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समाचार पत्रों से चयित अंश Newspapers Clippings

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Defence News

Defence Strategic: National/International



**Press Information Bureau
Government of India**

Ministry of Defence

Tue, 21 May 2024

Jointness 2.0, that is developing Joint Culture in Armed Forces, is the way forward, says CDS Gen Anil Chauhan “Theatre Commands to lay the foundation for catapulting the Armed Forces into the next orbit of Military Preparedness and War Fighting”

Chief of Defence Staff (CDS) Gen Anil Chauhan has called upon the three services to create a Joint Culture as they move towards forming Joint Operational Structures. Speaking on ‘Jointmanship : The Way Ahead’ as part of 22nd Major General Samir Sinha Memorial Lecture organised at USI of India in New Delhi, the CDS termed developing Joint Culture in Armed Forces as Jointness 2.0, which is the way forward.

The Chief of Defence Staff said, Jointness 1.0 was about better bonhomie and consensus among the services, and as there were no major differences, there is an impetus to move towards the next level of Jointness which is Jointness 2.0.

Acknowledging the distinct culture of all the three Services, the CDS underscored that there was a need to create a fourth culture in the services. “Joint Culture though different from Service specific Culture, needs to respect the uniqueness of each service. We must be able to distill the best of each service, and incorporate the Highest Common Factor, rather than settle for the Least Common Denominator,” said the Chief of Defence Staff. He mentioned various initiatives of symbology that were being processed towards fostering the Joint Culture, including Tri-Services participation in national events.

The CDS termed Jointness & Integration as pre-requisites to the creation of functional Integrated Theatre Commands, and explained the significance of such Commands. “The creation of such

commands will separate the 'operational' functions from the Raise-Train-Sustain (RTS) and other administrative functions, and will allow greater focus of the operational commander to matters of security," he said.

The CDS said the Theatre Commands will not be an end state but the beginning of the next set of reforms. He said, Integrated Theatre Commands will lead to many reforms like Single to Multi Domain operations, fusing space and cyber space into traditional domains, digitisation of battlefield information and visualisation, net centric to data centric among others.

Stressing that the reforms in Indian Defence eco-system are necessity, the CDS said, nation states across the globe are facing a new set of challenges, and current flux in world order is forcing nations to review their security strategies. The rapid and unbridled march of technology is transforming the way future wars will be fought, he added.

<https://pib.gov.in/PressReleasePage.aspx?PRID=2021210>

THE ECONOMIC TIMES

Wed, 22 May 2024

Joint military exercise 'Shakti' : Indian, French armies share drills, expertise in jungle survival techniques

During the 7th edition of ongoing Joint Exercise Shakti, the Indian and French Army shared drills and expertise in jungle survival techniques. Survival in the mountains for self-preservation was practised extensively during the Exercise. The 7th edition of the India-France Joint Military Exercise "Shakti" commenced on May 13 at the Joint Training Node in Umroi, Meghalaya.

The exercise aims to enhance the joint military capacity of both sides to undertake Multi-Domain Operations in a sub-conventional scenario.

According to an official release from the Public Relations Officer (PRO) Defence, Guwahati, the exercise is scheduled to be conducted from 13 to 26 May. The Opening Ceremony of the joint exercise was attended by Thierry Mathou, Ambassador of France to India and Major General Prasanna Sudhakar Joshi, General Officer Commanding 51 Sub Area. Exercise SHAKTI is a biennial training event conducted alternatively in India and France. The last edition was conducted in France in November 2021.

Indian contingent comprising 90 personnel is being represented primarily by a Battalion of the RAJPUT Regiment besides personnel from other arms and services.

Observers from the Indian Navy and the Indian Air Force will also form part of the exercise. The French contingent comprising 90 personnel will be represented mainly by personnel from the 13th Foreign Legion Half-Brigade (13th DBLE).

"The Aim of Exercise SHAKTI is to enhance the joint military capability of both sides to undertake multi-domain operations in a subconventional scenario under Chapter VII of the United Nations Mandate," the release added.

Further, the joint exercise will focus on operations in the semi-urban and mountainous terrain. Objectives to be achieved from the joint training are a high degree of physical fitness, rehearsing and refining drills for operations at the tactical level and sharing of best practices.

Tactical drills to be practised during the Exercise will include response to a terrorist action of capturing a defined territory, the establishment of a Joint Command Post, the establishment of an Intelligence & Surveillance Centre, securing of a helipad/ landing site, Small Team Insertion & Extraction, Special Heliborne Operations, Cordon & Search Operations besides employment of drones and counter-drone systems among others.

Exercise SHAKTI will enable the two sides to share their best practices in Tactics, Techniques and Procedures for conducting joint operations.

The joint exercise will facilitate the development of inter-operability, bonhomie and camaraderie between armed forces personnel of the two countries. This will also enhance the level of defence cooperation, further fostering bilateral relations between the two friendly nations.

<https://economictimes.indiatimes.com/news/defence/joint-military-exercise-shakti-indian-french-armies-share-drills-expertise-in-jungle-survival-techniques/articleshow/110320252.cms>

THE ECONOMIC TIMES

Tue, 21 May 2024

MoS Ajay Bhatt hails Project Udbhav, says it focuses on making Army 'future-ready'

Union Minister Ajay Bhatt said Tuesday the strength of a country resides not only in its military might but also in its ability to adapt to changing circumstances and leverage its cultural heritage as a source of power.

The minister of state for defence was addressing an event at the National Museum here to mark the culmination of Project Udbhav, which aims to promote indigenous discourse in the Army by integrating India's ancient strategic acumen into a contemporary military domain with a focus on making the force "future-ready".

The project is a collaboration of the Indian Army and Delhi-based think-tank United Service Institution of India (USI).

Praising the Army and USI, Bhatt said, "The aim of this project envisioned by USI is to find invaluable insights into our strategic culture by finding ancient texts and oral traditions... The geopolitical landscape is continuously evolving and it is necessary for our armed forces to be adaptive and innovative in their thinking."

In his address, the minister also praised the ancient Indian philosophy of 'Vasudhaiva Kutumbakam', which was part of the tagline used by India during its year-long presidency of the G20. "The ancient principle of 'Vasudhaiva Kutumbakam'... has transcended cultural boundaries and become a guiding light in international diplomacy," Bhatt said. The Union minister said that in

the last decade, the government of India has started a significant journey towards promoting indigenisation initiatives in various areas.

From health to manufacturing and from basic infrastructure to defence, solid efforts have been made for a strong national commitment towards indigenisation, he added. "There is a need to honestly make efforts to imbibe Indian thoughts and values even in our works and decisions. The dream of 'Viksit Bharat' can only be realised when we fully understand the priceless wisdom of our ancient past and implement it contextually in shaping modern ambitions and policies," he said.

The event was also attended by Army Chief Gen Manoj Pande and other senior officials of the force. Bhatt further said that by delving into India's ancient texts and traditions, Project Udbhav "not only enriches our understanding of strategic culture but also lends a valuable discerning thinking on unconventional war strategies, diplomatic traditions, and moral thoughts in a war".

"As we delve into our history and understand it deeply, it is essential to identify that historical narratives are not limited to buildings and objects alone, there is a sea of knowledge beyond that.

"In our ancient texts, there is a rich history, historians are well aware of this and it is a subject of continuous research, which the defence minister has earlier done," Bhatt said. Therefore, the minister said, it is important that "we continuously discuss our history, and reevaluate it so that we can ensure that our past is neither distorted nor oversimplified".

The Army chief said in his address that the project was launched at the maiden edition of the Indian Military Heritage Festival last October by Defence Minister Rajnath Singh. Bhatt also said that India's history is an amalgamation of different thoughts and accomplishments which is a source of inspiration not only for Indians but also for people around the world.

Today, through social media and other digital platforms, the dissemination of information has connected the world together, due to which curiosity towards India's ancient knowledge systems is growing in the world, the Union minister added. Bhatt also inaugurated an exhibition themed on the 'Evolution of Indian Military Systems, Warfighting, and Strategic Thought -- from Antiquity to Independence', which showcases the evolution of India's military systems and strategy.

<https://economictimes.indiatimes.com/news/defence/mos-ajay-bhatt-hails-project-udbhav-says-it-focuses-on-making-army-future-ready/articleshow/110306928.cms>

The Tribune

Wed, 22 May 2024

Navy needs a capacity boost to become 'net security provider'

THIS is an uncommonly busy period for the Indian Navy. In recent months, its western fleet has taken a proactive posture in the northern Indian Ocean to guard the sea lanes against attacks by the Houthis and, more recently, the revived Somali piracy.

As of March-April, the Navy had 10 warships in the Arabian Sea and two in the Red Sea; in an unprecedented move, it also deployed 11 of its 16 submarines. This is perhaps the most significant

deployment of the Navy in recent decades. It is also using its P8I long-range maritime reconnaissance aircraft to intensify its patrol of the seas.

At the same time, the eastern fleet was carrying out an important strategic mission. In early May, it sent a flotilla of three ships to the South China Sea, where they visited Singapore, Malaysia and the Philippines. In May 2023, India and ASEAN had held their first-ever maritime exercise, though the Indian Navy has been involved in bilateral exercises with navies of several ASEAN nations.

In March, the Navy inaugurated and upgraded naval bases on the Minicoy islands as well as an important facility in Mauritius. The upgrading of a naval facility at Agatti and establishing INS Jatayu in Minicoy are clearly aimed at checking possible Chinese inroads in the Maldives. The new airstrip and jetty on Agalega island in Mauritius is part of a long-term plan for India's deployments in the Indian Ocean Region to counter Chinese presence there. Beijing, it has been pointed out, is the only country with an embassy in each of the six Indian Ocean island states — Sri Lanka, Maldives, Mauritius, Seychelles, Madagascar and the Comoros.

Last month, reports said that India is also upgrading its military infrastructure on the Andaman & Nicobar Islands that are adjacent to the Malacca Straits. Airfields there are getting longer runways, upgraded jetties and new roads are being built on the islands. The aim is to facilitate greater deployment of warships, aircraft, missile batteries and troops there.

But the most active deployment of the Navy is related to the Houthis and revived Somali piracy. Shipping to the western Indian ports is directly affected by turbulence in West Asia and already prices of containers between northern Europe and China have doubled. There are reports that the developments could affect Indian exports by as much as \$30 billion over the year if things remain bad.

At present, India is not part of the US-led security initiative called Operation Prosperity Guardian, which consists essentially of the Western alliance and was launched in mid-December. It is this alliance which is undertaking the attacks on Houthi bases in Yemen.

Recently, India joined the Combined Maritime Forces (CMF), a 34-member grouping led by the US Central Command (CENTCOM) based in Bahrain and also posted a liaison officer to the CENTCOM. The CMF is not an alliance; it is flexible and does not exercise any political or military mandate.

New Delhi itself has no quarrel with the Houthis. But they are backed by Iran, a country with which India enjoys good relations. The recent Indian decision to manage the Chabahar port is an indicator that India is also looking at a broader horizon in relation to the Eurasian and Indian Ocean components of its foreign and security policy.

India often boasts of its aim of becoming the 'net security provider' in the Indian Ocean, but as of now, it needs a sharp boost in its capacity to become one. As it is, it faces a medium-term challenge from the Chinese PLA Navy, which has been active since the last decade in terms of sending submarines, intelligence-gathering and research vessels on regular patrols in the Indian Ocean.

The Indian Navy is the smallest of the three services and has the lowest share of the defence budget. While it is important to stress partnerships with like-minded countries in the region, for a military service there is no alternative to raw power. Unfortunately, in the past decade, the Navy

has had to trim its sails. In 2019, it announced that it was reducing its target of acquiring 200 ships by 2027 to 175. The Navy's plans for a large aircraft carrier to follow on the Vikrant project have yet to get official approval.

Now, after much dithering, the government seems to be on the verge of taking a decision on the Rs 60,000-crore Project 75I submarine venture. Tenders of two companies, one having a Spanish partner and the other a German one, are being evaluated. A key technology that is being assessed is of Air-Independent Propulsion (AIP) that enables conventional submarines to remain underwater for weeks. Under the Strategic Partnership Model, L&T is partnering with the Spanish company, Navantia, for the project, while Mazagon Dock Shipbuilders Ltd has teamed up with ThyssenKrupp Marine Systems.

A major reason for the urgency now is that the first of four AIP submarines built by China for Pakistan was commissioned in April this year. Pakistan already operated French AIP-equipped Agosta 90B submarines. In 2016, Islamabad signed a deal with China for the supply of four new AIP-equipped submarines and four more of this type will later be built in Karachi.

Eleven of India's 17 conventional submarines are decades old. It has two nuclear ballistic missile submarines, but these are dedicated to strategic deterrence and not related to the Navy. Besides Project 75I conventional submarines, India has been considering the idea of making nuclear-powered attack submarines, but the idea remains on the drawing board. Finding space for it in the current budget would be a daunting proposition.

<https://www.tribuneindia.com/news/comment/navy-needs-a-capacity-boost-to-become-net-security-provider-623470>



Wed, 22 May 2024

Defense Deal Brewing – Philippines Shows Interest In India's Advanced Light Helicopter As Navy Warships Docks At Manila

Indian Navy warships INS Delhi, INS Shakti, and INS Kiltan have been docked at Manila since May 2024. The warships in the Southeast Asian country as part of their operational deployment.

A contingent comprising officials from the Philippines Navy, Coast Guard, and Department of Defense got onboard INS Shakti and interacted with the crew that operates the home-grown helicopter Advanced Light Helicopters.

The Indian Navy shared photos on the social media platform X with the caption: "A delegation from the Philippine Navy, Coast Guard, and Department of Defense interacted with the crew of the indigenous Advanced Light Helicopter onboard INS Shakti to understand the capabilities of the Indian helicopter."

The guided-missile destroyer INS Delhi, fleet tanker INS Shakti, and anti-submarine warfare corvette INS Kiltan have been on an extended tour of the South China Sea. Under the command of Eastern Naval Command Chief Rear Admiral Rajesh Dhankar, the warships visited Singapore, Malaysia, and Vietnam before docking at Manila.

In anticipation of potential export orders, HAL is ramping up its helicopter manufacturing capability from 30 helicopters per annum to 90 helicopters per year.

Earlier this year, the Chief Managing Director of the Indian aircraft maker Hindustan Aeronautics Limited (HAL), CB Ananthakrishnan, expressed hope that the company would have a “breakthrough” sooner or later in terms of export orders.

ALH has been one of the major success stories for HAL, which has supplied 300 plus of these rotary-wing aircraft to the Indian forces. Now, the helicopter has an Mk4 variant that is an armed version.

During the first-ever visit of a Filipino Coast Guard chief to India last year, he conducted a Customer Demonstration Flight onboard Advanced Light Helicopter MK III at Goa.

The ALH Mk III is a variant of the indigenous Dhruv Helicopter. It has been inducted into the Indian Navy and the Indian Coast Guard. It is a multi-role, multi-mission, and versatile helicopter in the 5.5-ton category.

ALH Mk III is equipped with the most modern surveillance radar, which can detect and identify ships and boats up to a range of 120 nautical miles. This enables the Coast Guard to keep a vigil across Indian coastal regions.

Its electro-optical sensor allows it to monitor even the smallest vessels at distances as far as 30 nautical miles. Besides maritime reconnaissance, these helicopters can perform long-range search and rescue operations. ALH MK III is also fitted with a heavy machine gun to undertake constabulary missions.

In 2023, the Philippines Coast Guard inked its first Memorandum of Understanding (MoU) with its Indian counterpart, paving the way for more information sharing in the maritime domain.

The MoU between the coast guards was preceded by India becoming more vocal about Chinese aggression in the South China Sea. Seven years after the UN Convention on the Law of the Sea (UNCLOS), India unequivocally asked China to accept the 2016 tribunal ruling.

The Philippines has displayed a keen interest in the military hardware India has to offer, including the Advanced Light Helicopter Mk II and indigenously built warships. During his maiden visit to India, the Filipino Coast Guard Chief also visited Goa Shipyard Limited (GSL) to “see the Indian shipbuilding industry and how Indian Coast Guard ships are manufactured.

The three warships’ recent visit came shortly after India delivered shore-based BrahMos to the Philippines.

Taming The Dragon In South China Sea

The interest of the Philippines Coast Guard in Indian helicopters and surface vessels stems from its continuing confrontation with China over the disputed Second Thomas Shoal in the Spratly Islands in the South China Sea.

Rear Admiral Dhankar said: “India and the Philippines share common interests, particularly in maintaining peace and order in the Indo-Pacific region. The two navies share strong bonds of friendship, and both have endeavored to participate in maritime partnership exercises at every available opportunity.”

The relations between the two countries are veering towards dangerous water as the Chinese Coast Guard has been using water cannons against a Philippines Coast Guard vessel carrying food, water, fuel, and other supplies for its military personnel stationed at the Second Thomas Shoal or blockading the protesting civil vessels with its maritime militia.

The Second Thomas Shoal is about 200 km from the Philippine Islands of Palawan and more than 1,000 km from China’s nearest major landmass of Hainan Island.

The power disparity between China and the Philippines is huge. China’s GDP per capita is roughly 3.5 times larger than the Philippines’. From 2012 to 2022, the Philippines spent an average of just 1.15 percent of its GDP on defense, compared to China’s estimated 1.70 percent. Regarding maritime power, the capability gap is even more glaring.

China’s navy operates 59 submarines and 92 principal surface combatants; its navy and coast guard operates nearly 700 patrol and coastal combatant ships; and its maritime militia is estimated to have around 400 ships. Compare that to the Philippines’ two frigates and 125 patrol and coastal combatant ships.

The Philippines has no choice but to form strategic alliances with like-minded countries interested in maintaining freedom of navigation in the Indo-Pacific.

<https://www.eurasiantimes.com/defense-deal-brewing-philippines-shows-interest/>



Tue, 21 May 2024

What is Arogya Maitri Disaster Management Cube, the IAF’s mobile hospital?

The Indian Air Force (IAF) last week successfully conducted trials of airdropping its Arogya Maitri Disaster Management Cube — a state-of-the-art indigenous mobile hospital — in Agra.

The cube is part of the Army’s broader initiative, BHISHM (Bharat Health Initiative for Sahyog, Hita and Maitri).

The cube is equipped with advanced medical equipment, designed to treat up to 200 casualties, and can be deployed within 12 minutes, targeting rapid response and comprehensive care, according to a government release. It also comes with a tablet inside, having state-of-the-art BHISHM software system that allows operators to locate items quickly, monitor their usage and expiry, and ensure readiness for subsequent deployments.

The cube integrates Artificial Intelligence (AI) and data analytics to facilitate effective coordination, real-time monitoring, and efficient management of medical services in the field.

“An innovation aiding swift disaster relief by being para dropped, these ‘bricks’ contain essential survival material for disaster struck locations unreachable by other means,” the IAF had said after the trials.

The entire unit contains 72 light, easy-to-transport components that can be carried “by hand, cycle, or even drone, providing unmatched flexibility,” a PIB release said. “In the face of mass casualty incidents (MCIs), where requirements range from basic aid to advanced medical and surgical care, the Aid Cube stands out with its ability to be deployed within an astonishing 12 minutes. This swift deployment capability is crucial, as it effectively bridges the crucial time gap from primary care to definitive care, potentially saving numerous lives in the golden hour of emergencies,” the release stated.

Union Health Minister Mansukh Mandaviya has described the technology as a “great leap forward in providing rapid and comprehensive medical aid during emergencies anywhere,” according to the government-run All India Radio.

<https://indianexpress.com/article/what-is/what-is-arogya-maitri-disaster-management-cube-the-iafs-mobile-hospital-9342818/>

ThePrint

Tue, 21 May 2024

Army caught between religious & constitutional values. Defend secular, apolitical nature

- By Lt Gen (Dr) Prakash Menon (retd)

Since Independence, the Indian Armed Forces – particularly the Indian Army – have had to navigate the socio-cultural minefields thrown up by the vagaries of domestic politics and religions. The Constitution provided the beacon that illuminated the path ahead. A beacon designed on the belief that maintaining an apolitical institutional character and secular outlook would sustain and defend India’s integrity. The foundation of this secular outlook was rooted in the embracement of the encultured notion that the military institution had no religion and the equivalent of its holy book was the Constitution. But such an institutional belief was subject to being shaken by the crosswinds of India’s religious diversity.

Structurally, tensions arise from two important pillars that support the military in retaining its loyalty to the Constitution as well as strengthening its fighting spirit. To maintain loyalty to the Constitution, the institution is expected to transcend the religious identity of its human capital while deriving the fighting spirit through faith in gods at the same time.

Soldiers’ faith provides them with the courage and strength to withstand the taxing conditions of the battlefield that pose threats to their physical survival and mental stability. Without sustainable faith in their gods, Armed Forces personnel are likely to experience a yawning gap in their fighting

capabilities. This is a cultural proclivity that has evolved through our military heritage over millennia.

This cultural proclivity has also been shaped by colonial heritage, wherein the organisational structure of the Army was based on religion, caste, region or ethnicity. It supported the 'divide and rule' policy of the British. After more than seven decades of independent existence, the Indian Army still retains a similar structural composition in some of its combat and supporting arms such as the Infantry, Armoured Corps, Mechanised Infantry, Artillery and Engineers.

Army in the age of information

Attempts at restructuring to an All-India Class composition, especially since certain Sikh units mutinied during the Army's attempt to clear the Golden Temple of terrorists in 1984, have largely been stymied in the name of tradition. There also exists the questionable notion that fighting spirit is better realised when unit and regimental cohesion is built on commonalities such as religion, caste, region, and ethnicity. Even if there is some truism here, it ignores to a large measure the winds of religious polarisation and its implications, which have been sweeping the Indian political landscape since the Babri demolition in 1992.

Narratives and stories play an important part in nation-building. Storytelling is crucial to the process of creating communities, societies, and nations. When they achieve significance, these stories are used to inform our values, norms, behavioural patterns and traditions.

The age of information, which has expanded tremendously in terms of reach and speed, has flooded the Indian landscape with stories that spin the Hindu majoritarian agenda.

This has also been viewed as a counter to terrorism anchored in disaffection in the Islamic world. Religious polarisation has deepened across the length and breadth of Indian society. It is, therefore, understandable that the human capital of the Armed Forces could also be infected by the polarising forces that pose a threat to their secular and apolitical character.

Protecting Army's secular, apolitical character

Addressing the Investiture Day Parade on 13 January in Chandigarh, Lt Gen MK Katiyar, the General Officer Commanding-in-Chief, Western Command said: "What makes the Indian Army stand out is that we strictly adhere to the two important principles, the first one being our secular approach and second, our apolitical character. It means we respect all religions and stay clear of politics. It is necessary to stick to these principles and recognise the fact that any compromise on these principles will hurt the Army". Ironically, the video of the speech was taken down from the official website of the Western Army Command. and no explanation was given. Presumably, such voices are not tolerable to the ruling dispensation.

Manifestations of cultural shifts in the institutional character of the military are best identified by the military leadership. These manifestations are reflected in the values, rituals, heroes and symbols that are embraced. Symbols represent the most superficial and values the deepest manifestations of culture. Words, gestures, pictures or objects carrying a particular meaning could all be considered symbols.

The Armed Forces have always prohibited religious articles and marks for personnel in uniform. These include tilak (forehead mark), Vibhuti (sacred ash) and other items of outward

manifestation. The only exceptions to this rule are the wearing of turban and kada (thick metal bracelet), and the growing of hair by Sikhs. Sacred threads and chains/lockets around the neck should not be visible. No sacred thread is to be worn on the wrist while in uniform. The only jewellery permitted to be worn is a wedding or engagement band/ring on the left hand. Neck chains are also allowed but should not be visible. Tattoos on visible parts of the body are not permitted except for pre-existing religious ones made before joining the forces. There are specific instructions for women with regard to wearing jewellery or mangalsutras, use of perfumes, nose pins and earrings.

What perhaps requires a specific watch is whether these instructions are being strictly implemented. Admittedly, although my information is based more on hearsay, it seems there is a palpable trend wherein even some elements of the leadership are not following restrictions. Wearing sacred threads around the wrist is supposedly the most common violation finding greater acceptance. It has visibility and can be easily imitated by lower rungs of the military hierarchy. At senior levels, it could be used as a signal to show which side of the religiously polarised political ambience one belongs to. These seemingly innocuous signs could be a reflection of deeper trends impacting cultural values within the Armed Forces.

The political winds blowing in India, as reflected in the ongoing electoral campaign, should provide an insight into the military leadership, and the scope and nature of the challenges to its basic values. Violations of symbolic restrictions are easily curbed through personal examples and strict imposition of orders. Upholding the Army's secular and apolitical character is the responsibility of the military's top leadership.

When necessary, if military leaders don't show a willingness to sacrifice their careers to protect core institutional values, the struggle to withstand the internal political onslaught of religious polarisation may not achieve much. The challenge is to find a path between dealing with the enemies of the gods one worships and protecting the constitutional values that the military has sworn to defend.

<https://theprint.in/opinion/army-caught-between-religious-constitutional-values-defend-secular-apolitical-nature/2094273/>



Tue, 21 May 2024

Monitor Lizard vehicle undergoes PLA trials

The Monitor Lizard all-terrain vehicle (ATV) developed by Chinese company Sichuan Jinjia Special Equipment Technology (SJSET) is undergoing trials with the People's Liberation Army (PLA), a company representative of SJSET told Janes in early May.

The company developed tracked Monitor Lizard – which weighs 17 tons – to meet the PLA's requirements for a lightweight ATV that the service intends to deploy in high-altitude and cold mountainous regions, the representative added.

According to company specifications, Monitor Lizard is an armoured dual-body vehicle and its rear body can be fitted with various types of modules.

The vehicle can be used as an armoured personnel carrier (APC), command-and-control vehicle, logistics vehicle, or rescue vehicle.

Monitor Lizard has a payload capacity of 8 tons. The ATV can attain a maximum speed of up to 50 km/h in high-altitude areas with a floating speed of 5 km/h.

It can climb up to a maximum angle of 35°. Monitor Lizard can carry a crew of 14 soldiers – four in the front and 10 in the rear cabin – and it has a length of 9.1 m, a width of 2.45 m, and a height of 2.6 m.

Minimum turning radius of the vehicle is 7.8 m. The vehicle can also be fitted with a 12.7 mm machine gun at the top.

SJSET showcased a scale model of Monitor Lizard at the Defence Services Asia (DSA) 2024 exhibition held in Kuala Lumpur from 6 to 9 May 2024.

<https://www.janes.com/defence-news/news-detail/monitor-lizard-vehicle-undergoes-pla-trials>

THE ECONOMIC TIMES

Tue, 21 May 2024

US on track to establish domestic rare earths supply chain for defence, official says

The United States is on track to establish a domestic rare earths supply chain to meet its defence needs by 2027, a senior defence official said on Wednesday. The U.S has been driving the build out of a global supply chain for rare earths, metals used in magnets for green energy industries and defence, beyond dominant producer China since COVID upended global supply chains early this decade.

"We are on track to meet our goal of a sustainable mine to magnet supply chain capable of supporting U.S. defence requirements by 2027," Assistant Secretary of Defense for Industrial Base Policy Laura Taylor-Kale said at a mining conference in Perth.

Australia is classified as a domestic source of supply, alongside Canada and the UK, for critical minerals for the U.S. under the Defense Production Act and the U.S. has been offering funding opportunities to Australian mine developers. The U.S. this year extended its support for the first time to back two Australian-listed rare earths projects with up to \$850 million to help build out the supply chain. It has already funded Australian producer Lynas Rare Earths, the world's biggest producer outside of China, to build a new rare earths processing facility in Texas.

Government support for the sector is also coming domestically. In Australia, the federal government has pledged a A\$1 billion (\$667 million) loan to mineral sands producer Iluka Resources to build a new minerals processing plant on the country's west coast. But these

expansion projects have come as prices for rare earths have slumped, hurt by rising supply as China exports more to global markets. As China-based prices of rare earths have plunged, so have the cashflows and accounting profits of rare earths producers in the West, but also China's top three rare earths producers, said Iluka's Tom O'Leary.

So today they are still losing money.. and yet they are still producing. This is not a normal market," he said, arguing for prices of Western rare earths to delink from Chinese prices. Amanda Lacaze, chief executive of Lynas, agreed there was a "market imbalance" that could be mitigated by more growth in supply outside of China. "The important thing is growing the non-Chinese industry," said Lacaze. "Things like the partnership that we have with the U.S. government, Iluka's relationship with the Australian government, these are all about growing critical mass outside of China. And once we do that, we start to address the imbalance.

<https://economictimes.indiatimes.com/news/defence/us-on-track-to-establish-domestic-rare-earths-supply-chain-for-defence-official-says/articleshow/110317822.cms>

THE ECONOMIC TIMES

Tue, 21 May 2024

Russia starts exercise with tactical nuclear weapons

Russian forces have started the first stage of exercises that involve "practical training in the preparation and use of non-strategic nuclear weapons", the Defence Ministry said on Tuesday.

President Vladimir Putin ordered the drills earlier this month. Moscow has linked them to what it calls "militant statements" by Western officials which it said created security threats for Russia.

Russia's Foreign Ministry has cited comments by French President Emmanuel Macron, who floated the possibility of sending European troops to fight Russia in Ukraine, and British Foreign Secretary David Cameron, who said Ukraine had the right to use weapons provided by London to strike targets inside Russia

Security analysts say the exercise is designed as a warning signal by Putin to deter the West from wading more deeply into the war in Ukraine, where it has provided weapons and intelligence to Kyiv but refrained from sending troops.

The Defence Ministry said the first stage of the exercise involved Iskander and Kinzhal missiles. It is aimed at ensuring that units and equipment are ready for "the combat use of non-strategic nuclear weapons to respond and unconditionally ensure the territorial integrity and sovereignty of the Russian state in response to provocative statements and threats of individual Western officials against the Russian Federation", the ministry said.

The drills involve missile forces in Russia's Southern Military District, which lies adjacent to Ukraine and also includes parts of Ukraine that Russia now controls. Belarus, where Russia said

last year it was deploying tactical nuclear weapons, will also be involved in the exercises, the two countries have said.

Tactical, or non-strategic, nuclear weapons are less powerful than the strategic arms designed to wipe out whole enemy cities, but they nevertheless have vast destructive potential.

<https://economictimes.indiatimes.com/news/defence/russia-starts-exercise-with-tactical-nuclear-weapons/articleshow/110310997.cms>

Science & Technology News

ThePrint

Tue, 21 May 2024

Paving way for all-weather & all-time imaging, Bengaluru space firm tests SAR on HAPS platform

Bengaluru-based space startup GalaxEye Tuesday successfully tested its synthetic aperture radar (SAR) technology on a subscale high-altitude pseudo-satellite (HAPS) developed by the National Aerospace Laboratories (NAL), a company spokesperson said.

“With this achievement, GalaxEye becomes the world’s first private entity to conduct SAR trials on the HAPS platform,” the company said in a statement on Tuesday.

HAPS are high-altitude, solar-powered unmanned aerial vehicles (UAVs) that operate in the stratosphere about 20 kilometres above ground level. The SAR, meanwhile, is a technique for producing fine-resolution images from a resolution-limited radar system.

Operating in the stratosphere, SAR technology becomes a game-changer, enabling all-weather, all-time imaging. It overcomes the challenge of cloud cover, a hindrance for traditional electro-optical cameras, and opens up new possibilities for the aerospace industry.

A memorandum of understanding was signed between the National Aerospace Laboratories (NAL) and GalaxEye, which aims to explore the development, integration, and testing of SAR payloads for HAPS.

Suyash Singh, co-founder and CEO of GalaxEye Space, said this strategic alliance underscores both entities’ commitment to advancing aerospace capabilities.

“The rigorous test flights undertaken have provided invaluable insights, paving the way for further R&D endeavours,” Singh said.

Singh said that the test's success showcased India's technological prowess. SAR technology for HAPS has been confined to a few governmental space agencies, with limited operational implementation until now.

“GalaxEye's breakthrough will position India at the forefront of SAR innovation, aligning seamlessly with the Aatmanirbhar Bharat initiative. By bolstering national defence capabilities and fostering technological self-reliance, we aim to redefine global standards,” he said.

Beyond its implications for defence operations, SAR also holds immense potential for environmental monitoring and disaster management.

An NAL spokesperson explained that the laboratory's focus remained on optimising SAR with low SWaP (size, weight, and power) characteristics, unlocking unique phenomenology. “SAR technology is vital for HAPS, and GalaxEye's drone-based SAR capabilities show promise for integrating such systems into HAPS. While the initial tests are encouraging, a series of further tests will be necessary before these platforms can be deployed for practical applications. We are positive about the possibilities,” the NAL spokesperson said.

In 2023, GalaxEye had partnered with the Indian Space Research Organisation (ISRO) and the Defence Research and Development Organisation (DRDO) to work on radar imaging through UAVs.

<https://theprint.in/science/paving-way-for-all-weather-all-time-imaging-bengaluru-space-firm-tests-sar-on-haps-platform/2095312/>

