ISAS Insights

No. 72 – Date: 18 June 2009

469A Bukit Timah Road
#07-01, Tower Block, Singapore 259770
Tel: 6516 6179 / 6516 4239
Fax: 6776 7505 / 6314 5447
Email: isassec@nus.edu.sg
Website: www.isas.nus.edu.sg

Tackling Battlefield Asymmetries: Changing Tactics in Emerging Insurgencies

Iftekhar Ahmed Chowdhury[1]

> War never leaves where it found a nation; it is never to be entered upon without mature deliberation.
>
> Edmund Burke

Introduction

Most current military conflicts are between apparent unequals. Yet, we see that the obvious and expected result, which is the victory of the superior power, is not so easily achieved. For instance, the North Atlantic Treaty Organization has not scored remarkable victories against the ragtag Taliban in Afghanistan; the well-armed and equipped Pakistani army has been unable to bring the unruly Frontiers under its control and; not so long ago, the Hizbullah was able to grind to a halt the advance of the powerful Israeli forces in Lebanon. In each case, the numerically smaller and poorly equipped adversary, all non-state actors, resorted to unconventional means to deter the more powerful. This is also why the defence establishment in Islamabad has been cautious about proclaiming the end to the conflict in Swat.

Lanchester's Laws

There was a time when two military opponents confronted each other in a conventional battlefield, one could predict the outcome based on certain straightforward equations. Usually, the higher numbers or greater firepower had better chances of winning. Indeed, during the First Great War, a mathematical model on these lines was developed by Frederick Lanchester. He held that, if two forces, occupying the same land area and using the same weapons, fired randomly into the same target area, they would both suffer the same rate of casualties and, consequently, the smaller force would be eliminated earlier. This is known as *Lanchester's Linear Law*.

However, if targets are aimed at and multiple targets receive fire from multiple directions, then the rate of attrition will depend on the number of weapons that carry out the firing. This is more likely to happen in modern combat. In such situations, Lanchester's view was that the power of such a force would be proportional not to its number of units, but to the square of

---

[1] Dr Iftekhar Ahmed Chowdhury is a Visiting Senior Research Fellow at the Institute of South Asian Studies, an autonomous research institute at the National University of Singapore. He was the Foreign Advisor (Foreign Minister) of Bangladesh from 2007 to 2009. He can be reached at isasiac@nus.edu.sg.

the number of units. This formula is known as *Lanchester's Square Law*. The two principal factors in this equation are, therefore, first, the size of the combating group and, second, the rate of damaging. It ignores all other circumstances.

The principle has too many limitations to be useful in contemporary conflict. It is only applicable if one unit, that is, one soldier, one tank, one ship or one aircraft can take out one equivalent adversary at one time. It would not, therefore, apply to rapid-firing machine guns, artillery barrages or nuclear ordnances, where a single unit could inflict multiple damages. Moreover, it would not apply to whole armies where the tactical deployment at any given time would not involve total numbers. Also, it would only apply to numerical force and not technological power. In other words, it would take an N-squared-fold increase in quality to make up for an N-fold increase in quantity.[2]

'Netwar' Techniques

In the mid-1970s a military analyst Andrew Mack had pointed to how a weaker side could profit from correct tactics employed in an 'asymmetric' match.[3] Nearly two decades later, in the mid-1990s, two RAND Corporation researchers, John Arquilla and David Ronfeldt, coined the term 'Netwar' to describe an emergent technique or form of conflict by which 'rogue' non-state actors may be able to organise themselves to counter more powerful adversaries. These groups would employ decentralised, flexible 'network' structures. According to the two researchers, three basic types of networks may be used by these non-state actors – first, chain network, where end-to-end exchanges must travel back and forth between intermediary nodes; second, the 'hub' or 'star' network where disparate actors are tied to a central, though not necessarily hierarchical node, through which all communications travel; and third, the 'all-channel' network, where every individual actor is able to communicate fully with all other nodes in the system.

Arquilla and Ronfeldt put their ideas into a 1996 document entitled 'The Advent Of Netwar'.[4] They point to the rising significance of the third 'all-channel' type that is acquiring significance. A principal element of this is the absence of a central command or key node whose elimination would entirely degrade its capability. The complete decentralisation allows for considerable local autonomy. This implies that, at times, the organisation in question appears to be 'acephalous' (headless) or, at other times, 'polycephalous' (hydra-headed). However, despite the autonomy, there needs to be a linkage between the nodes in terms of shared doctrines, beliefs, ideologies or interests. This common objective provides an "ideational, strategic and operational centrality that allows for tactical decentralisation".[5]

A more sophisticated version that only conventional and well-equipped armies are capable of conforming to is 'network-centric operations', a doctrine that the United States Department

---

2 See Lanchester, F. W., *Aircraft in Warfare*: *The Dawn of the Fourth Arm*, (London, Constable and Co Ltd, 1916). Also see Taylor, James G., *Lanchester Models of Warfare* (Arlington, A., Operations Research Society of America, Military Applications Section, 1983, 2 vols.). For a critique of these models and new alternative equations of his own, see Epstein, Joshua M., *The Calculus of Conventional War*: *Dynamic Analysis without Lanchester Theory*, (Washington, Brookings Institution, 1985).

3 Mack, Andrew J. R., "Why Big Nations Lose Small Wars", *World Politics*, Vol. 27, No. 2 (January 1975), pp. 175-200.

4 See Arquilla, J. and Ronfeldt, D., *The Advent of Netwar*, (RAND: Santa Monica, California, 1996). Also see *Networks and Netwars: The Future of Terror, Crimes and Militancy* by the same authors (RAND, Santa Monica, California, 2001).

5 http://www.rand.org/pubs/monograph_reports/MR789/index.html.

of Defense now pioneers.[6] It seeks to increase competitiveness in war-fighting capability through robustly linking up geographically dispersed forces via information technology. This would require the establishment of a 'Global Information Grid'. There are those who have cautioned against this, arguing that the enemy may hack the system by introducing false or incorrect information.[7]

There is considerable evolving literature on how and why the strong lose combats.[8] These point to the fact that material and numerical strength are no guarantees of success against deeply committed opponents with superior will and strategy. Powerful conventional militaries in the world today, of course, understand this (much of this analyses is directed towards building their awareness in this area) and wish to employ and marshal their technological advantages to further degrade the capabilities of the weaker foe.

The Hizbullah in Lebanon: A Case Study

However, there are alternatives in the same genre of warfare for weaker protagonists to follow. An example of how asymmetric imbalance was sought to be corrected by the apparently weaker party on the battlefield is perhaps the war between Israel and the Hizbullah in Lebanon in July 2006.[9] The strategy the Hizbullah employed was similar to the 'Netwar' model, by which they were able to halt the Israeli advance and also secure Israeli withdrawal from the village of Bint Jbail in southern Lebanon. It was, however, a far simpler version of the complex 'network-centric operations' doctrine discussed in the preceding paragraphs. When superior numbers, armour and firepower are successfully countered in a battle situation, it is natural that the attention of analysts would be focused on the methods employed by the obviously weaker adversary, as was the case in the Lebanese situation.

At this point, it may be worthwhile analysing Israel's strategic goals in that conflict. Its intelligence would have provided a list of Hizbullah targets. The initial battle plan most likely was to take them out with a series of airstrikes. In addition, there was to be a bombardment of cities, towns and villages with the purpose of destroying infrastructure the guerillas or Hizbullah might use for military purposes. Another reason for this could also have been to demoralise civilian population and turn them against the guerillas. The assessment was perhaps that a couple of weeks of such operations would achieve these objectives and then a ceasefire at the Lebanese request would be put in place – this would also involve disarming and politically eliminating the Hizbullah. There would, thus, be no need to expose the Israeli infantry to unnecessary hazards, as the risk-assessments were deemed high.

Alas for the Israelis, one conventional axiom of military wisdom came to surface very quickly in the day. It was that no plans survive the first contact with the enemy. The Hizbullah were better able to protect and conceal their caches of weaponry than thought possible or capable, while raining rocketry on northern Israel at a rate surpassing hundreds a day. Since airpower could not achieve the desired result, Israel was forced to move in ground

---

6 See Gartska, David, Alberts, S. and Stein, Fred, *Network Centric Warfare: Developing and Leveraging Information Superiority (http://www.dodccrp.org?files/Alberts NCW.pdf* (Washington, 2000).

7 For a serious critique of the doctrine, see Perrow, Charles, *Information Assurance,* (National Defense University, May 2003).

8 For instance, Record, Jeffrey, *Beating Goliath: Why Insurgencies Win*, (Washington D. C., Potamac Books, 2007), and Arreguin-Toft, Ivan, "How the Weak Win Wars: A Theory of Asymmetric Conflict", *International Security,* Vol. 26, No. 1 (Summer 20010), pp. 93-128.

9 The author at that time was Bangladesh's Ambassador to the United Nations in New York and followed the conflict closely.

troops to deny the Hizbullah territory between the northern border and the Litany River, approximately 20 kilometres away. It is here that they came across fierce resistance and sustained heavy casualties, ultimately forcing their withdrawal from Bint Jbail.[10]

What are, thus, some of the tactics on the ground that the Hizbullah used for their successes? It was not unlike some of the elements discussed earlier as the 'netwar' strategy. It was apparent that the Hizbullah was using their capability to establish inter-unit connectivity through high-technology, or even low-technology means, with such better communications enhancing the overall action capacity. Unlike a traditional army, the Hizbullah did not appear to be organised with a strict hierarchy in a pecking order from generals through officers to soldiers, and from divisions through battalions, and companies to platoons. Instead, they appeared to have a flattened command structure, with perhaps a single commander heading a small fighting unit. Thus, they were easily dispersable, mobile, agile and better able to improvise.

Also, since the time of the Roman cohorts, conventional warfare has depended largely on ignorant masses of soldiers motivated into action through the inculcation of 'do or die' values, often through 'pep-talks' by generals before the commencement of hostilities. The charge of the light brigade during the Crimean War is a good example of an army being wiped out through an irrational frontal attack. Nor are strategists today apt to look kindly upon the devastating attrition of the 'trench war' in France between the allies and the Germans that led to horrific casualties or upon the much celebrated landing in Normandy on 6 June 1944, immediately following which hundreds and thousands were slaughtered.

In Lebanon, as we see, completely different tactics were followed by the Hizbullah. Their weapons were stored in caches and not distributed until just prior to the time of operations. Since the troops were unmarked and did not carry arms at normal times, it became difficult to identify them or distinguish them from the civilian population. At the conclusion of each operation, they could return quickly to normal lifestyle. In contrast, the armies and the uniformed soldiers in conventional formations are normally far more targetable. Also, in Lebanon, when the Israelis moved in armour as they did in their heavy, high-technology and modern Merkava tanks, which left large location-signatures, they could easily be acquired as targets and destroyed by the quick footed adversary.[11]

The ordnances that the Hizbullah used were also far less complex and easily modifiable to respond to situational needs. An example is the Khaybar-I rockets capable of packing in almost 200 kilogrammes of bomb materials or explosives. The Hizbullah, it is said, could enhance their range by simply elongating their shape and adding propeller power. Thus, they were able to bring more distant Israeli towns within their range. The rockets did not do too much damage or cause casualties but managed to create panic among the Israeli population, which might have been the purpose in the first place.

The Battles in Swat and the Tribal Areas

At the time of writing, there is a furious battle being fought for the control of the Swat valley between the Pakistan army and the insurgents, mainly, though not necessarily restricted to the

[10] According to information released by the Israeli Foreign Ministry, the Israeli Defence Forces reported a casualty rate of 121 dead and 628 injured.

[11] Merkava IV is the main battle tank of the Israeli forces. Merkava means 'Chariot' in Hebrew. It is extremely sophisticated and four main versions of it have been deployed.

Taliban. The army is already said to control the main towns of Saidu Sharif and Mingora, though swathes of terroritory are still possibly under insurgent control. In fact, some recent gains of the Taliban come on the heels of the United States intensification of remotely piloted air strikes, 16 in the first four months of 2009 compared to 36 in all of 2008.[12] The tribal areas of Federally Administered Tribal Areas largely continue to remain outside the pale of the influence of Pakistani law-enforcing agencies. There is also sporadic resistance in those territories, complemented by attacks on Pakistani cities such as Lahore, Charsada and Peshawar. This is a part of the Taliban tactics of "taking the war to the cities" where a series of bomb blasts have killed nearly 170 people since the army launched their anti-Taliban offensives in April 2009.

In retaliation now, the army has taken the battle beyond the immediate region of Swat to the tribal areas of North and South Waziristan, opening up a second front. The fighting has, therefore, expanded. As in Swat, earlier air strikes and shelling by gunships appear to be the preferred mode of Pakistani attack.[13] This will mean some heavy destruction. More 'collateral damage', including civilian casualties, will mean greater and more strenghthened opposition from the tribals, in a dangerous mix of religiosity and Pushtun nationalism. Some analysts have contended that the Pakistani army is not trained to fight insurgencies of this type. Is this why its efforts do not appear to achieve instantaneous success, or is it also that the insurgents are adopting innovative tactics, albeit even a simpler version, than adopted by the Hizbullah?

There is perhaps a modicum of truth in both. However, it is also a fact that in order to better wage the counterwar, there must be an understanding of the evolving strategy of the insurgency. In some ways, the 'resistance' does appear to copy 'netwar' methods, even if unbeknowingly. One element is the absence of a single military commander. The other is a flattened command formation without a clearly defined hierarchical command and control structure. A third is the use, as is obvious from the many photographs, of hand carried communications equiptment which complements the Kalashnikov rifle (or, as is now quite often the case, a superior weapon). Finally, there is the loose ideology, the common objective of a '*nizam-e-adl*' or the rule of Shari'a that joins the units or nodes of insurgency. Over time, the skills of the resistance in all areas are also being sharpened and honed. This will be even more so if the fighting is prolonged.

Conclusion

If there is to be a military solution to the problem, the Pakistani army would need to rethink its strategy and doctrine, and adopt methodologies required for counternet war, including, indeed mainly, the simplest versions of it. The problem is there are not any that guarantees success, at least purely militarily. At the moment, the situation is not, in the words of a military analyst, David Kilcullen, 'hopeless but extremely serious'.[14] The Pakistan army is indeed caught between the rock and a hard place in a very difficult and hostile terrain. Heavy

---

[12] Satia, Priya, "The Shadow of History Passes Over Pakistan", *Financial Times*, 20 May 2009.

[13] *The Straits Times*, Singapore, 16 June 2009, p. A10.

[14] Kilcullen, David, 'Crunch Time in Afghanistan-Pakistan', *Small Wars Journal (*Blog posted in February 2009), p. 5. David Kilcullen, who was an Advisor to the United States General David Petraeus, has argued that, about 90 to 95 percent of the insurgents that the United States are fighting have become 'accidental' enemies due to wrongly pursued heavy-handed methods. See his *The Accidental Guerilla; Fighting Small Wars in the Midst of a Big One*, (Washington, Oxford University Press, 2009). The same would presumably also apply in the Pakistani tribal regions.

handed military action might increase collateral damage, consequently stiffening the resolve and spread of resistance. There may, therefore, be no military solution or certainly none that can be easily achievable.

In the final analysis, there is no substitute to taking the fruits of good governance to the doorsteps of the people in Swat. The dividents of peace must be made obvious to the people. The elements of education, employment and empowerment must be ensured. Without these, there will be no long-term peace in the valley till the cows come home.

oooOOOooo