TEN AIR POWER POINTERS FROM IRAQ 2003

In the aftermath of a campaign, attempts to analyse its events can be useless unless the correct pointers are drawn from it for use in future operations. Iraq 2003 is no different, but the urgency to learn from the conflict is reinforced by the rapid technological changes that are in turn altering the concepts of operations themselves. In addition, the context of employing air power in an ambiguous battlespace makes the understanding of its complexities much more important for future applications.

Iraq is perhaps the precursor of a new and emerging battlespace where the entire spectrum of conflict, from high intensity warfare to peacekeeping operations, will be carried out in close proximity to each other, both geographically and in terms of timeframe. The entire campaign will be one of dynamic changes in intensity, location and complications. Historically, air power has responded to such challenges by rapidly adapting to the evolving situation, more often than not by leveraging emerging technologies.

Even in this changing scenario, a few air power pointers can be clearly discerned.

**Pointer 1.** In the past five decades Western forces have usually operated with almost complete control of the air. The fact that such control was very easily obtained in all cases has injected a notion into the thinking process of a number of planners that one does not have to fight to obtain and maintain control of the air. Developments in surface-to-air missile technology that permit the targeting of airborne platforms at ranges in excess of 350 km will change the equation drastically. The challenge will be to ensure control of the air under these circumstances.

**Pointer 2.** Air power has normally been employed in the ‘centralised command and decentralised execution’ concept. The advantages of network centric forces cannot be fully exploited if this command and control structure becomes too rigid. A basic minimum fluidity in centralised control will have to be built-in to optimise the effectiveness of air power assets. Complex rules of engagement and the increasing need to prosecute time-sensitive targets further emphasise the need for flexible command and control functions.

**Pointer 3.** The indelible, but invisible link between command and control and tempo of operations was underlined in Iraq 2003. The impact of air power in clearly moving away from traditional attrition to a more effects-based approach, even while applying lethal force, now becomes fundamental to future operations. The effectiveness of such an approach will determine the tempo of operations and depends directly on air power’s capabilities to neutralise identified critical vulnerabilities of the enemy. This in turn is a function of an assertive yet flexible command and control structure.

**Pointer 4.** The ability to generate and then sustain the required tempo of operations is also facilitated by air power assets. Higher tempo of operations normally involve higher risks, but air power can mitigate much of the risk involved in generating high tempos of operation that spike at irregular intervals. The ability of air power to regulate the tempo with minimal risk was demonstrated in the campaign.

**Pointer 5.** The battlespace in Iraq was and continues to be without clearly demarcated front lines, enemy areas and comparatively safe rear areas. This necessitates the development of accurate, adequate and timely intelligence as well as the capability to disseminate it. Training of the personnel involved in these activities, even though they are not at the ‘sharp end of the spear’ assumes great importance, more so in situations wherein the information is collected, collated and analysed in a short time-span. Realistic and collective training of the
entire team, especially in the employment of air power for efficiency, when operating in complex battlespaces and to avoid the pitfalls of fratricide, was prominently demonstrated.

**Pointer 6.** Air power assets will have to be truly multi-role capable, with the ability to data link between assets and employ precision firepower capabilities. Technology of tomorrow will have to be harnessed today to ensure the effectiveness of weapon systems in an on-going manner and to avoid short-term redundancy. Capability acquisition of the future will need to take these factors into account to avoid having to go into battle with already outdated technology.

**Pointer 7.** The nature of war is changing, making it very difficult for planners to forecast weapon capability and quantity requirements. This situation is further complicated in the case of air power because the precision weaponry is very expensive because of its extreme complexity in design and manufacture. Realistic usage rates of these in different types of operations will be difficult to ascertain and may become a limiting factor.

**Pointer 8.** Sustainability of air operations in far-flung theatres will become more difficult in terms of positioning the support infrastructure like fuel, ammunition, spares etc. Fuel particularly will become a constraining element. Prince Sultan Air Base in Saudi Arabia was using 4.5 million gallons of aviation fuel per day and there was no fuel available for even one more aircraft. The impact, in operational terms, if further effort is required is self-explanatory.

**Pointer 9.** Contrary to some of the ideas being floated about regarding the efficacy of ‘unmanned robotic air warfare’, it is certain that moral compulsions and legal considerations within the international community will restrict their usage even if technology does not. The need will still be for a ‘person’ in the loop, for fool-proof identification of each target and for the ability to abort a mission at the last possible minute. Robotic warfare is still not a reality.

**Pointer 10.** Close Air Support in urban areas will become even more complicated as requirements for assessing the legality of targets, and limiting the ensuing collateral damage increase. Iraq 2003 illustrated the need for urban CAS, but it equally demonstrated the need for integrating this firepower with other elements of the combat force.

![Coalition air bombardment of Baghdad](image)

At the strategic level, Iraq once again demonstrated that Effects-Based Approach to a conflict is still an evolving science. The identification of the centres of gravity will continue to be the weak-link in an otherwise admirable concept that utilises the unique characteristics of air power to achieve laid down objectives.

*The history of air strategy is a history of targeting—trying to discover which COG [centre of gravity] is the most important in a given place, time and situation.*

Phillip S. Meilinger
*Air War – Theory and Practice, 2003*

‘Pathfinder’ is a fortnightly bulletin from the Air Power Development Centre. Its title is a tribute to the Pathfinder Force which operated within RAF Bomber Command from August 1942. The original Pathfinders were an elite navigational group with the role of preceding each raid and accurately lighting up the target area with incendiary fires to permit visual bombing by the main force. The first commander was Group Captain (later Air Vice-Marshal) D.C.T. Bennett, a Queenslander who trained with the RAAF in 1930-31 before transferring to the RAF, and many other Australians also flew with the force.

The emblem we have adopted is ‘Fiery Mo’, the unofficial insignia carried on No. 6 Squadron’s Hudson aircraft in New Guinea during 1943.