 14, the government also owed ₹5,450 crore worth of material costs (for MGNREGA projects) to 19 States. Furthermore, the delay in material costs, has a domino impact on the MNREGA work, since a delay in payment breaks the supply chain. Because of the prolonged delays in payments, vendors are reluctant to supply materials for any new work. Another concern pointed out by a panel of the Rural Development Ministry is that the minimum wage rate under MGNREGS is fixed by the Centre on the basis of the Consumer Price Index-Agricultural Labourers. It noted that the type of work done by agricultural labourers and MGNREGS workers was different, suggesting that minimum wage be decided vis-a-vis the Consumer Price Index-Rural, which it said was more recent and provided for higher expenditure on education and medical care.

Fake job cards, widespread corruption, late uploading of muster rolls, and inconsistent payment of unemployment allowance are some of the other issues hampering the implementation of MGNREGA, the Parliamentary Committee pointed out last year.

MAHILA SAMMAN SAVINGS CERTIFICATE

"Commemorating Azadi Ka Amrit Mahotsav, a one-time new small savings scheme, Mahila Samman Savings Certificate, will be made available for a two-year period up to March 2025," she said.

The small saving certificate will have a fixed interest rate of 7.5% for two years. The deposit can be made in the name of a woman or a girl child. The maximum deposit amount has been kept at ₹2 lakh and the scheme will have a partial withdrawal facility as well. She said that women's self-help groups (SHGs) had achieved remarkable success under the Deendayal Antyodaya Yojana National Rural Livelihood Mission by mobilising rural women into 81 lakh SHGs.





"We will enable these groups to reach the next stage of economic empowerment through formation of large producer enterprises or collectives with each having several thousand members and managed professionally," she said.

The amount allocated to the Ministry of Women and Child Development saw an increase of ₹267 crore from ₹25,172.28 crore allotted in 2022-23. The largest allocation of ₹20,554.31 crore has been for the Saksham Anganwadi and POSHAN 2.0 schemes, while ₹1,472 crore has been allotted to Mission VATSALYA (Child Protection Services and Child Welfare Services), and ₹3,143 crore to Mission Shakti (Mission for Protection and Empowerment for Women).

Autonomous bodies, including the Central Adoption Resource Agency, the National Commission for Protection of Child Rights and the National Commission for Women, have been given ₹168 crore.

GOING GREEN

Finance Minister Nirmala Sitharaman's latest Budget is noteworthy for the emphasis she has laid on the government's commitment to move towards net-zero carbon emission by 2070. As an article presented at the World Economic Forum's Annual Meeting in Davos last month notes, India holds the key to hitting global climate change targets given its sizeable and growing energy needs. With the country's population set to overtake China's some time this year, India's appetite for energy to propel the economy is set to surge exponentially. The transition to green alternatives from the current reliance on fossil fuels is therefore an urgent imperative and an opportunity to leverage this move to catalyse new industries, generate jobs on a sizeable scale, and add to overall economic output. In a nod to this, Budget 2023-24 devoted a fair amount of space to the green industrial and economic transition needed. With the electric vehicle (EV) revolution poised to take off as every automobile major rolls out new EV models to tap demand, the availability of indigenously produced lithium-ion batteries has become a necessity, especially to lower the cost of EVs. The Budget hearteningly proposes to exempt customs duty on the import of capital goods and machinery required to manufacture lithium-ion cells used in EV batteries. This ought to give a fillip to local companies looking to set up EV battery plants.

Another key proposal relates to the establishment of a viability gap funding mechanism to support the creation of battery energy storage systems with a capacity of 4,000 MWh. Energy storage systems are crucial in power grid stabilisation and essential as India increases its reliance on alternative sources of power generation including solar and wind. With wind turbine farms and solar photovoltaic projects characteristically producers of variable electric supply, battery storage systems become enablers of ensuring the electricity these generators produce at their peak output is stored and then supplied to match the demand arriving at the grid from household or industrial consumers. Ms. Sitharaman also set aside a vital ₹8,300 crore towards a ₹20,700 crore project for building an inter-State transmission system for the evacuation and grid integration of 13 GW of renewable energy from Ladakh. With its vast stretches of barren land and one of the country's highest levels of sunlight availability, Ladakh is considered an ideal location to site photovoltaic arrays for producing a substantial capacity of solar power. The transmission line will help address what had so far been the hurdle in setting up solar capacity in the region, given its remoteness from India's main power grid.





WHY A PROPOSED CHANGE IN ANGEL TAX HAS RATTLED INDIAN START-UPS

The move could adversely impact financing available to the start-ups, which have already been reeling under a funding winter since 2022, industry insiders are speculating.

A recently proposed detail has Indian start-ups worried. These new age firms, that offer their shares to foreign investors, may have to pay 'angel tax', which was earlier only supposed to be paid for investments raised by resident Indian investors, as per a motion made in the Finance Bill, 2023.

The move could adversely impact financing available to the start-ups, which have already been reeling under a funding winter since 2022, industry insiders are speculating.

What exactly is the proposed change?

The Finance Bill, 2023, unveiled by Finance Minister Nirmala Sitharaman on Wednesday, has proposed to amend Section 56(2) VII B of the Income Tax Act.

The provision states that when an unlisted company, such as a start-up, receives equity investment from a resident for issue of shares that exceeds the face value of such shares, it will be counted as income for the start-up and be subject to income tax under the head 'Income from other Sources' for the relevant financial year.

However, with the latest amendment, the government has proposed to also include foreign investors in the ambit, meaning that when a start-up raises funding from a foreign investor, that too will now be counted as income and be taxable.

For instance, if the fair market value of a start-up share is Rs 10 apiece, and in a subsequent funding round they offer it to an investor for Rs 20, then the difference of Rs 10 would be taxed as income.

Section 56(2) VII B of the Income Tax Act, colloquially known as the 'angel tax' was first introduced in 2012 to deter the generation and use of unaccounted money through the subscription of shares of a closely held company at a value that is higher than the fair market value of the firm's shares.

Why are start-ups concerned?

The ch<mark>ange comes as the funding for India's start</mark>ups dropped by 33 per cent to \$24 billion in 2022 as compared to the previous year, according to a PwC India report released in January.

Foreign investors are a key source of funding for the start-ups and have played a big role in increasing the valuation. For instance, Tiger Global, one of the most prolific foreign investors in India, has invested in over a third of the start-ups that have turned unicorn, with a valuation of at least \$1 billion.

"Non-resident investors were never under the scope of this tax...We are all hoping that this is a mistake," Ritesh Kumar, Partner, J Sagar & Associates, said.

"This could compel more startups to flip overseas, as foreign investors may not want to deal with additional tax liability by virtue of their investment in the startup," said Siddarth Pai, co-founder of VC firm 3one4 Capital. "The re-introduction is completely counter-intuitive to the entire move of reverse-flipping. This, in fact, will accelerate flipping overseas," Pai added.





VEHICLE SCRAPPING POLICY REVVED UP TO DRIVE GREEN ECONOMY

The Union Budget for 2023-24 has laid special emphasis on vehicle scrapping policy by allocating adequate funds to replace vehicles that are over 15 years.

The move has been hailed by the automobile manufacturers as it would provide a significant opportunity for fleet modernisation and reduce fossil fuel consumption.

While presenting the Union Budget on Wednesday, Finance Minister Nirmala Sitharaman said all vehicles owned by the Union and the State governments including buses owned by transport corporations and public sector undertakings that have been on the road for over 15 years will be scrapped.

"Replacing old polluting vehicles is an important part of greening our economy. To further the vehicle scrapping policy mentioned in Budget 2021-22, I have allocated funds to scrap old vehicles of the Central government. States will also be supported in replacing old vehicles and ambulances," she said.

WHAT IS THE GOVERNMENT'S NEW POLICY OF UPI FOR NRIS?

The story so far:

On January 10, the National Payments Corporation of India (NPCI) paved the way for international (phone) numbers to be able to transact using UPI. A day later, the Union Cabinet approved an incentive scheme for the promotion of RuPay debit Cards and low-value BHIM-UPI transactions (person-to-merchant) in FY 2022-23. The scheme has an outlay of ₹2,600 crore.

What about international numbers?

In a nutshell, non-resident accounts such as non-resident external accounts (NRE) and non-resident ordinary accounts (NRO), having international numbers, will now be allowed into the UPI payment system. The NPCI had allowed UPI transactions to and from NRO/NRE accounts linked to Indian numbers back in October 2018.

NRE accounts are those used by non-residents to transfer earnings from foreign soil to India while NRO accounts are used to manage income earned in India by non-residents. These incomes could be rent, interest, pension, among other things. At present, users from ten countries will be able to avail the facility—Singapore, Australia, Canada, Hong Kong, Oman, Qatar, the U.S., Saudi Arabia, UAE, and the U.K.

Deep Agrawal, Head of Payments at online payment app PhonePe, told The Hindu that the development would allow NRIs to use the payment method for making utility bill payments for their families (or themselves) in India, make purchases from e-commerce or online platforms and make payments to physical merchants who accept UPI QR based payments when they travel to India.

Addressing the infrastructural and technological changes required to support such payments, he said, "Currently, all the internal systems as well as ecosystem players such as banks, NPCI, etc only understand India-based mobile numbers for UPI transactions. With this enablement, a significant number of systems will need to start understanding the same."

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What is the discussion on MDR?

The Merchant Discount Rate (MDR) is the charge recovered by the acquirer from the final recipient of the payment, that is, the merchant. It is collected by the acquirer to compensate the varied service providers and intermediaries in the payment system.

Presently, there is no MDR charge levied for RuPay-based debit card and UPI transactions. Stakeholders are hence concerned over cost recovery for the services they provide. In August 2022, the Finance Ministry tweeted that it was not planning to levy any charges for UPI services, adding, "The concerns of the service providers for cost recovery have to be met through other means."

The Reserve Bank of India (RBI) and varied stakeholders expressed concerns about the potential adverse impact of the zero MDR regime on the growth of the digital payments' ecosystem. The NPCI requested the incentivisation of BHIM-UPI and RuPay debit card transactions to create "cost-effective value proposition for ecosystem stakeholders, increase merchant acceptance footprints and faster migration from cash payments to digital payments."

Where does UPI stand now?

As of latest available data, 6,779.6 million transactions worth about ₹10.95 lakh crore have been facilitated using UPI. In the previous calendar year, excluding one month of fall (between January and February), UPI transactions have been on an upward trajectory. As per the DigiDhan dashboard maintained by the Ministry of Electronics and Information Technology, BHIM-UPI accounted for 52% of all digital payments in FY 2021-22. At present, it stands at 59.74%.

HOW WILL THE T+1 SETTLEMENT CYCLE IMPACT MARKETS?

The story so far:

On January 27, stock markets in India concluded its transition to the T+1 settlement regime. It has became the second largest market after China to have made the transition ahead of the U.S., Europe and Japan which adhere to the T+2 settlement cycle. The phased transition had begun on February 25 last year following markets regulator Securities and Exchange Board of India (SEBI)'s circular in September 2021.

What is the T+1 settlement cycle about?

A trade involves three important functions, execution of trade, clearing and settlement, carried out by separate entities. The clearing function entails the concerned entity determining the obligation of what is due to be delivered and what is to be received by the parties involved. Risk assessment of both parties is carried out at this stage. The process ensures that the parties have enough funds or transferrable assets for the transaction to go through. On the settlement date, funds and securities are transferred to their new owners. All of it is preceded by purchase or sale of a stock. It is represented using "T", that is, trade executed on a particular day. Since clearing used to take place the next day followed by another day for settlement, the previous mechanism was defined as "T+2". From now onwards, the settlement will be done the next day itself, thus, T+1.

About the infrastructural changes made for the transition, the Bombay Stock Exchange (BSE) told The Hindu, "At our end, we have kept our infrastructure ready to take care of additional activities in the T+1 settlement cycle, including updation of securities settlement data, real-time monitoring





systems, margin computation, settlement activities etc, within the reduced time cycles." The exchange said it did not observe any gaps, and all processes were managed smoothly.

In a digital age, why is a settlement not done instantly?

The process is complex and there are many entities involved. Founder & CEO of brokerage firm Zerodha, Nithin Kamath, had stated in a post, "While instant settlement is impossible, even T+0 is extremely tough considering the time required for brokers to crystalise the obligations and then clearing corporations to settle." It is important to note that an investor cannot directly buy or sell shares on a stock exchange. Registered members of a stock exchange, called stock brokers, trade on an investor's behalf. Even though individuals can open a demat account on their own by contacting a depository participant (DP), they would require a trading account, which is provisioned by a SEBI-registered broker, to purchase or sell shares. The size and operational capability of the individual broker is another important factor.

What is the debate around the T+1 regime?

Global investment associations, including Asia Securities Industry & Financial Markets Association, Asia Trader Forum and The Investment Association (IA) in a joint open letter (in September 2021) had observed the transition would require "end-to-end process redesign and substantial technology investments and enhancements to support near real-time processing capabilities and necessitating an extended migration timeline." It added that this would be particularly true for overseas investors (such as those based in the U.S. and Europe) for participating in the Indian market owing to time zone differences and involvement of multiple parties (such as global and local custodians, FX banks and brokers) in different jurisdictions.

Milan Vaishnav, founder of Chartwizard FZE and Gemstone Equity Research, told The Hindu, "What happened till now is they would take some time in allocation of trade to the client, which will now have to be faster," adding, "The time zone difference too would pose some difficulties but ultimately they will align themselves." The United States' Securities and Exchange Commission (SEC) had also argued in its proposal (February 2022) that the more days that elapse between the execution of a trade and a counterparty default, the greater would be the variance of price change. In other words, it is likely that the asset's price would deviate from the execution price. According to Mr. Vaishnav, from an investor standpoint, "The rotation of money would become swifter. Further, you would be keeping less margins with the broker, obligations would be a day shorter and receipts would also come a day earlier than before. Overall, it would lead to some reduction in the overall margin obligations of the retail investor or the trader." For brokerages, Mr. Vaishnav states that it would reduce the amount of margin they keep with clearing houses because the settlements would be faster.

GOVT OKS \$2-BILLION DEBT-TO-EQUITY PLAN FOR VODAFONE IDEA

The Union government Friday cleared a long-awaited plan to convert Vodafone Idea's (Vi) interest dues worth more than ₹16,000 crore (or \$2 billion) into equity, paving the way to become the single largest shareholder in the cash-strapped telecom company.

The government gave the green light after receiving an assurance from Vi's promoters that they would infuse additional capital in the company — smoothing out a key wrinkle in the process. Union Minister of Communications Ashwini Vaishnaw Friday said: "We had sought a firm commitment that the Aditya Birla Group would run the company and bring necessary





investments. Birlas have agreed and hence we have agreed to convert. We want India to be a three-player market plus BSNL and ensure healthy competition for consumers."

Vi had been awaiting the move ever since the government announced a relief package for the telecom sector in September 2021, allowing it to convert interest on deferred adjusted gross revenue owed to the government into equity. The delay in implementing this plan had left the troubled telco in a Catch-22 situation — the government was understood to be unwilling to move the needle on equity conversion until the telco received additional funding, and investors were understood to be waiting for the government to move first.

In a regulatory filing Friday evening, Vodafone Idea said: "Ministry of Communications, Government of India has, in line with the Reforms and Support Package for Telecom Sector communicated earlier and the conversion option exercised by the Company as provided for therein, passed an order today i.e. 3 February, 2023 under section 62(4) of the Companies Act, 2013, directing the Company to convert the NPV of the interest related to deferment of spectrum auction instalments and AGR Dues into equity shares to be issued to the Government of India". "The total amount to be converted into equity shares is Rs. 16133,18,48,990. The Company has been directed to issue 1613,31,84,899 equity shares of the face value of Rs. 10 each at an issue price of Rs 10 each," it added.

Reeling under a debt burden of over ₹2 lakh crore, Vi had opted to convert more than ₹ 16,000 crore of interest liability payable to the government into equity. This will amount to around a 33 per cent stake in the company. The promoters' holding will come down to 50 per cent from 74.99 per cent. The latest development, however, solves only a part of the problem for Vi.

Two years back, Vi had approved plans to raise Rs 25,000 crore. Of this approved amount, the company has been able to raise Rs 5,000 crore from the promoters. Also, Vi's proposal to settle dues of Rs 1,600 crore with equipment vendor ATC Telecom Infrastructure through the issue of equity-convertible debt bonds has already lapsed once. This was because the issuance of bonds to ATC was subject to conversion of interest dues into equity by the government.

Analysts said that the government order to convert the telco's dues into equity could encourage investors to infuse capital in the company. As of September, Vi had a net debt of around Rs 2.2 lakh crore. The company's dues to banks and other lenders totalled Rs 15,080 crore.

THE RECENT WAVE OF TECH LAYOFFS

The story so far:

The New York-headquartered International Business Machines Corp. (IBM) became the latest to join the list of tech companies that have made large-scale layoffs since late 2022. The company said it would be laying off about 3,900 employees. This comes on the heels of what has been described as Big Tech's "midlife crisis" or the clock striking "midnight" on its hyper-growth; technology giants Alphabet, Amazon, Meta, and Microsoft have announced the slashing of thousands from their workforce in the last couple of months.

Who has made layoffs?

In 2022, the tech sector shed more than 1,50,000 employees, with several more job cuts (over 40,000) being announced since the start of the new year. Four of the biggest tech companies in the U.S.— Google-parent Alphabet, Amazon, Microsoft, and Facebook-owner Meta accounted for





51,000 of the total tech layoffs announced in the last few months. According to consulting firm Challenger, Gray & Christmas Inc., tech sector layoffs in 2022 were up 649% compared to the previous year.

Facebook-owner Meta Platforms Inc. announced in November last year that it cut more than 11,000 jobs or 13% of its workforce. The mass layoffs were the first of their kind in Meta's 18 years of operation.

The Bill Gates-founded tech corporation, Microsoft headquartered in Washington announced that it would cut 10,000 jobs or less than 5% of its headcount by March 2023, taking a \$1.2 billion charge to its earnings.

Likewise, in early January, e-commerce, cloud computing, and streaming giant Amazon and America's second-largest private employer after Walmart, said it would cut 18,000 jobs or 6% of its workforce in company-wide layoffs.

Alphabet, the parent company of Google, said on January 20 in a staff memo by boss Sundar Pichai, that it would be cutting 12,000 jobs or 6% of its workforce.

Similarly, music streaming platform Spotify's CEO Daniel Ek disclosed in an all-staff memo that the company would cut 6% of its global workforce, laying off approximately 600 people.

San Francisco-headquartered tech company Salesforce announced on January 4 that it was laying off 10% of its jobs and closing down some offices.

Following Tesla CEO Elon Musk's \$44 billion takeover, social media company Twitter Inc. made aggressive job cuts, laying off half of its workforce or about 3,700 employees in various departments like communications, content curation, product, and engineering.

Additionally, networking and collaboration solutions firm Cisco said in November that it would lay off 5% of its workforce as part of a restructuring. Computer maker HP also said it would cut up to 6,000 jobs by the end of the fiscal year 2025.

Do they affect Indian professionals?

As per some industry insiders, between 30% to 40% of those laid off are Indian IT professionals, a significant number of whom are on H-1B and L1 visas. The H-1B visa is a non-immigrant visa that allows U.S. companies to employ foreign workers in special occupations that require theoretical or technical expertise. Technology companies depend on it to hire tens of thousands of employees each year from countries like India and China. A sizeable number of them are now scrambling for options to stay in the U.S. in order to find a new job before their work visas expire.

How huge are these Big Tech layoffs?

The advent of the coronavirus pandemic brought along rapid growth for the tech sector as work became increasingly remote, e-commerce grew amid lockdowns across the world, and housebound people spent more and more time online. Riding on the accelerating growth, Big Tech companies and even some small ones went on a hiring spree from the start of the pandemic.

Case in point are four of America's biggest technology companies. Amazon's headcount increased from 7,98,000 in 2019 to a whopping 15,44,000 in 2022, before the recent layoffs, doubling its employee base. During the same period, Microsoft went from 1,44,000 employees to 2,21,000.





Sundar Pichai-headed Google parent Alphabet went from a headcount of 1,18,899 to 1,86,779. Mark Zuckerberg's Meta, meanwhile, more than doubled its headcount, from close to 45,000 to over 87,000.

Analysts are near-unanimous in saying that big tech companies are "rightsizing" their growth, instead of downsizing, as pointed out to NPR by Columbia Business School professor Daniel Klum. An analysis by The Washington Post notes that tech companies who hired aggressively in the pandemic, probably envisioning rapid growth to be the "new normal", are now trying to shrink headcounts back to where they would have been if not for the hyper-growth offered by the pandemic. This was evident in the introspective notes struck by company CEOs while announcing layoffs, with a lot of them admitting that they might have over-hired. Apple, which hired modestly in the last couple of years, remains an outlier, and has held off on job cuts so far.

Twitter, meanwhile, saw layoffs in the aftermath of Mr. Musk's turbulent takeover, who was certain that the platform could run without half of its earlier workforce.

Meta CEO, Mr. Zuckerberg who doubled his workforce in the pandemic years, for instance, said he was wrong to assess that revenue gains during that period were "permanent acceleration". He said in a message to employees: "Not only has online commerce returned to prior trends, but the macroeconomic downturn, increased competition, and ads signal loss have caused our revenue to be much lower than I'd expected. I got this wrong, and I take responsibility for that."

Similarly, Alphabet and Google CEO Sundar Pichai said on January 20, "Over the past two years we've seen periods of dramatic growth. To match and fuel that growth, we hired for a different economic reality than the one we face today". Amazon CEO Andy Jassy said in a public staff note on January 5, that this time around, annual planning had "been more difficult given the uncertain economy and that we've hired rapidly over the last several years". Notably, despite the layoffs being larger in number, The New York Times pointed out how they only reverse a fraction of the pandemic hiring by these companies. A Reuters analysis showed that even if all tech firms were to cut 5% of their workforce, tech employment would still be at 4.2 million (nearly 5% larger than it was at the end of 2019).

Do the layoffs signify trouble for the tech industry?

Growth has indeed slowed down from pandemic levels, as pointed out by the CEOs. Analysts also project that the five Big Tech companies, including Apple, are headed to report dismal profits for the October to December (2022) period. A Reuters analysis states that Amazon is expected to report that earnings fell 38% and that revenue growth is at its slowest pace in more than 22 years. Meta, meanwhile, could take a steep 42% plunge in profits. Nonetheless, these tech companies, still remain huge and profitable. Microsoft reported a more than \$16 billion profit in the quarter ending December 2022, compared to a profit of about \$11.6 billion in the same period in 2019. Meta, while reporting a 52% decline from a year earlier, earned a profit of \$4.4 billion in the quarter ending September 2022.

Besides, analysts like Sam Abuelsamid of Guidehouse Insights, told NPR that the job cuts are a form of belt-tightening "meant to send a message to shareholders at a time when tech companies have seen their stock prices plunge". Alphabet's shares, for instance, had fallen 30% in the past 12 months, in the backdrop of an overall 24% slump in the larger tech industry. Abuelsamid said the firms were showing investors that they are "being prudent', and want to come back to a growth path after overzealous spending. This was reflected in Mr. Pichai's remarks that it was time for the company to "sharpen its focus", reengineer its cost base and direct talent and capital to its "highest





priorities". Meta is also looking to rein in costs after its metaverse investments failed to gather steam.

Moreover, these companies have also made significant investments in the recent past, especially in Artificial Intelligence-driven tech. For instance, while cloud revenues have seen a dip, Microsoft is eying an extension to its \$1-billion stake in OpenAI, the startup behind the viral new chatbot ChatGPT. It also looking to acquire video game firm Activision Blizzard, which would then bring along a 10,000-strong workforce. Smaller startups, meanwhile, who also capitalised on the pandemic digital boom, are trying to rein in costs while facing reluctance from venture capitalists to bet on their projects.

What do the layoffs say about the larger U.S. job market?

Notably, while the tech sector is seeing job cuts, labour department data shows the larger U.S. job market is still robust, with the number of Americans filing new claims for unemployment benefits falling. Economist Jennifer Lee told Bloomberg that the tech layoffs are not a "bellwether of the entire labour market". Analysts point out that tech companies represent about 2% of all employment in the country, compared to larger sectors which are still hiring. The labour market has remained resilient despite the Fed's aggressive measures to bring down inflation.

WHY IS AIR INDIA IRKED WITH DGCA PENALTY?

The story so far:

Air India has called as excessive the Directorate General of Civil Aviation's (DGCA) decision to suspend the licence of one of its pilots for a period of three months following the November 26 incident on a New York-Delhi flight where a lady passenger complained that a co-traveller had urinated over her. The incident went without being reported to the DGCA or the accused being handed over to the police. Six airline employees' unions have also demanded a withdrawal of this 'harsh' punishment.

What is the penalty imposed by the DGCA?

On January 20, the DGCA announced a total of three punishments for Air India and two of its personnel for an incident on November 26, 2022 on a New York -Delhi flight where 34-year-old Shankar Mishra, who is in judicial custody, allegedly urinated over a senior citizen lady passenger in a heavily inebriated state but walked away as the airline failed to hand him over to the police after the flight landed. It announced a fine of ₹30 lakh on Air India, suspension of the licence of the pilot-in-command Captain Narayan Ramprasad for three months, and a fine of ₹3 lakh on the director of in-flight services of Air India for failing to discharge her duties.

The incident raised questions not only about a misdemeanour against a lady passenger which can amount to a potential sexual assault going unreported, but also the airline's protocols in dealing with an incident that can endanger the safety of an aircraft.

What rules form the DGCA's decision?

The DGCA has cited two important rules to explain its action, of which the first pertains to Civil Aviation Requirement, (Section 3- Air Transport Series M Part VI) which deals with handling of unruly passengers. The rules recognise that an unruly passenger can jeopardise the safety of a flight and lay down the duties of an airline in training its crew and developing SOPs to ensure





timely identification of potential unruly passengers at check-in, in the lounges, at the boarding gate or any other place in the terminal building. It requires an airline representative to file an FIR once the aircraft lands with the concerned security agency at aerodrome, to whom, the unruly passenger shall be handed over. The airline is also expected to form an internal committee to probe the incident. The second rule is Rule 141 of the Aircraft Rules, 1937 which defines the responsibility of a pilot-in-command (PIC) who has to "supervise and direct the other members of the crew in the proper discharge of their duties in the flight operations". In addition to being responsible for the operation and safety of the aircraft during flight time, the PIC is also "responsible for the safety of the passengers and cargo carried and for the maintenance of flight discipline and safety of the members of the crew."

Why have Air India and employee unions raised objections?

In a public statement on January 24, Air India while calling the DGCA's punishment for its PIC "excessive" and announcing that it will be providing him assistance to appeal against the decision, explained that it believed its pilot and cabin crew had acted in "good faith" and couldn't have identified the accused passenger, as unruly since he was "calm, co-operative and did not appear intoxicated to the crew" and that "in the judgment of the crew, the alleged perpetrator posed no risk to flight safety at any time". It also added that there had been a mutual settlement between the accused and the lady passenger who levelled allegations against him, and there were no eyewitnesses to the incident, and to ask the crew to make a presumption of the accused's guilt would be "contrary to natural justice".

The unions asked the DGCA in a joint letter to "withdraw the harsh punishment and suspension" of the PIC as he filed all reports "instantly upon landing" but the Air India management and senior officials failed to act upon them and report the matter to the DGCA within the 12-hour window. They have also raised questions about Air India's internal committee report on the incident and called it full of "inadequacies and inaccuracies" that also failed to provide the pilots and cabin crew an opportunity to appear before it, therefore, resulting in a "miscarriage of justice".

But a senior government official closely involved with the matter said, "the pilot and crew can't act like the judge and the jury. They have to believe the lady passenger and file a complaint and let the police do its job."

Is the punishment harsh?

Such a punishment is not considered unusual at all. In 2022, according to DGCA data, there were a total 115 enforcement actions against pilots which included warnings in 37 cases, suspensions in 77 cases and withdrawal of licence in one case. A total of 113 cabin crew and seven ATCOs (air traffic control officers) also faced suspensions. The ground for such enforcement action against a pilot can vary from reporting for duty under the influence of alcohol, or flying through turbulence despite being cautioned or flying a plane despite knowledge of a technical glitch and jeopardising the safety of the passengers. "If the DGCA issued a showcause notice to the pilot and found his response inadequate, then the action is justified as the PIC is in-charge of the safety of the aircraft. But we may argue about the quantum of punishment handed out, as the rules don't define that and the DGCA can arbitrarily decide on that," said aviation safety expert Mohan Ranganthan. A three-month suspension could set a pilot back by nearly ₹20 lakh-₹24 lakh, while the airline itself has a ₹30 lakh fine.





LIFE & SCIENCE

RAPIDLY WARMING ARCTIC LINKED TO EXTREME COLD WEATHER IN THE US: WHAT A NEW STUDY SAYS

As a deadly blizzard grips the United States, leading to the death of more than 60 people as of Tuesday and complete disruption of normal life, scientists have once again started to discuss if the rising temperatures of the Arctic are responsible for extreme cold conditions in the country and other areas of the Northern Hemisphere.

According to a report in The Washington Post, the discussion gained momentum after a recent study, published in Science.org, revealed how the rapid warming of the Arctic might be allowing frigid air in the region to move southward more frequently than ever before. However, scientists said they need more data to arrive at a consensus about the claim.

What are the findings of the study?

The study largely focused on something called the polar vortex, which is a mass of cold, low-pressure air that consistently hovers over the Arctic region. It is denoted by the word "vortex" because it spins counter-clockwise, just like a hurricane does.

Usually, the polar vortex remains strong and compact, meaning the mass of frigid air stays at the North Pole. But sometimes it weakens, like a wobbling top, and expands to influence the jet stream — an area of fast-moving air high in the atmosphere that surrounds the polar vortex. Once the jet stream is impacted, the cold polar air finds its way towards the mid-latitude regions.

In the study, researchers found that the expansion of the polar vortex has been occurring more than twice as often in recent years and the reason for it is the rapidly warming Arctic.

DEMENTIA: THE NATURE OF THE DISEASE, HOW IT PROGRESSES AND WAYS YOU CAN HELP OTHERS

According to a 2020 report, there are around five million people in India living with dementia. There needs to be more awareness on brain illness and what people can do to prevent its onset. A senior geriatric psychiatrist and neuro-physician explains

Dementia is a clinical syndrome caused by a range of diseases or injuries to the brain. Worldwide, 47.5 million people have dementia, and up to 135.5 million could by 2050. According to a 2020 report, there are around five million people in India living with dementia.

Clinical presentation

The most common cause of dementia is Alzheimer's disease, which is implicated in up to 70% of dementia diagnoses. Early symptoms include absent-mindedness, difficulty recalling names and words, difficulty retaining new information, disorientation in unfamiliar surroundings, and reduced social engagement. Atypical symptoms include impairment in recognising visually presented objects despite a normal visual field, acuity and colour vision. Some might also experience word-finding difficulties.

As the disease progresses, there is a marked memory loss and loss of other cognitive skills, including reduced vocabulary and less complex speech patterns. This may be accompanied by





mood swings, apathy, a decline in social skills, and the emergence of psychotic phenomena. Advanced disease is characterised by monosyllabic speech, psychotic symptoms, behavioural disturbance, loss of bladder and bowel control, and reduced mobility.

Evaluating dementia

Doctors diagnose dementia on clinical grounds using neuroimaging and neuropsychological tests. The first step is to obtain a comprehensive medical history of the individual from a reliable informant, that is someone who knows the individual well. Informants themselves can be influenced by their own mental states, so it is useful to speak with more than one informant.

A dementia that progresses slowly, over years, may point to Alzheimer's dementia. A dementia that progresses rapidly, over months, may point to dementia due to prion disease. It's useful to determine when the individual was last well instead of when the symptoms first showed themselves. Informants frequently minimise early symptoms by attributing them to "normal ageing".

Dementia affects cognition. Therefore, a cognitive assessment is central to evaluating dementia, using certain neuropsychological tests. The severity of dementia can be 'mild', 'moderate' or 'severe' based on the mini-mental state examination score. Further work-up using laboratory studies and brain-imaging will be required in most instances. However, as of today, there is no genetic or biomarker test that can be used to diagnose dementia.

Preventing dementia

The WHO has identified preventing Alzheimer's disease to be key to fighting the world's dementia epidemic. Economic analyses have found that delaying the onset of the disease by even one year could reduce its prevalence by 11%.

Prevention programmes usually focus on lifestyle risk factors together with mental well-being and risk of cardiovascular diseases. At least two large studies, in 1996 and 2009, have demonstrated a strong relationship between mid-life hypertension and dementia in later life. Current smokers have a 50% higher risk of developing dementia relative to those who have never smoked. Smoking cessation is known to reduce the risk to the level of never-smokers. Regular exercise helps offset cardiovascular health risks and improves cerebral perfusion, synaptic function, and stimulates the growth of new brain cells in the hippocampus.

There is also a robust link between depression in late life and the incidence of sporadic dementia. Having depression almost doubles the risk of developing dementia. So, treating depression in persons with established cognitive impairment is vital. Higher educational and occupational attainments have consistently been implicated as protection against developing dementia later in life. This is probably a result of the longer period of learning, which stimulates the development of larger and/or more complex neural networks.

How to treat dementia

Dementia care has four pillars. The first two include managing the important aspects of the disease, with a goal to reverse their effects or to delay its progression in the brain as well as managing the cognitive, neuropsychiatric, and functional symptoms. The other two pillars involve providing systematic, evidence-based supportive care to patients and to carers.





An ideal care-team includes a psychiatrist, occupational and physical therapists, a nurse, a psychologist, and a social worker. Non-pharmacological interventions form the first line of therapy except in emergencies. But over time, medicines often become integral to the care regime. Cognitive symptoms associated with dementia are treated with cholinesterase inhibitors. They have modest and temporary effects in 10-15% of persons with dementia and their effects last 6-12 months. They don't stop or reverse the degenerative process. However, the 2009 DOMINO study created the prevailing consensus that cholinesterase inhibitors shouldn't be stopped just because the point of severe dementia has been reached. There are some additional benefits to long-term treatment.

Dementia has some behavioural and psychological symptoms that precipitate a loss of independence, more responsibilities for carers, and early placement in nursing care. They require non-pharmacological interventions. Neuropsychiatric symptoms of dementia respond modestly to aromatherapy, physical therapy, and music therapy, among others.

Future trends

In the 2013 FINGER trial, researchers selected an ultra-high-risk population for dementia and trialled multi-domain interventions, involving changes to nutrition, physical activity, education, and cognitive training. The intervention group's cognitive outcomes improved 25-150% compared to the control group, which only received health advice.

Future studies will aim to demonstrate the benefit of such interventions on this principal public health outcome — the time before dementia onset. Despite large gains that may accrue from controlling risk factors, we will still need disease-modifying therapies to reduce the global burden of dementia.

We will also need a cultural transition — moving from dementia to a framework of brain health will destignatise cognitive decline, empower people to take more responsibility towards prevention, and encourage society to adopt inclusive solutions to maintain functional independence.

