Non-Contact Warfare: Lessons from the US National Defence Strategy

Vivek Verma

Abstract

The 2018 National Defence Strategy (NDS) unveiled by the Pentagon can be encapsulated in three words 'compete, deter and win'. Key questions that arise are: What does it mean and how it gets manifested? NDS as the capstone document has been guiding the geopolitical discourse and global security developments. The Pentagon's efforts to redraw its dominance strategy and course correct its two decades of distraction due to endless wars in Afghanistan and West Asia have already manifested in Sino-US relations. A decade of 'pivot to Asia' policy put in place by Obama's administration gathered storm during Trump's tenure. 2018 NDS declared China and Russia as a strategic competitor. Washington's assertion of widening the competitive space is based on the premise of seamlessly integrating the US "multiple elements of national power—diplomacy, information, economics, finance, intelligence, law enforcement, and military".[1] *A closer examination of how the game gets played by the various national power elements under the new Biden administration will determine future policy directions against China and Russia. The lessons for India are ominous as it helps it to navigate the geo-strategic labyrinth.*

Brigadier **Vivek Verma** is Senior Research Fellow at The United Services Institution of India, New Delhi. He was the former Deputy Director, Centre for Land Warfare Studies.

Introduction

The glossary of military terms used by the US Armed Forces may not contain the term 'Non-Contact warfare'. However, the US strategic discourse reveals its practice. Non-contact warfare is defined as the form of warfare "in which states seek to employ all elements of national power […] to leverage their influence across multiple domains to target adversary's population, sovereignty, governance structures and economy through non-military or military non-kinetic and kinetic means".[2] The intention is to intimidate, paralyse or denude politico-military response while enabling winning without fighting or fight with minimum use of physical contact of own forces. Hence, its manifestation is across traditional military operations-across land, maritime, and air, supported by space and cyberspace and non-traditional fields including civilian affairs. Thus, non-contact warfare looks at a complete spectrum of warfare short of war waged by the civil-military combine.

The conflict is likely to be primarily played in the non-military domain, escalating into military domains. Within the military domain, it can be non-lethal or lethal and kinetic or non-kinetic. The intent is to "keep the response measured and calibrated along the desired escalation matrix to remain ahead in the game of domination".[3] Therefore, winning along each escalation ladder is more important than victory. It allows favourable outcomes without ratcheting up the violence in the ever-increasing lethal and complex warfare environment of the 21st Century.

The complex and contested global operating environment coupled with rapid dispersion and evolution of technologies and the new concept of warfare has prompted the Pentagon to articulate the 2018 NDS. The document steers the US long-term strategic approach. It aims to create a combat-credible military force capable of deterring war. It is nothing but the manifestation of non-contact warfare both in military and non-military domains.

The US Strategic Approach

American analysts believe that the past two decades have been a decade of distraction for the US due to its involvement in an endless war in Afghanistan and West Asia. They view the 2018 NDS as a course correction. Former Secretary of Defence General Mattis, assertion to guide American and allied forces to regain their lost edge over China has been the founding framework of this document. The intention to "compete, deter and win" is directed against China, Russia, North Korea, Iran and global terrorist organisations. However, China is the primary strategic competitor, followed by Russia. Pentagon believes that the Chinese actions against the Indo-Pacific region countries aim to gain regional hegemony in Indo-Pacific in the near term and ultimately achieve global pre-eminence.[4] Hence, the 2019 US' Indo-Pacific Strategy' aims to contain Beijing's predatory policies. Over the past three years, Washington has fast-paced policies, strategies and acts by publishing documents like National Security Strategy (2017), National Defence Strategy (2018), Nuclear Posture Review (2018), Missile Defence Review (2019), Taiwan Allies International Protection and Enhancement Initiative (TAIPEI) Act (2019) and Hong Kong Human Rights and Democracy Act (2019). It wishes to regain the lost strategic space ceded to China and Russia. The death of more than five hundred thousand US citizen to COVID-19 has already resulted in the ouster of President Trump. The new Biden administration may find it difficult to ignore the scars left over by the 'Chinese Virus'.

The US, Russia and China seem to be locked in long-term strategic friction in an ever-evolving competitive security environment.[5] As part of the great power rivalry, Washington feels it can expand the competitive space and seize the initiative to challenge the competitors where they lack strength. It is working on long-term strategic competition with "seamless integration of multiple elements of national power—diplomacy, information, economics, finance, intelligence, law enforcement, and

military".[6] The US strategic approach spells out the need for "more lethal force, strong alliances and partnerships, American technological innovation, and a culture of performance"[7] to achieve decisive military advantages.

The Pentagon policy of increasing the competitive space across multiple domains of diplomacy, information, economics, finance, intelligence, law enforcement, and the military was evident in Trump's administration power play. Series of actions across these multiple levels are likely to challenge the growing Chinese and Russian assertiveness.

- *Diplomatic Intransigence:* Despite the change of guard at Washington, the US policy towards China and Russia appears unchanged. The rising competition and conflict with China have led to QUAD's formation since the US, Japan, Australia and India have converged interests. The Biden administration will find it difficult to overturn Trump's protectionist and nativist "America First" policy in the aftermath of the COVID-19 crisis precipitated by China. Both the countries have locked horns on a wide range of issues related to discriminatory trade barriers, forced technology transfer, the militarisation of the South China Sea, intimidating Taiwan, human rights and religious freedom, government-sponsored cyber-enabled economic espionage and Chinese interference in other countries' political systems. Against Russia, the Biden administration may continue to play hardball to keep Russia tethered by neither mending nor further inflaming the relationship between them.
- *Exploiting the Economic Fault Line:* The strategic competition focuses on obstructing China's rise through two-fold measures. First, by decoupling the American economy from China's through supply chain diversification and secondly delaying and disrupting China's economic expansion by creating trade, tariff, and technology barriers. It aims to compel China to alter its behaviour. The US sees China's Belt and Road Initiative (BRI) as Chinese economic aggression to create a client state

throughout the Indo-Pacific, Africa, the Middle East, Europe, and the Americas. While China views BRI to enhance its trade connectivity, reduce surplus domestic industrial capacity, develop poorer interior provinces, promote energy security, and internationalise Chinese industrial and financial standards. The growth of China's global economic footprint makes it increasingly vulnerable to international and regional turmoil and terrorism. The PLA, mandated to protect China's overseas interests, is therefore forced to look for overseas basing infrastructure to deal with threats to its global interest. Further, the Chinese financial expert, like former People's Bank of China (PBOC) Governor Zhou Xiaochuan, advocates a larger global role for the yuan by displacing the dollar-denominated global financial system.[8] However, in the case of Russia, the US may continue using sanctions to hurt the pandemic-battered Russian economy. It allows the US to leverage its negotiations for the New START treaty with the Russian.

- *Laying out Legal Labyrinth:* Washington realises that the new cyber and space domain needs to navigate the trading partners' legal labyrinth. To unlock the value chain for wealth generation, it needs to create business-friendly legislation to promote its companies' interests. The headwind related to data sovereignty and the Internet of Things (IoT) has compelled it to make a compliant legal framework given the EU and Chinese legal requirement of data localisation and IPR related issues on content aggregation. To prevent the sale of arms and ammunition from adversaries like Russia and China, it has created legislations like Countering America's Adversaries through the Sanctions Act (CATSAA). Similarly, it is influencing international legislation related to the autonomous system, use of global commons,[9] and outer space.
- *Military Modernisations and Capability Enhancement:* The final Quadrennial Defence Review (QDR) of Obama's administration sought the capability to defeat a regional aggressor and impose unacceptable costs on a second aggressor in another region. However,

the Crimean conflict left the US red-faced as it showed its inability to secure favourable outcomes. Thus, the 2018 NDS imposes higher demands on the military. The NDS charges the military services with building a more lethal force, strengthening alliances and attracting new partners, and reforming Pentagon for greater performance and affordability. However, the 2018 NDS approach of 'compete, deter, and win' opens up the US military to a multi-front scenario.

The US Operational Construct

The US prioritisation of preparedness for war looks at three things: First, to deter aggression across the Indo-Pacific, Europe, and West Asia; second, to degrade terrorist and WMD threats; and third, defend US interests from the challenges below the level of armed conflict. China and Russia, being strategic competitors, find themselves engaged across all spectrum of war. The concept of deterrence, degradation and defence employed by the US against these nuclear powers calls for restrained retaliation to prevent conflict escalation. For the US to maintain the force credibility and superiority, it needs to preserve its economic and technological dominance to navigate the international power play. The rules of the game by the US therefore include:

- *Be Strategically Predictable, But Operationally Unpredictable:*[10] To deter or defeat long-term strategic competitors', the US intends to target its adversaries by introducing the concept of unpredictability through integrated actions planned in coordination with allies and partners. It aims to outmanoeuvre the competitors by stymieing their efforts, preventing them from exercising their options and compelling them to confront adverse conditions. The reliance is on the creation of lethal force by modernising capabilities in the new and niche domains.
- *Counter Coercion and Subversion through Integrated US Interagency Actions:*[11] The Chinese and Russian use of political subversion,

proxies, and the threat or use of military force to change facts on the ground has incensed the Pentagon. Besides this, the Chinese predatory economic method of technology transfers and IPR violations has prompted Washington to expand the competitive space. It exercises a series of combined US interagency actions through the State, Treasury, Justice, Energy, Homeland Security, Commerce, USAID, the Intelligence Community, law enforcement, and other departments. It seeks to counter Chinese and Russian coercive acts by identifying and addressing the vulnerabilities in economic, technological, and information areas. The trade, technology, and currency wars at play during the Trump era are the precursor to the larger games of dominance and disruption that are likely to unfold.

Examining the US Military Objectives

According to the US National Defense Strategy Commission, "America's military superiority—the hard-power backbone of its global influence and national security—has eroded to a dangerous degree".[12] Hence, the 2018 NDS is an essential strategic document guiding the Pentagon's priorities, investments, and programming decisions. The prioritised objectives of deterring war, protecting the security of the country and winning the highly competitive conflicts remain a crucial concern for the US planners.

The critical military objectives for Pentagon therefore are:

- *Defending the Homeland from Attack:* The 9/11 disaster at the start of the 21st Century compelled Pentagon to an out of area operations to exterminate global threats emanating outside the US soil. However, prolonged stability operations in Afghanistan and West Asia, coupled with the poor handling of the COVID-19, has shown the chinks in the US security apparatus. The US policymakers realise the graver threats in its inability to deal with engineered protests like the '#blacklifematters' campaign that creates a societal cavity, the healing of which may take a long time. While advocating 'massive retaliation' and 'left of

launch strategy' designed to counter CBRN and missile threats, the US policymakers are also looking at pre-empting terror acts or protest plots at home. It has created a Geographical Information Grid under the US Space Command and carried out interagency coordination to improve situational awareness across all domains.

- *Defending Vital Interests through Deterrence:* For the US to dominate world affairs, it knows that it has to protect its economic and financial dominance by retaining technological superiority. The envelope of cyberspace promoted through an aggressive space programme need protection. Pentagon also knows that deterrence is dependent on precision long-range stand-off vectors and missile defence capabilities. Hence, it aims to employ multi-domain measures to address its vulnerabilities, like creating unhackable communication and space-based interceptor layers. It has introduced the Arms Export Control Act (AECA) and International Emergency Economic Powers Act (IEEPA) to prevent evasion of export of sensitive military technologies. It is also looking at ways to prevent China from information harvesting under the garb of laws like National Security Law, Cyber Security Law, National Cyber Security Standards and Technical Committee Standards.
- *Defending Allies from Military Aggression, Supporting Partners Against Coercion, and Fairly Sharing Responsibilities for Common Defence:* This big charter makes Pentagon look at the Chinese coercion and anti-access and anti-denial (A2AD) strategy deployed in the Pacific against its allies, including Japan, South Korea, Taiwan, Philippines, and Micronesian republics. It also aims to demonstrate its ability to deter Russian invasion in the Baltics through credible combat capabilities. Against North Korea and Iran, it aims at employing punitive deterrence. All these entail a four-fold process. First, the US intends to maintain an adequate force in Indo-Pacific. Second, it would like to strengthen the EU and NATO forces against

the Russian threat. Third, improve its surveillance capabilities against states sponsoring terrorism. Fourth, evolve security mechanism to strengthen its partners and allies that allow it flexibility in intervention and engagement, if required.

Priorities for Military Modernisation

Unfortunately, the 2018 NDS creates a strategy resource gap for the US. It needs to handle two peer nuclear competitors China and Russia, two rogue nuclear states in North Korea and Iran and tackle the unfinished wars in Afghanistan and Iraq with the threat of terrorism looming large with increasing footprints and varied manifestations. Freedom of navigation exercise by the US and its allies in the South China Sea and long-range joint air patrol by Russia and China over the South Korean Air Defence Identification Zone (ADIZ) on 23 July 2019 is a precursor to testing tolerance by adversaries and hotting up of the grey-zone competition. Russia and China are likely to employ disruptive measures short of war using multiple tools of statecraft to expand their influence and weaken US alliances and partnerships. Near simultaneous contingencies will stretch US resources and may undermine its deterrence and coercive ability. Washington priorities remain to increase US influence and preserve market access. It, therefore, needs a military with credible combat power capable of operating across the entire spectrum of conflict. The priorities of military modernisation as identified in 2018 NDS are as follows:[13]

- *Nuclear forces:* It endeavours to modernise its nuclear force by developing options to counter competitors' coercive strategies predicated on the threatened use of nuclear or strategic non-nuclear attacks.
- *Space and Cyberspace as Warfighting Domains:* It is prioritising the building of resilient cyber and space capabilities. It looks at the continued integration of these capabilities into the full spectrum of military operations. The reconstitution of operations to assure

the survivability of the assets has manifested in the creation of the US Space Command and assigning the status of fighting theatre command to the US Cyber Command in 2018.

- *Command, Control, Communications, Computers and Intelligence, Surveillance, and Reconnaissance (C4ISR):* It contemplates building a robust, survivable information ecosystem with an ability to attribute and hold accountable state or non-state actors during cyber-attacks. The capability spans from tactical to strategic planning to exploit information while denying them to the competitors.
- *Missile Defence:* It looks at layered missile defences and disruptive capabilities for missile threats.
- *Forward Force Manoeuvre and Posture Resilience:* While prioritising between various forces component, including space, the endeavour is to transition into "smaller, dispersed, resilient, adaptive basing that include active and passive defences".[14]
- *Advanced Autonomous Systems:* It looks at developing military and commercial applications in autonomy, artificial intelligence, and machine learning to provide competitive military advantages.
- *Resilient and Agile Logistics:* In the face of persistent multi-domain attack, it endeavours to create a non-commercially dependent distributed logistics and maintenance system to undertake strategic mobility and provide sustained logistics support to partner and allies.

US DoD Budgetary Support

2018 NDS guides Defence Budget. The defence budgetary request for FY2020 was pegged at US$ 712 billion, while the FY2021 request stands at US$ 705 billion.[15] It represented 4.9 per cent nominal growth (2.8 per cent real growth) over the FY2019 enacted appropriation.[16] In 2018, The US Cyber Command was elevated to become the combatant command. It announced the reactivation of US Space Command as a unified combatant command. The FY2020 budget request reinforced

these actions by recognising the increased importance of space and cyber warfighting with additional resources. The budget request for FY2021 clearly emphasises the "irreversible implementation of 2018 NDS". The significant budget allocation, capability and capacity development in the various field made in FY2020 are as follows:[17]

- *Space (FY2020 US$ 14.1 billion & FY2021 US$ 18.0 billion):* It earmarked resources for the expeditious building of the new US Space Force HQ. The budget allocation aimed to reduce the risk of satellite communications jamming besides increasing the provisions for the Global Positioning System, strengthening satellites and operational control system, space-based missile warning capabilities and space launch capacity.
- *Cyber (FY2020 US$ 9.6 billion and FY2021 US$ 9.8 billion):* The intended budget was to support offensive and defensive cyberspace operations, modernise DoD's multi-cloud environment while investing in enhancing the cybersecurity capabilities.
- *Air (FY2020 US$ 57.7 billion and FY2021 US$ 56.9 billion):* Besides focussing on improving the ISR capabilities, it aimed at increasing the capability and capacity of 4th and 5th Generation Aircraft (110 in FY2020 and 115 in FY2021), Advanced Medium-Range Air-to-Air Missile (AMRAAM) (389 quantity in FY2020 and 789 in FY2021) and Joint Air-Surface Missile—Extended Range (JASM-ER) (430 quantity in FY2020 and 400 in FY 2021). In FY2021, it has initiated five Special Operation Forces Armed Overwatch capability.
- *Maritime (FY2020 US$ 34.7 billion and FY2021 US$ 32.3 billion):* The primary focus remains to increase the battle force fleet from 296 to 314 by FY2024 besides three Virginia Class Submarines. The priority also remains to enhance unmanned systems through the introduction of two large Unmanned Surface Vehicles (USVs) and stand-off missiles like the Long-Range Anti-Ship Missiles (LRASM) (48 quantity) and Maritime Strike Tactical Tomahawk (TACTOM) (90 quantity).

- *Land (FY2020 US$ 14.6 billion and FY2021 US$ 13.0 billion):* Instead of firepower getting the priority, the bulk of the fund aims to expand ground manoeuvre capacities by adding combat-motorised vehicles (6,402 in FY2020), Joint Light Tactical Vehicles (4,090 in FY2020 and 4,247 in FY2021) and Amphibious Combat Vehicles (56 in FY2020 and 72 in FY2021) for employment by the Marine Corps.

- **Multi-Domain**
  - *Missile Defeat and Defence (FY2020 US$13.6 billion and FY2021 US$ 20.3 billion):* The FY2018 and FY2019 budgets helped create a 20-silo missile field in Fort Greely, Alaska. Due emphasis is being given to expand the capabilities for Ground-Based Missile Defences, Terminal High Altitude Area Defence (THAAD) interceptors (37 in FY2020 and 41 in FY2021) and Aegis Ballistic Missile Defence (SM-3) missiles (37 in FY2020 and 40 in FY2021) for regional missile defence. A significant allocation of US$ 174 million has been made to enhance the space-based missile warning and ground control enhancements to address hypersonic threats. Substantial allocations have also been made to develop boost-phase and advanced technology missile defence systems besides directed energy and air-launched kinetic interceptors to destroy adversary ground-based missiles prior-to-launch.
  - *Nuclear Enterprise (FY2020 US$ 14.0 billion and FY2021 US$ 17.7 billion):* The US 2018 Nuclear Posture Review is guiding the US nuclear modernisation drive. To keep the US nuclear deterrent credible and modernised for decades, the document underscores the need for the nuclear triad, recapitalisation of the nuclear-armed missiles, submarines, bombers, dual-capable aircraft, and related infrastructure. The FY2018 and FY2019 budgets were invested

in upgrading the Columbia class ballistic missile submarine (US$ 2.2 billion), Long Range Standoff Weapon, Ground-Based Strategic Deterrent, and B-52 modernisation. The FY2020 budget focussed on ground-based strategic deterrent (US$ 570 million), B-21 Bomber (US$ 3 billion), and long-range stand-off weapon (US$ 712 million). Other areas of modernisation include missile warning capabilities, Nuclear Command, Control and Communications (NC3) capabilities across the spectrum of military operations (US$ 2.5 billion). The US Department of Energy, which funds most of the US nuclear programme, shows an 11.8 per cent increase in their FY2020 funding to US$ 12.4 billion.[18]

- *Special Operations Forces (SOF) (FY2020 US$ 3.4 billion and FY2021 US$ 3.0 billion):* The US began to increasing the SOF end-strength by FY2018. The FY2020 budget was dedicated to enhance research and development, improve high-end warfighting while sustaining Counter-Terrorism (CT) and Countering Weapons of Mass Destruction (CWMD) missions. Irregular Warfare (IW) was identified as a core competency. Accordingly, allocations aim to increase readiness and lethality through investment in new technologies. It includes investments in Directed Energy (US$ 27.2 million), AC/MC-130J aircraft/ gunships (US$ 342.8 million), CV-22 tilt-rotor aircraft (US$ 45.3 million) and additional surface and sub-surface maritime craft systems (US$ 105.7 million).
- *Technology:* The US departments engaged in technology development includes the military departments and their laboratories, Federally Funded Research and Development Centers (FFRDCs), University Affiliated Research Centers (UARCs), and the defence agencies like DARPA (Defence Advanced Research Projects Agency). The technology development focus of the US military are:

- Unmanned/Autonomous: To enhance the freedom of manoeuvre and lethality in contested environments by developing offensive-armed Unmanned Surface Vessel, Unmanned Undersea Vehicle and Autonomous Logistics Platforms (FY2020 US$ 3.7 billion and FY2021 US$ 1.7 billion).
- Microelectronics/5G and Artificial Intelligence: The US unveiled its Artificial Strategy in 2020. It aims to expand military advantage with the Joint Artificial Intelligence Centre (JAIC) and Advanced Image Recognition (Project Maven) (FY2020 US$ 927 million and FY2021 US$ 800 million). In FY2021, it addresses issues related to the trusted and assured supply of microelectronics besides hastening the adoption of 5G connectivity for greater network bandwidth (FY2021, US$ 1.5 billion).
- Hypersonic: Pentagon sees its applicability with all three services. It aims to enable Air Force Advanced Rapid Response Weapon (ARRW), Navy Sea-Launched Conventional Prompt Strike, and Army Long Range Hypersonic Weapon (LRHW) by infusing US$ 2.6 billion in FY2020 and US$ 3.2 billion in FY2021.
- Directed Energy (DE): The US continues with the development of offensive and defensive DE capabilities. It supports the implementation of DE for base defence, enables testing and procurement of multiple types of lasers, and has increased its research and development for scalable high-power density applications (FY2020 US$ 235 million).
- Quantum Technology: The quantum technology race is likely to determine the future of technology. Quantum cryptography and communications create unhackable networks. The massive quantum computing capabilities create innumerable possibilities

of cracking prevalent encryption and better discrimination which may sound the death knell for stealth technology. Notable progress in quantum radar, sensing, imaging, metrology and navigation will enable greater precision and sensitivity. Quantum materials, such as topological insulators, can improve quantum computing. Quantum research is a long-term vision by China as it plans to spend more on R&D by 2030 than any other country.[19] The US is worried that any gains by the Chinese in quantum technologies could alter the future military and strategic balance of power. The 2019 'Worldwide Threat Assessment' report to the US Senate points out how the quantum cryptography networks could frustrate US cyber intrusion and signals intelligence capabilities. Hence, the US has authorised the National Quantum Initiative Act (NQI) to invest US$ 1.2 billion in quantum information science over five years. US Department of Energy has announced another US$ 80 million for quantum research. US DARPA budget of US$ 3.6 billion in FY2020 is devoted to critical technologies like AI and Quantum.[20]

Lessons for India

Non-contact warfare is testing the threshold of violence and the use of force. It has altered the way countries look to settle political disputes and conflicts. A country like India with two nuclear neighbours, unsettled active borders across two fronts, and an ongoing proxy war need to plan for a two and half front war as part of a typically traditional security outlook. However, the expanded security landscape led by cyber and space and guided by the new generation technologies of quantum, AI and 5G can compress the window of application from tactical to the strategic level. The engineered conflicts pose new challenges in the non-traditional security arena. In this area, the armed forces have

no jurisdiction or little participation as yet. Hence, national security strategy, whether declared or not, is essential to guide future force design.

Non-contact warfare aims at subverting the politico-eco-social systems. It targets the edifices of national power like finance, industries, commerce, critical technologies, critical resources for new materials, energy grids, transportation, information highway, influence engine within a country like media, academia, political entities, NGOs and societal peace. As part of the national security strategy, the PLA and Pakistan Army have developed sub-threshold capabilities to engage their adversaries in a grey-zone conflict or proxy war. The intent is clear- to keep the adversary engaged in an endless battle at the sub-threshold level and prevent the conflict from spiralling out. The operational environment created by them aims to achieve strategic stability while continuing with the resistance and offence at the operational and tactical level.

The immediate question confronting India is: Where does the security problem lie? How well is India equipped to safeguard its population and interests? Should the western-styled Indian Army continue to work in its traditional space or look for a non-traditional security mandate? As India develops economically, it will have to manage strategic friction. Hence, it requires a doctrinal approach to security, better civil-military integration, technological innovation, a better defence industrial base and robust law enforcement.

The stakes for security will increase as India grows. It will entail a need for better civil-military synergy, the ability to safeguard the sovereignty of new domains like data, technology, space and outer space and deep-sea besides traditional security domains and above all, the creation of asymmetric capabilities. India will do well to manage its fault lines and create alliances and partnership, which will usher in stability and guarantee security. India has to be prepared for Non-contact warfare as it is the future of war, and it needs a whole-of-a-government approach.

According to Indian Chief of Army Staff General MM Naravane, "victory no longer rests on the ability to inflict massive destruction but on the ability to wrestle popular support from one's opponent".[21]

Examining the US and China and the US and Russia powerplay, it is evident that the thrust for fighting the protracted conflict lies in increasing the strategic space of contest. The reliance will be to engage the adversary across multiple domains while maintaining force parity. It has been observed that the approach to warfare becomes aggressive if the force asymmetry is significant, e.g., Russia and Ukraine and the US and Iraq engagements. India must therefore undertake capability and capacity building based on the security profiling of its adversaries. National security is the cumulative sum of a collaborative effort across PIMED (political, intelligence, military, economic and diplomacy). The world is still wedded to balance of power syndrome. Hence military will continue to be the pivot over which nations will play the hardball.

Notes

1. Department of Defense, United States (2020), "Summary of the 2018 National Defense Strategy of The United States of America", p. 4. Available online at https://dod.defense.gov/Portals/1/Documents/pubs/2018-National-Defense-Strategy-Summary.pdf, accessed on February 9, 2021.
2. Brigadier Vivek Verma (2021), *Non-Contact Warfare: An Appraisal of China's Military Capabilities*, New Delhi: Pentagon Press.
3. Ibid.
4. Department of Defense, United States (2020), "Summary of the 2018 National Defense Strategy", n. 1.
5. Zhang Tuosheng (2011), "A Study of China's Behavior in International Military and Security Crises" [Zhongguo Junshi Anquan Weiji Xingwei Yanjiu]", World Economics and Politics [Shijie Jingji yu Zhengzhi], April 14, 2011, pp. 103-121.
6. Department of Defense, United States (2020), "Summary of the 2018 National Defense Strategy", n. 1.
7. Ibid.
8. "China's former central bankers warn of lasting currency war with US", *The Business Times*, 10 August 2019. Available online at https://www.businesstimes.com.sg/government-economy/chinas-former-central-bankers-warn-of-lasting-currency-war-with-us, accessed February 12, 2021.

9. UN System Task Team on the Post-2015 UN Development (2013), "Global governance and governance of the global commons in the global partnership for development beyond 2015", January 2013. Available online at https://www.un.org/en/development/desa/policy/untaskteam_undf/thinkpieces/24_thinkpiece_global_governance.pdf, accessed February 12, 2021.
10. Department of Defense, United States (2020), "Summary of the 2018 National Defense Strategy", n. 1.
11. Ibid.
12. Eric Edelman, et al. (2018), "Providing for theCommon Defense: The Assessment and Recommendations of the National Defense Strategy Commission", National Defense Strategy Commission, 13 November 2018. Available online at https://www.usip.org/sites/default/files/2019-07/providing-for-the-common-defense.pdf, accessed on February 18, 2021.
13. Department of Defense, United States (2020), "Summary of the 2018 National Defense Strategy", n. 1.
14. Ibid.
15. Office of The Under Secretary Of Defense (Comptroller)/Chief Financial Officer) (2020), "Defense Budget Overview: Irreversible Implementation of the National Defense Strategy", Revised May 2020. Available online at https://comptroller.defense.gov/Portals/45/Documents/defbudget/fy2021/fy2021_Budget_Request_Overview_Book.pdf, accessed on February 20, 2021.
16. Ibid., pp. 1-4.
17. Ibid., pp. 1-9.
18. Department of State, United States (2020), "Congressional Budget Justifications: Deaprtment of State, Foreign Operations and Related Programs", Fiscal Year 2020, 11 March 2019. Available online at https://www.usaid.gov/sites/default/files/documents/1868/FY_2020_CBJ.pdf, accessed on February 21, 2021.
19. Paul Smith-Goodson (2019), "Quantum USA Vs. Quantum China: The World's Most Important Technology Race", *Forbes,* 10 October 2019. Available online at https://www.forbes.com/sites/moorinsights/2019/10/10/quantum-usa-vs-quantum-china-the-worlds-most-important-technology-race/#17c896d272de, accessed on February 21, 2021.
20. Ibid.
21. Quoted in "Focusing on dynamic response that is below threshold of all-out war: Indian Army chief", *The Economic Times*, 4 March 2020. Available online at https://economictimes.indiatimes.com/news/defence/focusing-on-dynamic-response-that-is-below-threshold-of-all-out-war-indian-army-chief/articleshow/74471547.cms?from=mdr, accessed on February 22, 2021.