



Air Power in the Protection of Territorial Areas

by Sanu Kainikara

FOREWORD

Territorial integrity of the nation is one of the primary concerns of all governments. This is more so in nation-states that are beset with economic constraints and internal strife generated by factors that may or may not be interrelated. The changing global security scenario has only further increased the problems faced by the armed forces and security apparatus of the nations affected. While a number of developed nations have started to view security issues in a larger international manner, the assistance proffered by these nations may not be very acceptable to the troubled states for a number of reasons, mostly related to internal politics. Under these conditions it becomes imperative for smaller nations to harness all possible methods and sources to secure their integrity.

This paper examines the changes that are taking place in the conduct of war in relation to internal conflicts that are subversive in nature and then looks at the role and significance of air power in protecting the integrity of territorial areas. It looks at the steps to be taken to contain subversive insurgency in a theoretical manner and then goes on to suggest possible strategies for the utilisation of air power in particular and military forces in general to ensure national integrity. The paper is a fresh look at the ongoing changes in the application of force to further national security.

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AUTHOR'S FOREWORD

Conventional state-on-state warfare conducted, and in most cases also concluded, in the traditional manner has almost become a historic perception. The current trend in armed conflict is normally seen to have groups of ill-defined character and great complexity in their overall make-up ranged against the more regular and 'legal' forces of a nation. In most cases these groups are characterised by their vague and opaque aims, making it difficult to find diplomatic and non-combat solutions to their perceived problems. In addition, the operational tactics employed by these groups are extremely unconventional in nature, making it more difficult for conventional forces to effectively contain them. The outcome of these developments has been a clear change in the contemporary nature and conduct of war.

Further, it is seen that threats to national integrity, especially in the smaller nations of the developing world, more often than not emanate from within the nation itself—for a number of reasons that are mainly underpinned by socio-economic factors. The reluctance or the inability of the government to act decisively when such threats become apparent allows the instability to gain ground, to an extent that it becomes difficult to contain at a later stage when the government actually wants to take action. In the past decade there has also been a global movement that tends to target less stable nations with a multi-ethnic and -religious population mix in an effort to destabilise the nation further so that they could then become the safe havens for the groups that propagate fundamentalist ideology and religious beliefs across borders. These non-state actors have become centre-stage players in almost all the myriad of conflicts across the world.

Territorial integrity under these conditions becomes a very difficult state to achieve. This is even more so in nations where the borders are porous and the resources to patrol remote areas are almost non-existent. There is also the growing tendency in the developing world to use the military forces to counter such threats and for border protection that in itself has inherent pitfalls vis-à-vis the politicisation of the force. The use of military forces to contain internal security issues is the beginning of a vicious, downward spiralling cycle that will sap the military of its effectiveness if it is not properly controlled. This is not to suggest that the military forces should only be employed in the case of an external aggression, but to suggest that the commitment of the military in internal security issues must be very carefully planned with a clearly defined end-state and a cohesive withdrawal plan in place. In fact, the smaller nations may not have the luxury of having separate forces of competence sufficient to counter such threats and therefore would be constrained to use the military forces for all such contingencies.

The world is in transition and no area is more affected than national security. The concept of national security, which was purely one of securing one's borders, prevalent as late as the mid-1950s, has taken on a meaning that could not have been envisaged even 50 years back. Today borders do not mean anything in the larger picture of national security interests, and nations are becoming more attuned to the use of the entire power resident within a government to achieve their security objectives. Under these conditions, the destabilising influences of the groups that do not adhere to borders and operate only under conditions that assure their effectiveness becomes even more difficult to counter. Smaller, economically strained and resource constrained nation states that are struggling to come to terms with socio-politico-economic issues of very high magnitude that threaten the very existence of the state as an entity become very attractive areas for these groups. The threat to territorial integrity of these nations is almost completely internally generated even though they may have both covert and overt support from outside agencies.

"The term 'nation' does not necessarily equate with that of 'state' and vice versa. A nation (essentially an ethnic concept) may populate a number of states (a political concept); equally a state may contain several nations. In such circumstances, ethnicity/nationhood may be used by some states as a pretext for absorbing a neighbour, or for a part of a state to break away and join another or form a separate nation."

Air Commodore Andrew G B Valance, OBE, (RAF)

This paper takes a brief look at the strategic effects that could be achieved by the use of military forces against such internal threats, with special reference to the effectiveness of air power under these conditions.

This paper is an edited version of a presentation given at the Philippine Air Force Air Power Symposium, held on 6 July 2004 in Quezon City, Manila.

INTRODUCTION

The current trend in developing strategies to cope with emerging threats, especially in nations that have extended but non-contiguous borders to protect, is to review extant military capabilities and to speculate on how they can be improved or adapted. Border protection is a primary focus of all nation states who wish to safeguard their sovereignty effectively. In the case of archipelagic nations like the Philippines, the problem of border protection assumes greater complexity because of two major factors. Firstly, the large number of islands that the nation encompasses makes it almost impossible to patrol them effectively. Secondly, resource constraints under which the security forces are forced to operate, like in almost all nations of the world, make the enforcement of law and order in remote areas extremely difficult.

It is in this context that air power has to be considered as an efficient and cost effective way of enhancing security by improved protection of territorial areas. This paper considers the changing perceptions regarding the conduct of war, looks briefly at air power today, and enumerates territorial area threats in a broad manner. It then considers the role of air power in Territorial Area Security Missions (TASM) and analyses their contribution, factors affecting air power effectiveness, and defines achievable strategic effects before suggesting an optimum response.

CHANGES IN THE CONDUCT OF WAR

The overall conduct of war has always been affected by a number of factors. The context within which a war is fought, the comparative strengths and weaknesses of the adversaries, the environment, available technology and the economies of the nations involved have all influenced and changed the conduct of war over the years. Barring a few highly innovative ideas that brought in quantum changes, historically the changes to warfighting have by and large been evolutionary in nature. However, in the past decade while the rate of change in the conduct of war—or armed conflict as it is often referred to now—has not increased a great deal, the nature of conflict has changed considerably. So it is pertinent to analyse the major contributory factors that influence and bring about the changes. It must also be noted that these changes are ongoing and therefore the conduct of war will remain dynamic.

Five factors can be identified as critical contributors to the primary changes that are taking place regarding the security of many states. They are threat perceptions, nature of threats, the concept of collateral damage, casualty-aversion and the perceived drawbacks in the Law of Armed Conflict (LOAC).

Threat Perceptions

Threat perceptions are moulded by a number of factors that in themselves are prone to changes dependent on context and strategic environment. There are three major factors that would always have an influence in shaping threat perceptions to a lesser or greater degree and are likely to continue to be major influences into the foreseeable future.

Globalisation, in all its incarnations, has affected the socio-politicoeconomic conditions of nations around the world. In the case of some developing nations, the impact of globalisation has been of sufficient magnitude to have shaken the very foundations of the basic society. Indirectly, national security perceptions itself are being altered and adapted to cater for the unstoppable onslaught of this phenomenon. In the case of the developed world, national security imperatives are now being viewed in a larger global context than was the case even a decade ago.

The world is seeing the emergence and an ever-increasing presence of non-state actors in the global economy, and even more so in criminal activities. Borderless crime like drug trafficking, illegal immigration and ideological

terrorism have assumed global proportions affecting all sovereign nations alike and have a disproportionate influence on threat perceptions. The difference between stronger states and smaller less capable ones is only the level and effectiveness of their response to these threats.

Internal instability is the third factor that affects threat perceptions, perhaps more applicable to developing nations than to well established, robust and vibrant democracies. Internal instability, if allowed to flourish uncontrolled, can encompass the entire nation faster than any other eventualities that threaten it, including external aggression. Such instability can be the outcome of a number of complimentary factors. Plural ethnicity within the state, which is common in the ex-colonial nations of Africa and Asia, is one of the major reasons for internal instability to flourish. If this situation is combined with a multi-religious population, the stage is set for violent upheavals. Poverty accounts for the spread of global crime into these same areas, further increasing the volatility of the situation. Needless to say, internal instability in one nation will have an almost immediate impact on neighbouring states.

Nature of Threats

The nature of threat itself is undergoing a transformation. Internationally there have emerged a number of diverse players that affect the nature of perceived threat. These players range from isolated groups acting on their own to state-sponsored terrorism and organisations that perpetuate violence based on ideological or religious fundamentalism. From a nation's perspective these players have either unclear interests and aims or demands and objectives that are unacceptable and contrary to the well-being of the larger nation-state as judged from the Government's perspective. A fundamental problem is that most of these groups adhere to almost no rules of engagement. This point is of great importance since the response to such threats from a state will normally be constrained within the boundaries of laid down norms of the international society.

This provides the adversaries with a clear and at times simple way to create asymmetry against even a big power nation to leverage their own advantage. Asymmetry is essentially about ways, means and ends that do not match that of the opponent and can be used effectively to achieve one's own aim. Asymmetry has strategic and tactical dimensions. In both dimensions, asymmetry also has an inherent element of surprise; strategically, at least the first time one is exercised, and tactically dependent on the protagonist's imagination. Surprise further enhances an asymmetric attack's effectiveness. There is also a noticeable trend for the intensity of threats to vary from continuous low intensity to unexpected spikes of extreme high intensity. A combination of asymmetry, unpredictable variations in the intensity of conflict and the unclear and obtuse intentions of the primary players make the nature of threats extremely difficult to predict with any assurance of accuracy.

Collateral Damage

It is more than likely that the concept of collateral damage being unacceptable itself is a product of the improved strike capabilities of air power. In the recent past humanitarian agencies, by their strident opposition to any kind of collateral damage, have raised the acceptable level of accuracy in any air strike almost beyond reasonable capabilities. The outcry against any and all collateral damage is disproportionate to the damage caused, and the situation is further exacerbated by an unsympathetic media. Graphic media reports of non-combatant casualties have grave political repercussions and serve to restrain the use of even legitimate force. As an aside it is surprising that the same amount of attention is not paid nor greater restraint propagated when the damage is caused by artillery or ship bombardment.

The changing perceptions regarding the acceptability and extend of collateral damage, especially in the Western world and in conflicts where Western forces are involved is a comparatively new phenomenon. The concept of unacceptability of collateral damage in itself is lopsided in the current context wherein the blatant killing of innocent non-combatants by the use of asymmetric methods like suicide bombings, which in itself needs to be questioned on moral and ethical grounds, is in a manner accepted as 'part-of-the-game', while the legal forces of a nation is held to account for genuine errors in targeting and execution of strikes. This is an unexplained mindset that seems to affect the collective conscience of the international community. In any case, collateral damage does bring a certain amount of disrepute to the effectiveness of air power, thereby constraining its opportunistic and time-sensitive employment.

Casualty Aversion

The imbalance of power projection capabilities between the technologically superior forces of the developed world and those of emerging forces are such that the Western forces have been able to fight and win battles and wars in recent times with minimal casualties. This has led to an expectation of minimal or even no casualties within the general public, essentially in the developed world, even when difficult and complex conflicts are unfolding. This expectation has been reinforced by the campaigns in Bosnia, Kosovo and Afghanistan where the allied forces did not or have not so far suffered significant casualties.

A lot has been written and discussed, in different forums and contexts, regarding the aversion in Western democracies to own casualties, especially regarding the public perception in the United States regarding their own war casualties. While this may be true to a certain extent, the recent and ongoing conflict in Iraq has more than demonstrated the American public's resilience in the acceptance of a reasonable number of casualties. It is also pertinent to note here that all war plans, in every nation, while accepting the inevitability of casualties in war takes all precautions to minimise and if possible completely eliminate the possibility of own casualties. It is felt that casualty aversion is more a political stance than currently understood. Of course the political implications and the degree of public acceptance of large-scale casualties to any nation in today's context would be great and may even become unsustainable.

Another facet of the discussion on casualty aversion is that there is a growing perception in the developing world that Western forces accept collateral damage while they are themselves averse to own casualties. This has long-term implications on the way local population in the developing world will accept the presence of forces from the developed world, whatever be their mission. More than domestic casualty aversion that might lead to diminishing support for the conflict, this factor requires more serious consideration and is something that Western forces would have to deal with if they are to be successful in achieving the predicated end-state whenever deployed in the developing world.

Law of Armed Conflict

There is general belief that the existing Law of Armed Conflict (LOAC) is redundant and does not cater to the currently prevailing conditions of conflict in the world. The slow decline in the adherence to LOAC, even by its signatories, may have been prompted by the entry of non-state entities into the realm of armed conflict. As pointed out earlier, the non-state actors who are not signatories to any laid-down international norm do not adhere to the moral and humane customs of traditional warfare, thereby increasing their asymmetric advantage. This may also have contributed to the sovereign states becoming less vigilant in the enforcement of LOAC within their own forces, with grave consequences in the long term. Unclear allegiances and acceptance of nations with a less than clean record of adherence to LOAC or to human rights standards as allies and partners have become common place in the past decade. This has led to a slow but palpable decline in the moral authority and superiority of legal forces engaged in warfare.

Why this Change?

While the five factors mentioned above have unequivocally affected and altered the conduct of war, the reasons for the changes being accepted could be attributed to three primary factors. First is the visible success of asymmetric attacks against the acclaimed mass and firepower of conventional forces. It is now possible to completely neutralise the effectiveness of large forces with intelligent use of asymmetry. Further the effort involved in such an endeavour is only a fraction of what would otherwise be necessary to overcome force with force. Therefore, asymmetric warfare has great attraction to obscure and peripheral forces with limited resources trying to perpetuate fanatical and fundamentalist ideology.

Second, open availability of sophisticated technology has increased the capabilities of military forces around the world manifold. Increased economic strength that is now resident in a number of developing nations enable them to procure military capabilities that may have been unattainable even a few decades ago. In a gradual manner it has come to pass that military force projection capabilities are no more the sole preserve of industrialised nations. The corollary to this situation is the rising cost of equipping and maintaining proficient

conventional forces, which makes the capability disparity between the established military forces of the richer nations, emerging powers and the poorer states within the developing world all the more evident.

Third, the perception of victory itself has undergone a radical change. Even as late as the end of World War II, unconditional surrender of the enemy was the end-state that was required to achieve victory. The whole notion has now changed to an extent wherein the desirable end-state is at times not well defined or articulated before the commencement of the conflict. It is now felt throughout the command spectrum that the overriding requirement is to create an effect on the enemy while not violating any of one's own understanding and belief regarding the norms of society. While this perception is to be lauded as extremely humane, more often than not it will not meet the end-state in a long-term perspective when faced with the emerging threat scenario. However, under these conditions, one is also constrained to ask a rhetorical question whether or not any war so far in history has been able to achieve a long-term solution.

It also begs another, more prosaic question: Does this change in the way war and conflict are conducted mean the demise of conventional warfare?

AIR POWER TODAY

A nation's air power capability can be very broadly defined as the totality of military and commercial assets, aviation industry, infrastructure and codified doctrine employed in an optimum manner in the pursuit of national security goals. This whole-of-nation approach to air power is comparatively new and must be analysed a bit more closely. Aviation, and by implication air power, is heavily dependent on technology. It is almost completely technology driven and therefore can only be sustained with an adequate and appropriate technology base. Air power can only be nurtured by ensuring the development of two disparate yet complimentary areas—indigenous aviation industry and a concise doctrine at the highest level. No nation can aspire to possess a viable and potent air power capability unless it has the minimum vestiges of an aviation industry that will at least support bare essential requirements. A broad technological educational process within the nation is a requirement to achieve this along with a national will and allocation of adequate resources to establish aerospace industrial networks. The second requirement is to have a clear doctrine that is articulated and constantly updated in keeping with the basic tenets of air power. A well conceived doctrine will be able to accept emerging inputs and adapt dynamically in a contextual manner.

The essential competencies for a balanced air force can be listed as:¹

- Air and space control,
- Precision strike,
- Information and knowledge exploitation,
- Rapid mobility, and
- Flexible combat support.

The employment of the above competencies to achieve the desired effect has to be carefully orchestrated taking into account four other factors.

First, a well thought-out targeting process. While it is incontestable that air power has the capability to engage the centres of gravity of the adversary, in order to optimise its employment, an effects-based targeting plan would have to be crafted before the commencement of any operations. Targeting therefore assumes critical importance in the larger planning effort.

Second, exploitation of the electro-magnetic spectrum. Air power is ideally suited to exploit high-end technologies and to bring force to bear with great effect while doing so. The utilisation of the electro-magnetic spectrum to enhance warfighting capabilities as well as to protect one's own assets is a clear example of this. High-end capabilities should be inherently resident within a balanced force and used when necessary.

Third, employment of uninhabited aerial vehicles (UAV). The increasing utilisation and availability of UAVs and their gradual but certain evolution into combat air vehicles have to be taken cognisance of in understanding

the progress and changes that are taking place in the application of air power. A number of issues—doctrinal, operational, philosophical and mora—will have to be addressed before uninhabited vehicles can be completely incorporated into the larger spectrum of air power capabilities, especially in the lethal application of force. The incorporation of artificial intelligence into the decision-making cycle of the uninhabited combat aerial vehicles (UCAV) will continue to draw questions of morality and the debate is unlikely to find an acceptable solution. In this context it is to be noted that the debate and discussion on the use of UCAVs and artificial intelligence is still contained within the arena of academia and has not yet seriously been addressed by lawmakers across the globe. However, it seems a clear possibility that these vehicles will be the weapons system of the future.

Fourth, is the importance of speed—in decision-making, responding and countering enemy action—that is being constantly reinforced in the conduct of war. Speed is the engine that drives warfare and swiftness of response has been synonymous with aircraft since World War II. Today air power has the capability to increase the speed of response to any emerging threat, within a relatively short timeframe to such an extent that it has the capability to control the tempo of operations in a much wider context than in the purely tactical sense.

The combination of the listed competencies and the four factors mentioned above has thrust air power into the vanguard of military power projection capabilities. In effect it has become the weapon of first choice in any operation, almost by default. While this rise to primacy is satisfying to students and enthusiasts of air power, it also brings with it certain doubts regarding the viability of the status being bestowed on air power. These hinge on two interrelated points that have the potential to constrain its effectiveness, which have to be considered. The first is that understanding the intricacies and optimum methods of employment of air power is a specialised area of expertise. When political leaders tend to control its utilisation there is a more than even chance that its capabilities would not be fully understood. Therefore, it is very likely that air power would get employed as a weapon of choice in conditions that would be nowhere near ideal. In all likelihood this situation would lead to air power being unable to achieve the desired end-state within the planned limitations of time, effect and space. This situation has the inherent risk of relegating air power to secondary status as has happened in the past.

The second point is similar but relates to the military commanders themselves. Historical analysis indicates that the amount of air power that is required to achieve a desired end-state has always been underestimated. Further, air power application itself tends to be flawed because of both extraneous reasons as well as a lack of clear understanding of basic underpinning tenets. A combination of these two continuing trends leads to an untenable position. These two points, if not addressed and carefully mitigated at the beginning of the planning phase of a conflict itself, will lead to air power being misemployed with disastrous consequences for the campaign and for the status of the wider air power capability.

AIR POWER IN TERRITORIAL AREA SECURITY MISSIONS

The concept of territorial areas is particularly relevant to archipelagic nations and ensuring the security of extended stretches of small islands and territorial waters can become a strenuous process. The resource requirements to ensure adequacy of security in this case is far in excess of what would be required to secure a similar area of land mass alone. The complexity and peculiarities of carrying out security missions in archipelagic terrain need to be borne in mind at all times when planning and executing them. There is also a need to study the broad range of possible threats to territorial areas that could emanate in some detail so that an overall strategy to counter them could be formulated. From this overarching strategy, the capabilities and effects that air power could contribute to the larger security of territorial areas could then be deduced.

Territorial Area Threats

Threats to the integrity of territorial areas can become evident as a result of the occurrence of a number of events, which may vary in intensity and effect and cover a large spectrum of effects. Within the spectrum, an independent event by itself would have its own variations in terms of the larger effect that it has on national integrity. The basic spectrum could be said to have a spread from civil war on the one end and minor terrorist activities on the other.²

Civil war is the biggest threat to the integrity of territorial areas of a sovereign nation. The reasons for the commencement of the war or the external influences and interferences that either initiated or prolongs the conflict is beyond the scope of discussion of this paper. An added dimension to civil war is that even at the end of it when one faction has managed to subdue the other, there would be residual discontent within the state. This simmering discontent is likely to continue for a period of time, dependent on the character of the civil war itself, and could continue to pose a threat to territorial integrity at a lower intensity.

Insurgency activities by small groups, who clamour for cessation from the larger state for either one or a combination of ethnic, religious and economic reasons, also threaten the well being of a nation state. This strife is more prevalent in nation states that encompass multi-ethnic, -cultural and -religious populations. Insurgent activities can be easily contained at the basic level, if dealt with appropriately at both the political and military levels simultaneously. However, even a very low intensity insurgency would become a cause for concern if not contained at the earliest timeframe and is allowed to continue for any length of time. Insurgency that is assisted by external elements—materially, morally or by actual incursions within the borders of the state—will be more difficult to control than a purely internal struggle. Normally it is seen that insurgencies almost always have external support of some kind. Whatever be the state's response to insurgency, military planners will have to be cognisant of the fact that containment of even minor insurgency activities will entail the utilisation of a disproportionately high quantity of resources from conventional forces.

Threats to territorial integrity of a lesser magnitude can also take place when there are spontaneous outbursts of violence triggered by economic instability or motivated by socio-political factors. Even though these may have popular support, they are by far the easiest to contain in terms of security issues and should not overly extend a stable security infrastructure. The volatility associated with such activities in most cases would also be short-term.

Acts of terrorism, in its broader definition, could be associated with either insurgency or considered to be a stand-alone threat. In either case acts of terrorism are difficult to contain and require a large organisational structure to respond effectively. Like insurgency, terrorism is also a growing and at times completely unmanageable threat. Even if inadequate, the response needs to be swift and decisive. The optimum way to address these threats is to formulate a response that would leverage the strengths of the state in a focused 'whole-of-government' approach.

Overall Strategy

Strategy – is determined in advance by specialists such as electronic experts, engineers, economists, even sociologists and political scientists.

Hugh Smith³

To contain internal threats to national integrity an overall strategy would have to be planned. The strategy implementation would have to be undertaken in five logical steps. The first is to study the enemy in a holistic manner that covers factors such as the basic reason for the enemy's existence, the resource base for their activities, the amount of popular support for their cause, consequences and repercussions of forceful action, etc. This would need sufficiently accurate intelligence information to be available that is only possible with networks built up over time. The fact that an internal threat emerges might in itself be an indication of at least partial failure of the intelligence set up. This failure would obviously have to be addressed and also factored into the evaluation of enemy capabilities. The inability of most states to contain territorial area threats can be traced back in almost all cases to intelligence failures exacerbated by the reluctance on the part of the government to take decisive action at the infancy of the development of the threat for a variety of reasons. The main thrust of the study should be to identify the root cause for the existence of the threat in tangible form, both in terms of political process as well as military capabilities.

After having determined the cause, nature and capabilities of the enemy, the next step is to establish a response team with the overall authority to deal with the threat appropriately. The response team will coordinate inter-agency interactions, allocation of resources and personnel, and conduct the higher level direction of all responses. It will also be responsible for the implementation of operational strategy that will be formulated as the next step. This team will identify the appropriate sections within the government that would contribute to the overall action being initiated.

The third step is to formulate the operational strategy that must clearly aim to achieve the desired end-state. The operational plan should start with containment strategies and then enumerate the processes and means by which the adversary could be tactically worn down. The operational strategy should encompass all the relevant agencies and their actions, ranging from diplomatic initiatives, economic sanctions down to tactical level military action as needed. All possible responses cannot be enumerated here, but operational strategy must take into account the fact that each case would require independent assessment and analysis as well as responses. A 'one solution to fit all contingencies' will never exist, especially when the threat is multi-faceted and internal. But irrespective of the level and nature of threat, the response strategy at the operational level should be built on the twin principles of containment and wearing down of the opponent.

The last two steps are isolation and destruction. Isolation of the enemy or the adversarial movement would have to be undertaken in a three-pronged manner in the political, socio-economic and military spheres. This is necessary to ensure that there is only minimal repercussion within the state when the final step of destruction is undertaken. Only after carefully ascertaining that isolation of the adversary in all three spheres has been successful should the last step of destruction be undertaken. The destruction phase itself will have to be carefully managed to ensure that a near-simultaneous effect can be achieved at both the ideological as well as the physical level. A better term for this kind of combined action would be 'annihilation' wherein the adversary is made physically incapable of opposing our own forces or initiating any action as well as being completely overwhelmed in the politico-ideological and socioeconomic spheres so that rejuvenation is impossible. Isolation and annihilation are complimentary and cannot be conducted successfully as independent actions.

The application of air power as part of the military support of this overall strategy can either be latent or direct. Latent application of air power would only produce varying degrees of deterrent impact whereas direct application of force would result in more immediate and tangible results. The choice of employing either one would depend on the context, circumstances and the capability of the air force involved as well as the expected opposition.

Air Power Response, Contribution and Effectiveness

Air power response to any threat to territorial integrity has to be a ‘capability-based, scenario-dependent approach as a part of a multilayered defence strategy’. In the case of archipelagic nations air forces would have to adopt an expeditionary construct to provide a wide range of responses at the operational level, starting with air defence, preemption, retaliation and intelligence, surveillance and reconnaissance (ISR).

Air power contribution to Territorial Area Security Missions (TASM) would have to be carefully assessed to ensure that the principle of proportionality of response is maintained. This is even more important in these circumstances because the adversary will in all probability also be part of the state’s populace. Air power can undertake a number of missions, ranging from dedicated strike to enabling operations that bring advanced technologies to bear on the enemy in a non-lethal manner. Strikes can be independent or in support of surface forces and can also be punitive or retaliatory in nature. From the perspective of archipelagic nations, air strikes are effective in geographically isolating the enemy so that ground forces could then be used to neutralise enemy strongholds. Air strikes are also the best option in carrying out pre-emptive strikes, but their effectiveness in insurgent situations is almost completely dependent on the accuracy and availability of timely intelligence.

The second aspect of air power contribution is in the provision of air defence in case the opposition is sophisticated and possesses air capabilities. However, this will require adequate appreciation of the air threat, which is once again dependent on the accuracy of intelligence as well as the availability of air assets to be employed in the air defence role. As a corollary to the use of air power in either of the two roles— strike and air defence—the likelihood of an attack on air bases will increase. Therefore, air base security in terms of ground defence takes on added importance when air forces are employed in TASM. By virtue of their structure, air bases are highly vulnerable and an irregular enemy would consider them the most lucrative of high-value targets.

Air power can also provide rapid and flexible airlift into and out of combat zones for ground troops, especially Special Forces. This will enable the build up and concentration of combat power at a time and space of own choosing, thereby increasing the probability of obtaining and retaining surprise. Airlift also provides the necessary logistics to deployed forces circumventing the probability of attacks on supply lines even if they are extended. This is especially applicable to insurgent and guerilla warfare situations where the enemy would consider logistics lines as soft targets with high yield return.

Another area in which air power can contribute effectively is in surveillance and reconnaissance. Current technology permits the use of uninhabited vehicles for high altitude, long-range and long endurance aerial surveillance of areas of interest. It is now possible to monitor movements of even very small groups of people on a continuous basis and have the information made available in real-time to decision-makers. Such surveillance greatly reduces the response time.

Command and control spectrum is another major area where air power can contribute to a greater extent than any other force projection capability. By virtue of its inherently increased perspective, air power is better placed to facilitate battlespace control both at the strategic and tactical levels. Air power is perhaps best placed to effectively carry out both military and civil search and rescue efforts.

Four key factors, which operate at the strategic level, will directly affect the effectiveness of air power in TASM. First, the nature of the enemy mainly in terms of their warfighting and subversive capabilities, popular support and the internal cohesiveness of the organisations will affect the effectiveness of air power. Dependent on the nature of the enemy, the quantum and quality of air power to be used will vary to ensure its effectiveness. Second, the type of conflict being engaged in will determine the capabilities of air power that would be brought to bear and will impact directly on its effectiveness. The type of conflict could range from a full-fledged conventional war to primary guerilla warfare or simple insurgency using a variety of methods. A subversive conflict could also be a combination of guerilla warfare and terrorist activities that could be made to peak in intensity at will. The conflict could either be static or involve extensive manoeuvring by one or both the contestants, depending on which the effectiveness of air power will be determined. Third party support to insurgents or the guerilla force would also have to be taken into account while identifying areas where air power could be effectively used.

The third factor is the magnitude of political control that would in turn determine the constraints under which air power is forced to operate. The effectiveness or otherwise of political control being exercised will impact doctrinal development and indirectly affect air power effectiveness. Fourth, and perhaps the most important of all, is the nature of laid down political objectives, which will determine not only the type of response but also effectiveness of any action that is initiated. The commitment of the political leadership to the conflict aims and comprehensive analysis to ensure that the political objectives are achievable by the appropriate employment of adequate air power will be the cornerstones in ensuring the efficacy of air power.

At the operational level, environmental influences like weather and terrain will affect the actual employment and efficacy of missions. These factors will determine the support requirements as well as the employment tactics of air power assets. Counter insurgency/terrorism missions will invariably have to prepare for urban warfare as part of the overall mission. Urban guerilla warfare is perhaps the most complex scenario yet to emerge that confronts conventional military forces. While the contribution of air power in such a scenario is indisputable, the modus operandi to bring to bear air power capabilities in the most efficient manner is still being debated. In urban conflict the effectiveness of air power will almost certainly be dependent on its ability to utilise cutting edge technology to close the sensor-to-shooter timeframe. State-of-the-art sensors are capable of reducing the time between target emergence, identification and data dissemination to the command level to almost real-time. This enhances operational efficiency. The problem of ensuring target legitimacy in a foolproof manner in urban aerial warfare is slowly being overcome with missiles that are being called 'fire-and-forget plus'. These missiles can be self-destructed even after they have been fired on autonomous control.

Rotary wing assets have long been considered better suited than fixed wing platforms for urban warfare. The greatly improved capabilities of UAVs—mainly their extremely long endurance and, more importantly, their semi-autonomous strike capability—have not only supplemented helicopters in urban conflict, but are gradually replacing them. The efficacy of helicopters in urban warfare vis-à-vis their survivability in a saturated air defence environment is now being questioned. It can be envisaged that not far into the future, helicopters would be relegated to purely mobility missions in urban conflicts.

Strategic Effects

Selection and maintenance of aim is the primary principle of any campaign. Therefore, success of all air power actions will depend on the aims of the campaign being set at an achievable level vis-à-vis inherent capability of the force and then being enunciated clearly. It will also be necessary to align this stated aim with the defined end-state that is politically acceptable. In the case of TASM this may not always be possible leading to a dichotomy in the conduct of air power missions.⁴ It is obvious that the least amount of constraints placed on the employment of air power will provide the maximum chances of success in these missions. But considering the nature of the conflict, the application of air power in TASM will have to be carefully tailored within laid down constraints to achieve the necessary effect.

An air force that is optimised primarily for counter-insurgency duties and without sufficient resource availability will find it difficult to define its strategic role and mission in the context of the broader national security. Such a situation will have a detrimental impact on its force projection capability in the broader spectrum of warfighting requirements. In some circumstances counter-insurgency actions by itself become sufficiently important to be viewed as crucial for national security. However, this appreciation will be contextual and an air force's basic purpose of 'defence of the homeland' must remain the underpinning ethos of all force development. It is therefore important to have the correct balance between counter-insurgency and other force projection capabilities. When this situation is examined carefully it can also be observed that small-sized air forces will have difficulties in managing the distinctly different operational concepts that underpin these requirements. It also brings to the fore doctrinal difficulties that will be further exacerbated by resource constraints. In such a situation the need for resource allocation priorities to be correct and in line with national security imperatives is emphasised. Political interference in resource allocation, which is once again a distinct possibility, has the potential to make this process completely lopsided, which can lead to the force being marginalised because of its ineffectiveness.

CONCLUSION

From the points enumerated and discussed above it can be seen that the use of air power in counter-insurgency campaigns brings with it a number of distinct advantages. However, it is also possible to completely misuse its inherent competencies and thereby reduce the force to irrelevance in the larger scheme of ensuring national security. This is a distinct possibility in a resource-strapped nation struggling to contain disparate threats to national integrity.

Success of air power in TASM will depend on it being employed as part of an integrated total force with clearly defined responsibilities.

Territorial area security can never be assured by one element of the military alone, and has to be confronted with a whole of government approach. All emerging insurgent and subversive threats to territorial integrity must be assessed individually with a view to find innovative approaches to solving them. Old ideas and old ways may not always work in the 21st century.

The true criterion for evaluating success of any air campaign will be to ask and critically answer the question, How optimised was the application of air power and how much did it contribute towards achieving the desired political objectives?

In closing, it has to be emphasised that air power alone can never be the answer to threats to territorial integrity. The optimum response in these insurgent and subversive conflict situations where the threat or even the response can never be very clearly demarcated would be to develop an interdependent, combined arms combat force with a multilayered effects-based approach designed to effectively achieve laid down strategic goals.

ENDNOTES

- ¹ These competencies, while not entirely self-explanatory, have not been further elaborated in this paper for two reasons. One, the audience to which the original paper was presented consisted predominantly of air force officers and air power enthusiasts; and two, time constraints forced certain aspects of the paper to be only touched upon, leaving the explanations to be done in the question and answer session if possible and if required.
- ² Threat to the integrity of territorial areas because of external aggression has not been considered in this paper. In the case of external aggression, the use of the military forces including air power would be in accordance with the prevalent conventional doctrine and operational concepts. This paper is focused on non-traditional threats to national integrity and the employment of air power therein.
- ³ Hugh Smith, 'On Strategy and Strategists,' in Hugh Smith (ed.), *The Strategists*, Australian Defence Studies Centre, Australian Defence Force Academy, Canberra, 2001, p. 9.
- ⁴ The reasons for this kind of divergence are many, most of them politically influenced. Explanations of these reasons are beyond the scope of this paper and therefore not discussed.

