Assessing China's Preparedness for High Altitude War

Monika Chansoria

The Chinese People's Liberation Army (PLA) has been concentrating on preparing itself for a potential conflict situation, especially in the high-altitude areas. China advocates that the international situation is currently undergoing complex changes and is certain that the progress toward economic globalisation and multipolarity is irreversible. Assessing the global and regional strategic dynamic, Beijing underscores the contradictions that continue to surface between developed and developing countries, while local conflicts and regional flashpoints are a recurrent theme.[1] China has long stressed that "major powers are stepping up the realignment of their security and military strategies", accelerating military reform, and vigorously developing new and more sophisticated military technologies, working out strategies for outer space, cyber space, developing means for prompt global strikes, accelerating development of missile defence systems, enhanced cyber operations capabilities to occupy new strategic commanding heights. Basically, what China seems to be preparing for, ardently, is to counter the efforts by "some developing countries maintaining the push towards strengthening their armed forces, and press on with military modernisation."

Bearing in mind the primary goal of accomplishing mechanisation and attaining major progress in informationisation by 2020, the PLA perseveres with mechanisation as the foundation and informationisation as the driving force, making extensive use of its achievements in information technology, and stepping up the composite and integrated development of mechanisation and informationisation. The PLA has expanded and made profound

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preparations for military struggle, which serve as both pull and impetus to the overall development of modernisation. China has acknowledged intensification of theoretical studies on joint operations under conditions of informationisation, advancement of the development of high-tech weaponry and equipment, development of new types of combat forces; it strives to establish joint operation systems in conditions of informationisation, acceleration in the transition from military training under conditions of mechanisation to military training in conditions of informationisation, pressing ahead with implementation of the strategic projects, investing greater efforts in building a modern logistics capability, and enhancement of capabilities in accomplishing diversified military tasks in order to win local wars under the conditions of informationisation.

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In a related development, the official mouthpiece of the Central Committee of the Chinese Communist Party (CCP) reported that heavy fighters of the PLA cruised over the Himalayan ranges with live ammunition in September 2012. The third-generation heavy fighters of the Chinese Air Force practised complex drills and subsequently monitored the fighter pilots' body response to the high altitude terrain—thus, providing further credence to China's plans of preparedness for high-altitude war. The PLA Air Force (PLAAF) is circumspectly working towards developing significant air space denial

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capability. In reference to this, a logistics exercise in August 2010 involving the Qinghai-Tibet railway line marked the first PLAAF use of the railway for military purposes, with the Military Transportation Department of the PLAAF Logistics Department overseeing the movement of "combat readiness materials" to Tibet. This would seem to reflect a growing PLAAF role in maintaining security along the Sino-Indian border in the Tibetan area.[3]

The year 2012 has witnessed exceptional PLAAF activity on the Qinghai-Tibet plateau, wherein in March 2012, the PLAAF of the Chengdu Military Area Command (MAC) held a live ammunition drill, during which it carried out surgical strikes at night by testing the multi-role J-10 fighter jets, in a "first operation of its kind". China's state-controlled media reported that the ground crew of the J-10 regiment fuelled the fighters and loaded ammunition on the 3,500-metre-high plateau at temperatures below -20 degrees Celsius. The J-10 fighters attacked targets with conventional as well as laser-guided bombs. The J-10 fighter was initially designed as an air superiority fighter, focussing on air combat and interception capability. The J-10 fighters made the first flight during the Chinese lunar New Year on the Qinghai-Tibet plateau in January 2012 with a typical air combat patrol payload, namely two mid-range air-to-air missiles, two short-range air-to-air missiles, and three external fuel tanks.

Live Military Exercises in Tibet

Following the conduct of its first live military exercise in Tibet in 2010, the PLA for the first time rehearsed capture of mountain passes at heights beyond 5,000 metres in November 2011 with the help of armoured vehicles and airborne troops. The Chinese Ministry of Defence made this claim in an official report, which described the exercise as a "challenge" since it was being conducted on a plateau with an elevation of more than 4,500 metres. The exercise was depicted as the "first joint actual-troop drill of the PLA air and ground troops under information-based conditions in frigid area with a high altitude". The

joint drill involved the Chinese Air Force, ground troops, armoured columns and a range of support entities. The Chinese Defence Ministry's report provided rare details of the exercise, stating that the new type warplanes of the PLA Air Force conducted accurate strikes at the targets.[4]

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In October 2010, the PLA conducted its first Group Army-level joint air-land exercise (*shimingxingdong*). The primary participants from Beijing, Lanzhou, and Chengdu Military Regions (MRs) (opposite India's northeastern theatre) practised manoeuvre, ground-air coordination, and long-distance mobilisation via military and commercial assets as they transited between MRs. China's long-term, comprehensive military modernisation campaign is aimed at improving the PLA's capacity to conduct high-intensity, regional military operations-anti-access and area denial operations. The 1985 transformation of China's national military strategy reoriented the PLA away from its almost exclusive concern with continental defence. This vivid change in strategy required major modifications in the PLA's operational doctrine, expanding the roles and missions of its air and naval forces, and abrogating essentially all of the principal elements that form the core of "people's war".[5]

Preparation for "Local, Limited" War

A nation's military strategy is fundamentally crucial and consequential towards defining its operational doctrine. By the mid-1980s, Beijing altered its national military strategy from an explicit focus on a major 'nuclear' war with the Soviet Union towards concentrating on preparations for a potential "local, limited war" on China's periphery. The gradual enhancement in the Chinese military capabilities during the course of this decade highlights the significance of challenges posed to neighbouring countries, though the current military build-up for the decade indicates Beijing's orientation towards Taiwan and the South China Sea areas. Nevertheless, China's resolve to fight and win local wars on its borders poses a challenge to the regional stability. The developments in the conventional and strategic forces of China and efforts at joint operational training, along with improvements in logistics are expected to be carried forward and enhance the military capabilities of China in this decade.

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The Chinese State Council has accepted that China has vigorously maintained national security and social stability, and its comprehensive national strength has stepped up to a new stage. The "Taiwan independence" separatist force and its activities are still the biggest obstacle and threat to the peaceful development of cross-Strait relations. Further progress in cross-Strait relations is still confronted by complicating factors. Beijing is tackling what it describes as "separatist forces working for East Turkistan independence and Tibet independence". China asserts that the above have indeed inflicted serious damage on national security and social stability. In accordance with the Constitution of the People's Republic of China (PRC) and other relevant laws, the armed forces of China undertake the "sacred duty of resisting foreign aggression, defending the motherland, and safeguarding overall social stability and the peaceful labor of its people." China implements the military strategy of active defence of the new era by strengthening the construction of its armed forces and that of its border, territorial sea and territorial air defences, and enhancement of national strategic capabilities.[6]

The PRC has been carrying out extensive infrastructure development in the high altitude regions of Tibet and Xinjiang along with areas close to its southern borders to include development of the road, rail and air networks, fuel, oil and lubricants (FOL), pipelines, telecommunications and industrial base. Such extensive development of the logistics infrastructure indicates the impetus being made available to the PLA's logistics capability, which, in turn, will enhance its operational capability in China's western frontier. The infrastructure and logistics build-up shall double up as base support for the PLA so as to facilitate military operations. China could well transfer telecommunications and other command and control facilities which are needed to deploy missiles from launches at a chosen place. By virtue of increasing the transportation capacity which thereby shall enhance induction capability, faster build-up of logistics up to future rail heads, besides providing capability for day and night movement. In fact, Chinese troops were being transported on the Qinghai-Tibet rail network to Lhasa in December 2007, signifying its use for military purposes. The *Xinhua* news agency cited unnamed sources in the PLA stating that the railway would

become 'a main option' for transported soldiers.[7] In addition, the PLA is also concentrating on developing logistics and infrastructure to improve the rapid deployment capability of the integrated forces.

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Rapid Reaction Forces

A small but concentrated high-tech force perfectly suited for flexible use, especially in case of regional contingencies, termed as a rapid reaction force (RRF). Capable of responding to local war scenarios, the rapid reaction units are regarded as the PLA's most capable fighting forces. During the decade of the late 1990s, only a small proportion of the PLA logistics system was capable of being restructured to support combat operations under high-technology conditions. Many of these units were attached to designated rapid response units of the ground, air and naval forces as well as those of the Second Artillery. However, the number of RRFs in the PLA has grown steadily since their creation during the mid-1980s.[8] The 15th Airborne Army is the PLA's primary strategic rapid deployment force but it has been used only for internal security missions so far.[9] It has been reported that the Chinese have identified and located RRFs with specific emphasis on each particular MR and the nature of threat associated. Accordingly, one motor infantry division in the Chengdu MR and two additional infantry divisions and a motor infantry division in the Lanzhou MR with special reference to India are reported to serve as rapid reaction units.

The rapid reaction capability of the Chinese armed forces in the Tibet region, particularly the ability to quickly manoeuvre heavy equipment, has been greatly enhanced. This was indicated by the fact that the PLA soldiers on the T-90/89 vehicles on the streets of Lhasa were all wearing the "leopard" camouflage uniforms specifically designed for mountain warfare operations. These uniforms appeared in the video footage of the 149th Division during exercises. Calculated on the basis of being able to transport most of the heavy equipment of a whole mechanised division within 48 hours, it is unlikely

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that all the division's equipment would be moved; the PLA would be able to transport approximately 10 light mechanised divisions and some heavy mechanised divisions through the railroad to Tibet from the Lanzhou and Chengdu MRs within 30 days.[10]

The average load capacity of one Chinese train car is normally 60 tonnes, with about 20 cars in each cargo train. This ideally should imply that each train could transport 1,200 tonnes, and, thus, 11 trains travelling both ways would be enough for each day. In time of war, the actual number of trains running on the railroad could double to roughly 20 trains both ways each day. Suppose the total weight of the equipment and combat material needed for one rapid reaction division of the Chinese Army was around 15,000 tonnes, the Qinghai-Tibet railway could transport a whole rapid reaction division on one average day. In other words, within every one-and-a-half to two days, China could move one rapid reaction division from the Chengdu MR or one rapid reaction division from the Lanzhou MR to Tibet. China's air transport capability, including additional airborne troops, rapid reaction troops and armed police could be directly delivered to Lhasa from the air. Since airdrop operations would take place in the Tibet region, there would be no need for ground-based air defence firepower. The railway would allow the 61st Plateau Rapid Reaction Motorised Division of No. 21 Group Army under the Lanzhou MR and the 149th Rapid Reaction Motorised Division of the Chengdu MR to quickly enter Tibet.

A study of the development of the logistics infrastructure in the Tibet Autonomous Region (TAR) and along the China-India frontier reveals that there has been an increase in the logistics and infrastructural capability of the PLA to induct and sustain a larger quantum of forces up to major townships in the TAR. However, the crucial restrictive factors for force applications are deployability and logistics sustainability at the places of application. The depth of the operations undoubtedly shall continue to be governed by terrain, vagaries of climate, sustenance capacities of the thrust lines chosen, and the Indian defence preparedness at the chosen area of application. The PLA logistics set-up along the China-India borders currently caters for a limited force level in the border management role. Hence, supplies, ammunition and FOL for almost the entire force level being inducted for an offensive have

to be moved and dumped near likely places of application, prior to the offensive.

Following Tibetan protests in the past few years, a special security coordination unit, the 110 Command Centre, was established in Lhasa with the primary objective of suppressing the disturbances and restoring full central government control understandably under the direct control of Zhang Qingli, first secretary of the Tibet Party and President Hu Jintao's loyalist. Zhang is also the former Xinjiang deputy party secretary, with considerable experience in counter-terrorism operations in that region. In addition, significant positions in Lhasa are being held by Zhang Xinfeng, vice minister of the Central Public Security Ministry and Zhen Yi, deputy commander of the People's Armed Police Headquarters in Beijing. The seriousness with which Beijing treated the unrest was further illustrated by the deployment of a large number of important army units from the Chengdu MR, including brigades from the 149th Mechanised Infantry Division, which acted as the region's RRF.[11]

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A *United Press International* report stated that the elite ground force units of the PLA were involved in Lhasa, with the new T-90 armoured personnel carriers and T-92 wheeled armoured vehicles being deployed. The UPI report also brought out that China eventually denied the participation of the army in the crackdown, saying it was carried out by units of the armed police. "Such equipment as mentioned above has never been deployed by China's armed police, however." Air support was provided by the 2nd Army Aviation Regiment, based at Fenghuangshan, Chengdu, in the Sichuan province. It operates a mix of helicopters and Short Take-off and Landing (STOL) transports from a frontline base near Lhasa. Combat air support could be quickly made available from fighter ground attack squadrons based within the Chengdu region. The Xizang Military District forms the Tibet garrison, which has two mountain infantry units; the 52nd Brigade based at Linzhi and the 53rd Brigade at Yaoxian Shannxi. These are supported by the 8th Motorised Infantry Division and an artillery brigade at Shawan, Xinjiang.[12] According to Srikanth Kondapalli, it was widely reported that at

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the time of the unrest, China had deployed 180,000 troops in the Chengdu MR and nearly 220,000 troops in the Lanzhou MR. Notably, the Chengdu MR has operational jurisdiction in Sichuan, Tibet, Guizhou and Yunnan regions and the Lanzhou MR has operational jurisdiction in Gansu, Qinghai and Xinjiang regions.

Construction of Fifth-Generation Barracks in the Xinjiang Military Area Command

Proving a fillip to China's preparedness for potential high-altitude warfare, the PLA has completed construction of the fifth-generation barracks of the Simhana frontier defence company under the Xinjiang Military Area Command (MAC). According to the Housing Office of the PLA's Xinjiang MAC, the fifth-generation multifunctional barracks will be available in all frontier defence companies with an elevation of 3,000 metres and above, falling under the Xinjiang MAC. Given the fact that most frontier defence companies and sentry posts are stationed on snow-capped mountainous terrain, including plateaus at altitudes of over 3,000 metres, the fifth-generation barracks come in as a critical achievement at those heights. The PLA has been concentrating on preparing itself for any given conflict situation, especially in the high-altitude areas. In this reference, incomplete domestic installations and lack of heat preservation in the older barracks posed difficulties vis-à-vis credible frontier defence.[13]

The construction of the fifth-generation complex is reported to have cost China over Yuan 14 million. The decision to invest in constructing and renovating logistics facilities of high-altitude companies, including at Shenxianwan, began way back in 2007 as per directives of China's Central Military Commission (CMC) and the General Headquarters (Departments) of the PLA, the Lanzhou MAC and the Xinjiang MAC. Moreover, the newly constructed and commissioned barracks of the Biedieli frontier defence company are equipped reportedly with "ten major systems" including direct-drinking water purification system, solar-powered and boiler bathing system, solar-powered and diesel engine generating system, boiler

heating and solar heating system. Besides, it has been reported by the PLA that all grassroots companies have been equipped with satellite televisions and availability of the internet in nearly 90 percent of the organic battalions and companies. The above being a latest manifestation of the PLA's battlefield support capability, promulgated earlier through a series of policies ever since China announced its 11th Five-Year Plan (2006-10). Given that field operations' living support enhances and improves combat effectiveness, it is crucial to note that the PLA has already implemented the "oxygen-inhaling project" in the PLA's plateau troop units.[14]

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Additionally, with adaptive training commencing in June 2011, 18 paratroopers of a troop unit under the Xinjiang MAC of the PLA, parachuted from a helicopter 500 metres high above the ground and landed successfully as part of a parachuting drill in the frigid plateau. The drill provided experience and data support for large-scale plateau parachuting of organic troop units of the PLA Special Forces. It needs to be noted that the thin air of the frigid plateau makes it difficult for the paratroopers to achieve a series of actions within a specified period of time. Given that the air density is lower in the plateau than in the midland, resultantly, the parachute drops faster, thus, making the ground impact greater.[15]

The far-western Xinjiang region, often dubbed as China's "bridgehead" to the West, shares a 5,743-km boundary with eight countries, including Russia, Kazakhstan, Kyrgyzstan, Tajikistan, Mongolia, Afghanistan, Pakistan and India. China has acknowledged that lack of land ports linking China to Afghanistan is hampering cross-border economic ties. This consequently makes a case for greater connectivity in terms of establishing direct trade links over land with Afghanistan, and avoids routing trade through third parties, namely, Pakistan. According to Vice-Chairman of the Xinjiang Uyghur Autonomous Region, Shi Dagang, "By having two-way trade through a third country, it is difficult for the development of two-way trade… With time, and in accordance with the need of construction and development of Afghanistan, I believe that border trade and small border trade between Xinjiang and Afghanistan will be promoted and developed."

This also brings into focus China's growing concern over security and cracking down on separatism and extremism in the Muslim-majority

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Xinjiang region, especially in the backdrop of the looming withdrawal of North Atlantic Treaty Organisation (NATO) troops from Afghanistan by 2014. Although Beijing seeks greater economic ties with Kabul, the former is circumspect as far as expanding engagement in the non-economic areas, including training of the Afghan security forces, is concerned. China's policy in Afghanistan could be described as one wherein it has sought to, and to a large extent, managed to, secure substantial gains primarily at the expense of the security cover provided by the International Security Assistance Force (ISAF)/NATO allies—a facet that could soon be a case of the past. The PLA's attempts at keeping a tight fist vis-à-vis security in restive Xinjiang could be a mirror of the coming security situation in the region and its surrounding territory.

Conclusion

The backdrop of strategic uncertainty in a rising Asia coupled with the posturing of China's PLA in the border regions raises the ante in so far as the security situation in the region is concerned. The inherent shift in strategy from continental to peripheral defence tends to underline China's military doctrinal intent of resolving to "fight and win local wars on its borders". Besides, it accentuates the enhanced ability of the PLA towards becoming a more mobile and better-equipped fighting force, which can be deployed faster and sustained over a longer period of time across the high altitudes of its western frontier and provide all-inclusive support for any potential offensive operation outside of its mainland.

Notes

1. China's National Defense in 2010, Information Office of the State Council, The People's Republic of China, Beijing, March 2011.
2. Ibid.
3. Monika Chansoria, "China Eyes High Altitude War," *The Sunday Guardian*, October 06, 2012.

4. Monika Chansoria, "Chinese PLA's Integrated Military Exercises in Tibet," *Scholar Warrior* Journal, Spring 2012, pp. 30-34.
5. Ibid.
6. China's National Defense in 2010, n. 1.
7. As cited in a *BBC News* report, "Tibet Train Carries China Troops," December 01, 2007.
8. "Rapid Deployment Key to PLA Modernisation," *Jane's Defense Weekly*, April 15, 1998, pp. 30-32.
9. Tai Ming Cheung, "Reforming the Dragon's Tail: Chinese Military Logistics in the Era of High-Technology Warfare and Market Economics," in James R Lilley and David Shambaugh (eds.), *China's Military Faces the Future*, (Washington D.C.: American Enterprise Institute for Public Policy Research, 1999), p. 236.
10. For more details on the subject, see Andrei Chang, "PLA's Rapid Reaction Capability in Tibet," *UPI Asia Online*, Hong Kong, June 27, 2008.
11. For more details, see Richard M Bennett, "Tibet: The Great Game," *Asia Times*, May 26, 2008.
12. Cited in http://www.upi.com
13. Monika Chansoria, "China Builds Fifth-Generation Barracks in Xinjiang Military Area Command," Article No: 2157, CLAWS Website, June 16, 2012.
14. Ibid.
15. Statement given by Commanding Officer of the Troop Unit, Wang Junxian, cited in "PLA Special Force Conducts 1st Plateau Parachuting Drill," Chinese Ministry of National Defence, Beijing, August 22, 2011.