MANOHAR PARRIKAR INSTITUTE FOR DEFENCE STUDIES AND ANALYSES
मनोहर पर्रिकर रक्षा अध्ययन एवं विश्लेषण संस्थान

Strategic Digest

Vol. 2 | No. 6 | 15 April 2020

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America Tests Hypersonic Glide Body

On 19 March 2020, the US Department of Defense conducted a successful test of a hypersonic glide body. Hypersonic technology pertains to velocities in the range of five or more times the speed of sound. The experimental test module, named Common Hypersonic Glide Body (C-HGB), is a Hypersonic Weapon (HW) predecessor under the Conventional Prompt Strike programme of the US Navy and Army, hence the qualifying adjective 'Common' before the name. it is one of the six HW development programmes underway in the United States under the aegis of various agencies and services.

In the wake of the successful test of the C-HGB, the US DoD is planning to expeditiously develop prototypes and field the weapons by 2023. The intended range of these hypersonic weapons is 1400 miles, and they are being developed in their boost glide version with a conventional warhead. Boost glide weapons are boosted to high altitudes and high velocities using a rocket from where they make a hypersonic glide attack on designated targets. The Pentagon has sought a substantially enhanced allocation to the tune of USD 3.2 billion for hypersonic research during FY 2021.

HW technology is being actively pursued by six major global powers including India. It offers the capability to strike targets located hundreds or even thousands of miles away in minutes without being intercepted due to very high speeds, a manoeuvring flight profile, low detection signature and threat avoidance system. Russia and China are reportedly developing nuclear-tipped hypersonic weapons: Avangard and Zircon by Russia, and D18-1S/2S/3S and DF 17 by China.

*__Source of Illustration__: https://defense-update.com

Roadmap to Transform the US Marines Corps

In March 2020, the United States Marine Corps unveiled a 10-year transformational roadmap titled 'Force Design 2030'. It envisages major changes to force structure, equipment, and training in order to create agile, dispersed units that wield increased precision firepower and operate within the 'weapons engagement zones' of potential major adversaries. The aim is to take the Corps closer to its original role as a naval expeditionary force with a focus on the littorals of the Indo-Pacific, leaving aspects of ground combat to the US Army.

As part of this ambitious plan, the Corps will reduce 12,000 personnel and effect reductions in the numbers of infantry battalions, artillery cannon batteries, amphibious vehicle companies, helicopter squadrons, and F-35 aircraft. The most striking of these is the reduction of the tank fleet to zero. At the same time, however, drone squadrons of the Corps are expected to double and rocket batteries to triple.

The key driver for this sweeping change is the realisation that the Marine Corps is not optimised to meet the demands of the current National Defence Strategy which has cast China, along with Russia, as a rival that is increasingly challenging the United States. China has acquired area-denial capabilities and is pivoting to the sea as the primary front in its competition with the United States.

***Source of Picture: www.military.com**

Dragon Gold 2020: China-Cambodia Military Exercise

Amid the global wave of event cancellations to stop the spread of COVID-19, China and Cambodia conducted their fourth joint exercise at the Techo Sen Chumkiri live-fire field in Cambodia's Kampot province from 15 March to 1 April 2020. Named 'Dragon Gold 2020', the focus of the exercise was counter-terrorism and humanitarian rescue. 3,000 soldiers, including 265 troops from China's PLA handled anti-terror equipment, practiced live-firing, de-mining, man hunting and search and rescue operations.

Cambodia is now seen as China's strategic gateway to the Gulf of Thailand and the South China Sea. Between 2016 and 2019, China invested some USD 7.9 billion in Cambodia spread across sectors such as transport infrastructure, power plants, factories, agriculture and real estate. Sihanoukville port has been identified for potential investments as part of the Belt and Road Initiative. Cambodia has also received health assistance from China, with a team of Chinese medical experts arriving in Phnom Penh on 23 March to help in the fight against COVID-19. Earlier, in February, at the height of the COVID outbreak in China, Cambodian Prime Minister Hun Sen travelled to Beijing to demonstrate his strong moral support to China. The increasing closeness between China and Cambodia has already contributed to the fracturing of the ASEAN consensus, with Cambodia blocking or watering down mentions of the South China Sea dispute in the grouping's ministerial communiques.

***Source of Picture: xinhuanet.com**

Japan Commissions Maya Class Destroyers

The Japan Maritime Self-Defense Force (JMSDF) commissioned the first of two Maya (improved Atago) class destroyers on 19 March 2020. The second vessel of the class is expected to enter service in March 2021.

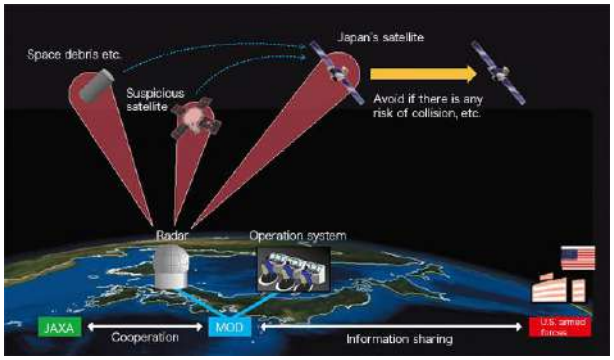
The Maya class of ships are 170 metres with a full load displacement of more than 10,000 tonnes. They are equipped with the US-developed Cooperative Engagement Capability (CEC) system, enabling them to share targeting data with other CEC-equipped ships and aircraft operating in the American and Australian navies. The Maya class also features the new Aegis system, and thus the ability to perform ballistic missile defence tasks. In addition, they will field the Standard Missile 3 (SM-3) Block IIA missiles, jointly developed by Japan and the United States, for intercepting short and intermediate-range ballistic missiles. This last feature is notable in the context of the threat perceived by Japan from North Korea's ballistic missile capability in the immediate term as well as from a potential Chinese ballistic missile threat in the future.

***Source of Picture: navaltoday.com**

Japan Establishes Space Domain Mission Unit

On the occasion of the 60th anniversary of the signing of the US-Japan Treaty in January 2020, Japan's Prime Minister Shinzo Abe had promised to strengthen the nation's defence capability and enhance cooperation with the United States, including in the areas of space and cyber security. In fact, Japan's Self Defense Forces have been undergoing considerable expansion during the last few years and strengthening collaboration with the US military. It is as part of this effort of beefing up own capabilities and enhancing collaboration with the American alliance partner that Japan is establishing the Space Domain Mission Unit (SDMU) this month. It may be recalled that the United States had established a Space Command in August 2019. Four months later, the Japanese government approved a budget of approximately USD 460 million for space-related projects.

SDMU would begin as an appendage to an existing air base at Fuchu. Its initial establishment is expected to be small with about 20 personnel, who will then prepare for a full launch in 2022. The unit's role is to conduct satellite-based navigation and communications for troops in the field. Over time, it will expand its activities to cover Space Situational Awareness (SSA) and passive counterspace operations to protect Japanese satellite systems. Japan has major



concerns on this front owing to the offensive counterspace programmes of China, North Korea and Russia.

*Source of Illustration: https://www.mod.go.jp

UK's Defence Data Management Strategy

The United Kingdom's Ministry of Defence has issued a defence data management strategy that sets out a roadmap for the effective use of data, information, and systems that manage and process data. Envisioning a "Defence Data Environment," which it describes as more of a cultural attribute, the strategy outlines seven objectives to ensure timely, attributable and trustworthy data. In broad terms, the strategy's aim is to improve the availability and accessibility of defence data, improve its quality and veracity, and ensure its management as a strategic asset through best practices; in effect, aim for the triad of integrity, confidentiality and security. In an era when even the smallest of decisions is driven by data, the strategy intends to iron out one of the most elementary, but often overlooked, issues, namely, inconsistencies in the practice of data management.