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KHASI COUNCIL ORDER ON FATHER'S SURNAME SETS OFF WAR OF WORDS IN MATRILINEAL MEGHALAYA

RAHUL KARMAKAR
GUWAHATI

A tribal council's order not to issue a Scheduled Tribe (ST) certificate to any Khasi person who adopts the surname of her or his father has triggered a war of words in matrilineal Meghalaya.

The Khasis, numbering about 1.39 lakh, are one of the three indigenous matrilineal communities in the north-eastern State. The other two are Garos and Jaintias.

KHADC criticised

The Voice of the People Party (VPP), an 18-month-old political entity that won four Assembly seats in the February 27 election, has been critical of the order of the Khasi Hills Autonomous District Council (KHADC) order about a month ago.

In that order, the KHADC directed the headmen of all villages and urban localities across the Khasi domain not to issue ST certificates to those who adopt their father's surname instead of sticking to tradition by taking their mother's clan name.

"I will fight for my children if there is an attempt to take away their right of being called Khasis," VPP president and MLA Ardent Miller Basaiawmoit said at a public meeting in the State's Nongpoh recently.

His children are using his surname. "Why can they not be considered Khasi when my wife and I are Khasis?" he asked.

"We cannot use the surname of the father as we are a matrilineal society. This is applicable to Basaiawmoit and every other Khasi," KHADC's chief executive member, Titosstarwell Chyne said.

Lineage Act

He alluded to sections 3 and 12 of the Khasi Hills Autonomous District Khasi Social Custom of Lineage Act, 1997, which says only those following the custom of using their mother's surname will be identified as a Khasi.

'Preserving tradition'

Asserting that the KHADC was committed to the preservation and



The Khasis, numbering about 1.39 lakh, are one of the three indigenous matrilineal communities in Meghalaya. Ritu Raj Konwar

protection of the age-old tradition of the community, Mr. Chyne also said it is mandatory for any Khasi woman who marries a non-Khasi needs to obtain the Khasi tribe certificate for applying for the ST certificate for her children.

Men's rights activists among the Khasis have been fighting for switching over from the matrilineal to the patrilineal system since the 1960s.

A bid by a group called Iktiar Longbriew Manbriew, meaning right to live, was short-lived but its successor, Syngkhong Rympei Thymmai (home and hearth restructured) has been sustaining the crusade since its birth in 1990. The Syngkhong Rympei Thymmai has more than 4,000 members today.

WITH MILITANTS CHANGING TACK, RAJOURI-POONCH SECTOR AN UPHILL TASK FOR SECURITY AGENCIES



Obstacle course: Official sources say this region is in need of more police and Army personnel. File photo

PEERZADA ASHIQ
RAJOURI/POONCH

Militants are changing tack in the Pir Panjal valley to outsmart the security agencies and survive longer in a region with a topography "as tough as Afghanistan's mountains", officials say.

The valley spans the twin districts of Rajouri and Poonch and 225 km of the Line of Control (LoC) with Pakistan-occupied Kashmir (PoK).

The Poonch-Rajouri sector has witnessed 18 deaths — 10 Army jawans, seven civilians and one militant — so far this year. The casualties of both security forces and civilians are much higher than in the militancy-hit Kashmir Valley, where one Army jawan and one civilian were killed by militants in the same period.

This seems to indicate that militants have shifted their focus to a new region once declared a zero-military zone with waning militant activities from 2007 to 2019.

The questioning of over 225 residents living in and around Batta Durian in Poonch's Mendhar sector after the April 20 attack, which left five truck-borne soldiers dead, has thrown light on the new modus operandi of militants.

A senior security official told The Hindu that the arrest of Nisar Ahmad, a local from Gursai village in Poonch and his three relatives, has provided "clues

on the operations of the hiding militants”.

“After infiltration, they [infiltrators] either head towards a sympathiser, whose geo-coordinates are known and fed to their phones, like that of Ahmad, or take shelter in the houses in higher ridges forcibly,” the official said.

It is not just the spike in militant activities that is a cause of concern among security agencies, but also the change in strategy, the use of “smarter” sleeper cells, the impenetrable means of communication, and the high level of training that militants are being given to fight and survive in hostile forests.

Militants are using YSMS technology, which is hard to detect. These encrypted messages leave no digital footprint and make it “almost impenetrable”.

Another use of technology is offline SIM-less phone activation, where Bluetooth is used for communication and pre-fed locations are followed on the offline application on phones. The attackers of Dangri on January 1, and Butta Durian on April 20, “most possibly used offline applications like ‘Alpine’ to

escape after the attack on the pre-fed routes”, senior security officials said.

Hundreds of divided families, with relatives across the LoC, and the growing number of locals migrating to Gulf countries have allowed “a triangular means of communication” and remain a cause of concern for security agencies. ‘More troops needed’

With just 3,000 policemen to man the entire Rajouri-Poonch sector, the thinning out of troops is allowing militants to roam freely compared with the past. The Dangri attack has seen the induction of 18 CRPF companies in the region and more are on their way, official sources said.

The People’s Anti-Fascist Front in a purported online statement suggested that their activities in Pir Panjal were aimed at “shifting resources back from Ladakh to the Poonch-Rajouri sector”.

“We will make you do that and you will hand over a strategic win to us. And then after some time our friends will make you shift back your resources to Ladakh. Your two-front theory is now a self-fulfilling prophecy,” it reads.

NO AGREEMENT IN DEVOLUTION TALKS WITH PRESIDENT RANIL, SAYS TNA

MEERA SRINIVASAN
COLOMBO

The talks on power devolution between Sri Lankan President Ranil Wickremesinghe and Tamil legislators yielded no positive outcome, according to the Tamil National Alliance (TNA), the largest grouping of MPs from the island’s north and east.

Following his renewed pledge on May Day to address Sri Lanka’s long-pending national question, President Wickremesinghe met almost all MPs from the Tamil-majority areas, including from the TNA, on Monday as part of his latest round of discussions. The Tamil National People’s Front, which has two MPs, stayed out of the talks that it said were “simply aimed at appeasing the international community”.

After his ascent to presidency last year amid a debilitating crisis, Mr. Wickremesinghe vowed to resolve Sri Lanka’s national question before February 4, 2023, when the island nation marked 75 years of Independence. After having failed to meet his deadline, the 74-year-old leader has renewed his promise to solve the ethnic problem by the end of the year, even as the Tamil leadership remains sceptical of his outreach. A meeting on issues pertaining to reconciliation was convened by the President last week, where TNA lawmakers pointed to growing attacks on Tamils’ religious sites and lands, while strongly opposing the government’s proposed legislation to combat terrorism.

Monday’s meeting was to focus on power devolution. Veteran Tamil politician and TNA Leader R. Sampanthan, who turned 90 this year, yet again emphasised the need for a political solution based on the Tamils’ right to internal self-determination, while highlighting successive governments’ failure in addressing it.

Former Chief Minister of the Northern Province C.V. Wigneswaran, now a legislator representing Jaffna in Parliament, proposed, among other things, an interim administrative arrangement at the provincial level, until elections are held. While the President suggested appointing a committee to study the proposal, the TNA squarely rejected the idea, its MPs said.

Self-determination

“From our point of view, we demand a new Constitution based on the right to internal self-determination. Much work has been done on this, there are reports and even a draft. We told him [President] it is pointless to engage in talks on administrative aspects without addressing the basic political question,” TNA spokesman and Jaffna legislator M.A. Sumanthiran told media after the talks. “If there is any effort to bring a new Constitution, we will participate. But no agreement was reached on our demand for a new Constitution, or for the early conduct of provincial council elections,” he added. It is nearly five years since the terms of all nine provincial councils in Sri Lanka ended, and successive governments have postponed holding elections to them. India has repeatedly



R. Sampanthan

urged Sri Lankan authorities to hold the delayed polls.

“Many of us agree that the provincial councils don’t have adequate powers, but they have a historic context and have been part of our Constitution. Even then, the government is reluctant to hold elections to them. Clearly, the President has set his eyes on a national election,” TNA MP Sivagnanam Shriharan told The Hindu: “This exercise [talks] is only to show the international community that he is a leader who is willing to engage with the Tamils.

TRIPPING TRADE

India must not excessively rely on a few large markets

This financial year is off to a subdued start on the trade front. Goods exports slumped to \$34.6 billion in April, the lowest since last October — the worst month for outbound shipments in 2022-23. This was the third successive contraction in exports, and 12.7% below last April’s numbers. Imports shrank by

a sharper 14% to trip to a 15-month low of under \$50 billion. A slowing global economy had been hurting exports through the second half of 2022-23, with declines in four of six months. But April’s initial estimates are troubling not just because they represent the steepest fall in recent months but also signal a

sudden shift in sequential momentum akin to the use of emergency handbrakes. This March, despite lingering global demand weakness, exports had hit a nine-month high of nearly \$42 billion while imports were \$60 billion. The new Foreign Trade Policy enunciated a two trillion-dollar export goal to be achieved in seven years. Its first month of implementation could not have been off to a shakier start. The prospects of last year's healthy 14.7% growth that lifted total exports to about \$776 billion being replicated in 2023-24 look bleak already.

One may draw some succour from the trade deficit easing to a 20-month low. But managing the trade deficit cannot be the goal for policymakers. Falling imports also indicate that domestic demand, India's proclaimed insulation against global headwinds, is ebbing. Moreover, when imports of petroleum (down 14%), and gems and jewellery plummet, they also affect exports of value-added end products. Petroleum exports shrank 17.5% in April, while jewellery shipments slipped at 30%, marking the seventh contraction in 10 months even as other job

creators such as textiles have been hit hard. That commodity prices have cooled from last year is only one reason for the shrinking trade basket. Officials concede there does not seem to be any immediate respite likely from faltering global demand. China's opening up of the economy may have prompted a global trade growth forecast hike (from 1% to 1.7%) for 2023 from the WTO, but recent Chinese data have been underwhelming about the recovery momentum. Reluctant European and North American markets are only expected to speed up goods orders by September for the festive season, while services exports that have held up through the recent trade turmoil, may slow too. India must use this slack period to review its overall trade stance, the reliance on a few large markets, and pursue greater integration with global value chains and multilateral trading arrangements. These would yield better outcomes than fresh measures to hold down the import bill.

TELECOM BILL EXPECTED TO BE FINALISED BY JULY: VAISHNAW

THE HINDU BUREAU
NEW DELHI

The Indian Telecommunication Bill, a draft version of which was released for public comment last September, should ideally take its final form by July, Minister of Railways, Communications, Electronics and Information Technology Ashwini Vaishnaw told reporters on Tuesday. "We have consulted practically every possible stakeholder," he said.

"The primary focus [of the Bill] is that the telecom sector in India should be globally benchmarked, should be a sunrise sector, should have lot of scope for innovation, a simple regulatory framework and... user protection has to be the prime focus," he added.

Mr. Vaishnaw was announcing the release of the 'Sanchar Saathi' portal, a website that brings together initiatives that the government has already released, such as TAF COP, a system for users to find out how many SIM cards are registered in their name, and the Central Equipment Identity Register (CEIR), a system which lets people — who have lost their phone or had it stolen — remotely block the handset for use on Indian telecommunication networks.



Online aid: Communications Minister Vaishnaw unveils 'Sanchar Saathi' portal offering user-support in one place. Kamal Narang

Bill will be focussed on ensuring India's telecom sector is globally benchmarked, lends scope for innovation, has a simple regulatory framework and lays primacy on user protection, says Minister



CHINA FACTORY OUTPUT, CONSUMPTION REVEAL FRAILTY OF RECOVERY

REUTERS
BEIJING

China's April industrial output and retail sales growth undershot forecasts, suggesting the economy lost further momentum at the start of the second quarter and adding pressure on policymakers to shore up a wobbly post-COVID recovery.

Industrial output grew 5.6% in April from a year earlier, accelerating from the 3.9% pace seen in March, official data showed. It missed expectations for a 10.9% increase in a Reuters poll of analysts although it marked the quickest growth since September 2022.

Retail sales rose 18.4%, up from March's 10.6% and the fastest increase since March 2021. Analysts had forecast growth at 21.0%.

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WEAKER BY THE YEAR

Erdoğan may still be in the lead, but the run-off is humbling

Recep Tayyip Erdoğan was perhaps at the weakest moment of his two-decade-long reign when an overwhelming majority of Turkish citizens voted in Sunday's presidential and parliamentary elections. Six Opposition parties came together to seize the momentum and fielded a joint candidate, Kemal Kılıçdaroğlu, a mild-mannered former bureaucrat who promised to arrest Turkey's "slide towards authoritarianism" and fix its economy. Most opinion polls predicted that Mr. Erdoğan was trailing Mr. Kılıçdaroğlu. Yet, in the preliminary results, Mr. Erdoğan won 49.5% of the votes in the presidential election, a tad lower than the threshold that would have avoided a run-off, against Mr. Kılıçdaroğlu's 44.9%. The President's nationalist-conservative coalition also took a comfortable majority in Parliament. Mr. Erdoğan was facing serious criticism, particularly about his mismanagement of the economy. Turkey's lira has lost some 60% of its value against the dollar in just two years. Foreign investors are fleeing and the current account deficit is ballooning. Annual inflation has hit the middle-class. After a devastating earthquake in February, the government's response to the calamity and its building permit rules were slammed. Yet, the Opposition failed to turn these challenges Mr. Erdoğan faced into votes.

Mr. Erdoğan, whose Islamist Justice and Development Party (AKP)

came to power in 2003, has remained a towering figure in Turkey's politics. He rewrote its Constitution, turning its parliamentary system into an executive presidency, and got himself elected as the first President under the new Constitution. He used the failed 2016 coup to purge his rivals and tame the generals. He moved Turkey away from the western orbit and began building stronger ties with Russia and Arab countries, while retaining its NATO membership. His promise was to turn Turkey, once the core of the Ottoman Empire, into a major global power again. He presented himself as an outsider who revolted against the Kemalist establishment, and built a new order rooted in Islamist conservatism, public welfare and an Ottoman imperial nostalgia. Sunday's election results show that this revivalist brand of politics still remains powerful. But that is not the whole story. The results also suggest that there are cracks in his base. In 2018, he won the presidential election in the first round with a 22-percentage point lead over his closest rival. This time, he was not just forced to go into a run-off, but the gap is just five points. Public resentment towards his policies was particularly high in and around Ankara and Istanbul. A directionless Opposition finally seems united and potent. Mr. Erdoğan may still be in the lead, but he has been humbled by Turkey's voters.

THE RISING TIDE OF DICTATORSHIP

Shelley Walia has taught cultural theory at the Panjab University

"Those who cannot remember the past are condemned to repeat it." — George Santayana

The great tragedy of our times is the failure to come to grips with the decline of democracy and its failure to accept the new age of autocracy and its democratising of violence. In the context of the present decline in the very idea of democracy, there is a need to reflect on the changing political dynamics in a post-industrial age. In particular, the genealogy of fascism as experienced in the traditional forms of dictatorship and the evolution towards the contemporary notions of the brute power of the state not only overtly refute or sneer at democracy, but rather go to great lengths to deceitfully annex democratic practices.

The revelation about the evil capabilities of the human race were shown in the post-Holocaust era. As Hannah Arendt points out in her book, *Origins of Totalitarianism*, "We can no longer afford to take that which is good in the past and simply call it our heritage, to discard the bad and simply think of it as a dead load which by itself time will bury in oblivion. The subterranean stream of Western history has finally come to the surface and usurped the dream of our tradition." This is abundantly obvious from the wreckage of the two wars and the rise of fascism scarring the deep-seated liberal philosophy prevailing in Europe. Humanity's capability for evil casts a murky shadow on our vision of history where the triumph of democracy always seemed inevitable.

An era of strident nationalism

It is 'not true that humanity cannot learn from history. It can and, in the case of the lessons of the dark period between 1914 and 1945, the West did. But it seems to have forgotten those lessons. We are living, once again, in an era of strident nationalism and xenophobia. The hopes of a brave new world of progress, harmony and democracy, raised by the market opening of the 1980s and the collapse of Soviet communism between 1989 and 1991, have turned into ashes'.

It is a common fact of history that it often repeats itself, especially when people forget that war or dictatorship or ethnic belligerence are not a solution to

any conflict. Revolutions, like those in France and Russia, that gave an individual absolute power, as in the case of Napoleon and Stalin, respectively, inevitably nosedive as failed empires under brutal dictatorships. Similarly, widespread corruption, high crime rates, governmental incompetence, and the rule of law fail to awaken humanity to the realisation that such conditions are a harbinger of the imperceptible rise of "strong man" politics.

Similarly, dictatorships accompanied by violence and death are forgotten by the public which blindly begin to put faith in a leadership that projects competence and ability to advance welfare of the people and the country through camouflaging violence only to evoke affection and respect from the masses. It is a clear fact of history that societies learn nothing from the tyranny that a nation bears. After Stalin's brutal regime of secret police and leader worship, Cuban revolutionaries allowed their charismatic revolutionary leader to seize absolute power, disallowing any political opposition. Suppression of information to this day is widespread, and independent journalism is prohibited in Cuba.

It stands to conclusion then that humanity still has not learnt from the brutal regimes that brought violence and bloodshed in their wake, giving way to newer forms of tyranny. Lessons from history fade away and nations continue to repeat their slip-ups.

To fully comprehend the history of dictatorship, one has to examine the various shades and tones in which they surfaced from time to time. Though the idea of authoritarian power remains eternal in man's ambition, the complexion may change while the hubris of power remains. To understand the changing face of despotism, *Spin Dictators*, by Sergei Guriev and Daniel Treisman, elaborates through serious research on the abuse of modern communication technology by authoritarian regimes for propaganda, giving birth to manipulative and not bloody dictatorships of the past. Understandably, the use of brute force in the past gives way to the use of technological means to subjugate public opinion. Hitler and Stalin are replaced by Russia's Putin, Peru's Fujimori, Venezuela's Chavez, Hungary's Orbán and Turkey's Erdoğan.

A SUBSERVIENT MEDIA

Over the last few decades, violence has reduced substantially as a weapon for retaining power. Advancement in technology is strategically employed to manipulate and govern public opinion through deceit, lies, and deceptions under the smokescreen of safeguarding the institution of democracy. In exchange of reliability and acceptance, "non-democratic leaders" allow a certain amount of dissent in the independent media; outright censorship is replaced by indiscriminate regulations and law suits; elections are made to look fair and honest, through money, manipulation and the creation of a cult leadership that go all out to create a mass appeal. Mass incarceration or extermination has gradually morphed into majoritarian brute force, supported and propped by a subservient media that tactfully spins a public discourse

which, at its face, seems to be democratic but in reality is far right wing in its sociopolitical barrage of the public. This is apparently different from North Korea's Kim Jong-Un, Syria's Bashar al-Assad, or Saudi Arabia's Mohammed bin Salman, who openly use subjugation, expurgation and physical punishment to remain in power.

Vladimir Putin, for example, has given up the charade of posing as a democratic leader. The Ukraine war has let the cat out of the bag. Public opinion now has turned substantially antagonistic. Vladimir Putin, therefore, no longer falls into the category of non-violent dictators of the present. Guriev, writing in the *Financial Times* in April, has revised his appraisal of Vladimir Putin's place in the diversity of autocrats and despots: "Putin's regime has completed its reversion

from a 21st-century spin dictatorship to a 20th-century dictatorship based on fear." As in the detention and extermination of his political opponent Alexei Navalny, Vladimir Putin's dexterous manipulation gave way to brute force.

Doublespeak and censorship

Right-wing intellectuals indeed, continually endeavour to strengthen the discourse of nationalism through the politics of image building and exceptionalism which captures the attention of the gullible masses. The triumphalism of the supporters of democracy now seems to be a distant cry, giving place to an outright authoritarianism that stands out as the single-most defining feature of global politics. Criticism is conveniently pushed to the fringes while the dominant party discourse remains in full force, incessantly

brain-washing the public with doublespeak and "sensible censoring" through sophisticated means of surveillance and propaganda. A channel supposedly airing free debate is merely eyewash for showcasing a certain amount of democratic inclinations of the despotic leadership through a superficially credible appearance of democratic adherence in all policy making.

The zeitgeist of the post-Holocaust brutality that looked with hope at the world of justice and freedom awaiting humanity has fallen by the wayside. Our primary concern at the moment must, therefore, be to come to grips with the idea that either we face the end of a free world or put all our hope in the undying forces of democratic impulse in humanity to finally overcome the rising tide of tyranny.

RAJASTHAN'S MOVE SPELLS SOME HOPE FOR GIG WORKERS

Aditi Surie is a senior researcher with the Indian Institute for Human Settlements, examining platform capitalism, livelihoods and economic progress for communities on technology-mediated markets

The Chief Minister of Rajasthan announced earlier this year that the State would set up India's first welfare fund called the Rajasthan Platform-Based Gig Workers Social Security and Welfare Fund. This is the first real instance of a regulatory move to unburden gig and platform workers' vulnerabilities since the Code on Social Security was passed in 2020. The code came amid the COVID-19 pandemic when platform workers became the backbone of metropolitan logistics, acting to serve customers, and working with and for State governments in their food relief schemes.

Many States are yet to act

In 2023, many State governments are yet to pass rules that govern how they will implement the Code on Social Security. This has raised concerns over how fast gig and platform workers can gain benefits in a scenario where they are seen as "independent contractors", though they are made to follow rules that constitute an employment relationship. Rajasthan stands out as a first mover making haste, with the State facing Assembly elections next year.

Since Independence, construction workers, dock workers, and head loaders (mathadi) have had boards set up for their well-being. Thus, the Rajasthan Platform-based Gig Workers Welfare Board will be a familiar institution that can be used to serve the needs of a technology-mediated workforce. The board, a tripartite institution with representatives from bureaucracy, employers or clients, and workers' unions or associations, exists as a workaround to what is otherwise embedded in formal employment. In the latter, an employment contract and contributory worker benefits bring together worker, state and employer in conversation with each other. This relationship is meant to ensure quick communication in moments of failure where workers or employers do not get their due, and enable better communication between the parties. In sectors that have more informal workers, there is no 'straightforward' way to deliver benefits since on-paper employment relationships are missing. Therefore, the state also does not 'find' workers at work to give them benefits. The tripartite relationship has to be built to force employers to acknowledge that they have informal workers; for workers to collectivise to bring a common voice to their concerns; and for the state to liaise and mediate this relationship.

Tied down in the specifics

The Rajasthan Platform-based Gig Workers Welfare Board aims to deliver social security benefits to between three to four lakh workers in the State but is tied down in what kind of schemes and programmes it can set up. The Code on Social Security gives State labour ministries the mandate of choosing from a narrow bouquet of programmes on provident fund, employment injury benefit, housing, educational schemes for children of workers, skill upgrading

and funeral assistance. Key protection schemes such as life and disability cover, health and maternity benefits, old age protection and education will only be started and funded by the central government, which can decide which States will get these central schemes, their duration and what kind of gig and platform worker will be eligible for schemes and programmes. This restriction could be further exacerbated by a lack or shortage of funding.

To address this, the code mandates platforms to share 1%-2% of their revenue for these new schemes, answering a key question for central and State governments as to who pays for gig and platform worker protections. The Construction Worker Board uses a similar avenue to take money that amounts to 1%-2% of the project cost from real estate companies and builders for worker well-being. While charging construction projects on revenue is a simple way to fund a board, it will not be as simple to do so in the platform economy context. Many platform companies operate as revenue-negative or have to raise debt or equity funding to make it year to year. Questions about how the Rajasthan government made the financial allocation of ₹200 crore, where this has come from, or how platforms will be charged with their financial responsibility remain unanswered.

The challenge ahead

Worker boards in India have been thought of as a way to build long-term relationships between workers and the state apart from their more operational role in creating a tripartite forum and implementing schemes. There has been a lot of criticism against the construction board — that it does not provide benefits that are useful enough to offset the time, money and other resources workers have to spend in order to register and access benefits. Time will tell how a Gig and Platform Worker Board will fare when gig and platform workers are time-poor considering that they often work for piece-meal wages that are structured through hourly or daily time commitments to platforms. This has been a significant challenge for collectivisation attempts. It is also unclear whether Rajasthan or any other State board will be able to fill the gap in labour rights for platform and gig workers. The Code on Social Security does not consider how to handle the labour rights of gig and platform workers; rather, it only seeks to give them protections from vulnerable aspects of their work.

Nonetheless, the initiation of the board is a big win for platform workers and unions who/which have been fighting to get their issues heard. The fact that the board is being set up before 2024 stands out in the midst of political chatter that States will not implement the new Codes until after the general election in 2024.

WHY SPURIOUS LIQUOR KILLS

VASUDEVAN MUKUNTH
EXPLAINER

The story so far:

As of 10 p.m. on May 16, as many as 22 people had died after consuming spurious liquor in the Chengalpattu and Villupuram districts of Tamil Nadu, while more than 30 others were still being treated in hospitals. The incidents occurred barely a month after the State government said that it had brought such deaths under control. They are also tinged with an element of surprise because liquor sales in Tamil Nadu are wholly controlled by the State, via more than 5,300 outlets. The State government is currently in the process of closing 500 outlets.

What is the alcohol in liquor?

Liquor is differentiated by its alcohol content — from the 5% or so of

beer to the 12% or so of wine to the 40% or so of distilled spirits (all by volume). In the beverages consumed for recreational purposes, the alcohol in question is almost always ethanol. Technically, in this context, ethanol is a psychoactive drug that, in low doses, reduces the level of neurotransmission in the body, leading to its typical intoxicating effects.

Contrary to popular belief, the World Health Organization has found that "no level of [its] consumption is safe for our health". Long-term use leads to dependence, heightens the risk of some cancers and heart disease, and may eventually cause death.

Ethanol (C₂H₅OH) is one carbon atom bonded to three hydrogen atoms and one more carbon atom; the second carbon atom is also bonded to two hydrogen atoms and the hydroxyl group, also known as the ion OH⁻. Inside the body, it is metabolised in the liver and the stomach by alcohol

dehydrogenase (ADH) enzymes to acetaldehyde. Then aldehyde dehydrogenase (ALDH) enzymes transform the acetaldehyde into acetate. The adverse effects of alcohol consumption, from the hangover to a cancer, are due to acetaldehyde.



Death potion: Villagers block a road after five people died by allegedly consuming spurious liquor, in Viluppuram district on May 14. PTI

What has the World Health Organization said about the consumption of alcohol? What happens inside the body after methanol ingestion? What are the industrial applications of methanol? What are the effects of methanol poisoning? Can such poisoning be treated?

What is spurious liquor?

Spurious liquor is characterised by the liquid mixture containing methanol as well. The police have thus far determined that the spurious liquor in both the Chengalpattu and Villupuram incidents arose from the same source, and that arrack sellers had purchased industrial-grade methanol from factories and sold it to the victims. (Arrack is distilled from the fermented sap of the palm tree.) In many older cases, such liquor is typically a home-made liquor, such as arrack, to which methanol was added to strengthen the intoxicating effects (in colloquial parlance, its kick) and/or to increase its bulk volume.

The Food Safety and Standards (Alcoholic Beverages) Regulations 2018 stipulate the maximum permissible quantity of methanol in different liquors. These values span a wide range, including “absent” in coconut fenny, 50 grams per 100 litres in country liquor, and 300 grams per 100 litres in pot-distilled spirits.

What is methanol?

The methanol molecule (CH_3OH) consists of one carbon atom bonded with three hydrogen atoms and one hydroxyl group.

Schedule I of the Manufacture, Storage and Import of Hazardous Chemical Rules 1989 includes methanol. The Indian Standard IS 517 applies to how the quality of methanol is to be ascertained, and together with the Tamil Nadu Denatured Spirit, Methyl Alcohol, and Varnish (French Polish) Rules 1959, what signage, methanol packaging should carry. The most common way to produce methanol is to combine carbon monoxide and hydrogen in the presence of copper and zinc oxides as catalysts at 50-100 atm of pressure and 250°C. In the pre-industrial era, going back to ancient Egypt, people also made methanol

(together with several other byproducts) by heating wood to a very high temperature.

Methanol has several industrial applications, including as a precursor to acetic acid, formaldehyde, and aromatic hydrocarbons. It is also used as a solvent and as antifreeze. In Tamil Nadu, the manufacture, export, import, storage, and sale of methanol requires licences under the 1959 Rules. How does spurious liquor kill?

The deadliness of spurious liquor arises from methanol. According to James Manor, emeritus professor of Commonwealth Studies at the University of London, “In every hooch tragedy in the history of India — and of the world since 1945 — the poison has been methanol.” The human body contains infinitesimal quantities of methanol (4.5 ppm in the breath of healthy individuals, per a 2006 study) as a result of eating some fruits. But even for an adult, more than 0.1 ml of pure methanol per kilogram of body-weight can be devastating.

Once ingested, methanol is metabolised in the liver by ADH enzymes to form formaldehyde (H-CHO). Then ALDH enzymes convert formaldehyde to formic acid (HCOOH). The accumulation of formic acid over time leads to a baneful condition called metabolic acidosis. Acidosis can lead to acidemia, a condition wherein the blood's pH drops below its normal value of 7.35, becoming increasingly acidic. The blood's pH is normally maintained by a balance between an acid, like carbon dioxide, and a base, like the bicarbonate ion (HCO_3^-). As methanol is metabolised, the concentration of the bicarbonate ion drops, leading to the acid gaining the upper hand. Formic acid also interferes with an enzyme called cytochrome oxidase, which in turn disrupts cells' ability to use oxygen and leads to the build-up of lactic acid, contributing to acidosis.

According to a paper published by Archives of Toxicology in January 2022, consuming methanol also leads to “methanol-induced optic neuropathy ... a serious condition that may result in long-term or irreversible visual impairment or even blindness [due to] damage and loss of function of the optic nerve and retina”. Methanol-poisoning can also cause cerebral edema, haemorrhage, and death.

How can such poisoning be treated?

Once methanol is ingested, the body takes some time to completely eliminate it. One estimate suggests that as much as 33% is still left behind after 48 hours. It is completely absorbed via the gastrointestinal tract and the blood-methanol level can reach its maximum value within 90 minutes. There are two immediate ways to treat methanol poisoning. One is to administer ethanol (of a pharmaceutical grade, by healthcare workers). This may sound counter-intuitive but ethanol competes very well with methanol for the ADH enzymes. As a result, the methanol is kept from being metabolised to formaldehyde.

The other option is to administer an antidote called fomepizole, which has a similar mechanism — it slows the action of the ADH enzymes, causing the body to produce formaldehyde at a rate that the body can quickly excrete, preventing the deadlier effects from kicking in. Both courses of action are limited by the availability of their characteristic compounds. Fomepizole is expensive whereas pharmaceutical-grade ethanol needs to be administered under supervision.

Healthcare workers may also have the individual undertake a dialysis to remove methanol and formic acid salts from the blood, and mitigate damage to the kidneys and retina. They may also administer folinic acid, which encourages the formic acid to break up into carbon dioxide and water. Both fomepizole and folinic acid are in the WHO's list of essential medicines.

The formic acid would have begun accumulating in dangerous amounts around 18-24 hours after ingestion, affecting the optic nerve, kidneys, the heart, and the brain. Ophthalmic effects have been observed in 50% of those who have consumed methanol, and they become apparent within 24 hours.

If the individual consumed ethanol along with the methanol, the damage may not be evident until after a few days, further delaying treatment and increasing mortality.

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