

Comments on Col Meilinger's "Ten Propositions on Airpower":

1. Whoever controls the air generally controls the surface.

I like the essay's conclusion to its discussion of this: "air superiority is necessary but insufficient." -- I couldn't agree more, which is why I don't like the wording given this proposition. Air superiority in and of itself does not give one control of the surface. Experience in Bosnia and Vietnam underscore this, but if we examine the matter closely, so too did experience in World War II. Western air forces won air superiority over the continent long before we were able -- at great cost and only after great effort -- to control the surface (of the continent). And we came uncomfortably close to losing that land campaign, even with overwhelming air superiority.

Having said all that, I strongly agree with what the essay says about gaining air superiority. This should be the first business of an air force on campaign. It is only once effective air superiority has been won that the other fruits of air power ripen. Furthermore, the best way to grab air superiority appears to be to "go ugly early" -- burst out of the gates with a quick and aggressive Offensive Counter Air (OCA) campaign right at the start. If one can beat down one's opponent's air power by attacks against its bases, one can probably grab air superiority and hold onto it. The Germans were close to achieving this over the British in 1940 when they infamously shifted their focus from RAF airfields to London. The Israelis demonstrated this same point brilliantly in 1967, as did the Gulf war. The important point is to concentrate on the OCA campaign first. Traditionally the other services complain about this, accusing the air forces of being more interested in doing their own thing than in "usefully" contributing, but that is short sighted. If one side concentrates all its available air power on an OCA campaign to gain air superiority and the other does not, inevitably the side that has placed less emphasis on OCA will lose the battle for air supremacy, and then they won't be able to use very much of any air power at all -- for any missions for any arm of the service. Further, once air superiority is gained, keeping it is easier than gaining it in the first place. The analogy that always comes to my mind is that of two wrestlers. They may grunt and struggle for a while, but once one is pinned, his chances of getting back up again are virtually nil, even if the two wrestlers are about the same size.

In sum, I think an early, aggressive concentration on gaining air superiority is essential, and it is only after this has been achieved that other objectives should be considered. However, that is not quite what the wording used for the first proposition implies. I would recommend something like: "Concentrate first and foremost on seizing air superiority," or perhaps the even more pithy "Air superiority first."

2. Airpower is an inherently strategic force

I would not necessarily disagree with this, I would just add that all three services are (or at least ought to strive to be) inherently strategic. That being the case why single out airpower as being especially strategic?

The essay's discussion of land and naval warfare here equates attrition strategies with the tactical level of war. This seems to be implying that air power, because it is "strategic" in nature, air power somehow transcends this. Yet in the previous discussion under proposition number one the essay insightfully observed that "airpower did not eliminate the trench carnage of the Great War; it just moved it to twenty thousand feet." The point is that any sort of warfare can blunder into an attrition strategy. Equally, any form of warfare can rise to brilliantly decisive results -- as land campaigns did for the Germans in 1940 and naval campaigns did for the US in the Pacific. All three services should aim at decisive results that will have strategic significance.

The word "strategic" was also much abused by Douhetist minded airmen in the war. As the essay notes, the efficacy of the Second World War's strategic bombing campaigns have been fiercely debated. I do not propose to re-hash that issue here; suffice it to say that I am a sceptic of such "strategic" action's success. I am also rather inclined to strongly disagree with the essay's interpretation of the decisive "strategic" effects air power achieved in the recent Gulf War. That war was only brought to a conclusion when the Coalition had retaken Kuwait and swept around the Iraqi flanks -- ie after ground action. Furthermore, the "strategic" effects of the air campaign against Iraq would appear, in retrospect, to have been negligible. Yes, plenty of targets deep in Iraq were "serviced", and this created multiple problems for the Iraqis and prevented a coherent response from them -- thus aiding our war effort. But the effect of those strategic air attacks on Iraq would seem to have been limited to just that -- aiding our (ultimately ground) war effort. Hussein was not deposed, the Iraqi regime did not lose its grip on power, their war making potential wasn't even permanently damaged.

The comments about air power compressing the traditional line between strategic and tactical levels are well taken. Actually, I would say that air power rather inter-mixes tactical, operational and strategic roles. "Strategic" heavy bombers can be used to carpet bomb tactical enemy troop concentrations. "Tactical" fighter-bombers like F-16s and F-18s can strike critical strategic targets such as national leadership nodes. All this underscores that aircraft aren't "strategic" or "tactical" -- missions are. The same aircraft that just flew a strategic mission can be turned and then sent off on a tactical one. This speaks, of course, to the flexibility of airpower.

My own proposition in this area is that air power should exploit its flexibility and seek to have the most significant and decisive results that it can -- and that it should not limit itself to direct support of the other services in doing so. For instance - - consider the example of "tactical" air power in Normandy in 1944 (which just happens to be the subject of my ongoing MA thesis).

Within the realm of "tactical air power", there is a real distinction to be drawn between attacks directed against enemy forces actively engaged right at the front, which is generally known as close air support, and attacks made deeper, at enemy forces in reserve, manoeuvring in operational depth, or their headquarters and lines of communication, which is generally termed interdiction. By 1944 the Western Allies had such a dominating air supremacy, and enjoyed such a surfeit of available air power, that they could rather indiscriminately pursue both of these approaches. However, it is my hypothesis that the deeper interdiction was the far more significant and decisive tactical air effort. Indeed, this appears to have been the critically decisive factor in the Allied victory.

Most historians of the war agree that the strongest and most effective arm in the Anglo-American armies was the artillery. Indeed, in *Brute Force* John Ellis argues that the Allies relied on fire superiority to simply batter their way through German positions. In this context, more close air support is simply more fire on the target -- an issue that was going to be settled by weight of effort anyway. The deeper attacks, however, had an effect very different in kind. They undermined the command and supply of the German armies in the west, but more significantly they prevented the Germans from manoeuvring as they wished -- and manoeuvre, of course, was the German forte. It appears that German commanders were consistently unable to manoeuvre their formations in Normandy the way they wished because of the effectiveness of tactical air interdiction. Considering how difficult it was for the Anglo-American armies to break out of the Normandy beach head, thoughts of what might have been if the Germans had been free to manoeuvre their forces as they wished make the hair on the back of one's neck stand up.

The moral of the story here is that it was the deeper attacks, not directly tied to supporting engaged army units, which made the decisive contribution. So I would be cautious about describing air power as "inherently strategic." What I would stress is that air power should not be tied to directly supporting other services.

3. Airpower is a primarily offensive weapon

This reminds me of a joke Lester Pearson (a former Prime Minister of ours who began life in the diplomatic corps) used to tell. As a young man he was on the Canadian negotiating team to the League of Nations talks in Geneva to outlaw warfare and make "offensive" weapons illegal. He said that he and many other of the junior representatives spent a great deal of their time in a certain cafe where they developed a great solution to the vexed question of what constituted an "offensive" and what a "defensive" weapon. An "defensive" weapon, he explained with a straight face, was one that you are pointing at someone else, whereas an "offensive" weapon is one that someone else is pointing at you.

Nevertheless, I strongly agree with this proposition, especially at the tactical level. While we do fly CAPs in the Defensive Counter Air (DCA) role, unlike land forces, you cannot have emplaced forces "dug-in" in air warfare. Even in our DCA CAP example, those air craft on CAP can only influence events by committing themselves -- that is by taking offensive action.

Equally, as I argued above in the first section about the importance of a robust OCA campaign to seize air superiority -- that too reflects going quickly to the offensive with air power.

Having said all that, I do not entirely agree with what the essay says about the sky being "trackless" and that air attack can come from any direction. This is true at the tactical level, but there is an operational level to air warfare -- something I consider a neglected consideration. Perhaps the best example of this is the Battle of Britain, which can easily be examined as an operational level air campaign. In this context, it was most certainly not the case that attack might come from any direction. The British knew where the Germans were, and the Luftwaffe bomber streams were not about to come out of the west. This allowed for the considered deployment of RAF Fighter Group's assets in a way rather analogous to land warfare. A "front line" was put up, blocking forces were employed, "reserves" were sent to attack the "flanks" of large German

bomber streams once they were committed. All of this can be seen. As you might have guessed, I am a fan of John Warden's view of the under appreciated significance of reserves in air warfare. Actually, on that note, I agree with you and Gp Capt Waters about all this being more important before one has achieved air superiority. It's just that Western militaries' have only ever once (in 1940) had to face anything less than friendly air superiority -- and we've usually had a rather one sided air supremacy. I think this somewhat distorts our perceptions.

4. In essence, airpower is targeting, targeting is intelligence, and intelligence is analyzing the effects of air operations.

How gratifying to hear a senior air force officer saying this. Is Col Meilinger a pilot? As I am an Intelligence Branch officer I am not about to disagree with this proposition.

However, what conclusions do we draw from this? I personally believe that the conclusion should be that air forces should be prepared to devote a significant proportion of their assets to an air breathing intelligence collection effort ("significant" need not, however, mean a large percentage in absolute terms). Traditionally, come budget time and the hard calls, this has not been the case. Scarce budget dollars have been concentrated on "real" aircraft -- fighting aircraft. Intelligence collection has been seen as a specialist function to be indulged with "leftover" funds. In my own air force, for instance, we have no air reconnaissance capability (now that we are getting rid of our CF-5s -- who had it as only a secondary capability anyway) at all, although there is "talk" about buying a reconnaissance pod for our CF-18s.

Many would argue that other sources -- particularly the high tech exotic ones like satellites -- make air breathing reconnaissance passe and un-necessary. I could not disagree more. Those other assets are simply not as effective or (more critically) responsive, as fast air reconnaissance.

I also heartily endorse the essay's comments about intelligence needing to be "intertwined" with air power. As targets are nominated, intelligence on them must be produced (an intel function) -- this probably means tasking aircraft to fly reconnaissance on them (an ops function). An attack package is then put together and flown against the target (another ops function). BDA is then necessary (an intel function), which will probably need post-strike reconnaissance flights (an ops function). Analysis of the resulting data from the post-strike reconnaissance (and all other available sources) will then produce the BDA (intel again). Decisions are then necessary as to requirements for re-striking, which restarts the whole process. I think you can see what I'm driving at about ops and intel being "intertwined". Unfortunately, my experience on exercises in which ATOs have been produced is that this sort of continual cycling back and forth is very much the exception rather than the rule.

5. Airpower produces physical and psychological shock by dominating the fourth dimension -- time.

Time is exceedingly important. I like the essay's Napoleon quote here. Right now the current buzz-phrase in the US Army about all this is "getting inside the enemy's decision cycle." This reflects back on the targeting problem. Actually the problem is bigger than just targeting per se, its about the whole process of command and control of air forces -- the whole ATO cycle.

Current USAF doctrine -- which we have basically swallowed whole -- provides for a three day planning cycle for ATO production. Now that does not expressly mean that any request for air support takes three days to be actioned, but I still think that it is excessively long and ponderous, especially given the potential of modern electronic command and control means. Working on shortening this loop should be a high priority for us all.

6. Airpower can conduct parallel operations at all levels of war, simultaneously.

Strictly speaking this is true -- but just because we can it does not necessarily follow that we should. Sometimes it may be advantageous to do so (generally when we have an overwhelming advantage in airpower), but there is a real danger of dispersal of effort here. Jack of all trades master of none.

Personally, I would throw my lot in with what the essay stressed (quite rightly I think) in principle number one above -- ie the cardinal importance of winning air superiority first. In situations like the Gulf where this wasn't really in doubt then we can probably afford the luxury of parallel operations. But against a credible opponent, to not concentrate on air superiority first could prove disastrous -- especially if that credible opponent does concentrate his efforts on winning air superiority -- you might suddenly find yourself rudely out of the air game entirely. See my discussion of this above in section one.

As another note, I would caution against drawing too much out of the Gulf war. Thumping an essentially prostrate body is not much of a military challenge, and we should not think that what was possible there illuminates what may be more generally possible.

7. Precision air weapons have redefined the meaning of mass.

Perhaps, but there is another side to this that has not yet received much attention -- the reciprocal effect of precision munitions. What the essay says about PGMs severely limiting the required number of weapons is all well and good if one is fighting an adversary without any PGMs of their own -- but what if they have them too? Then there will be a reciprocal effect.

What would be the effect of that? It would certainly drive dispersion of military assets farther than ever before (an established trend for the last century and a half) which would certainly affect the meaning of mass. But its chief effect may well be to increase the cost of keeping up with the battle -- ie to worsen attrition. If every enemy shot kills a target of ours (and vice versa) both sides may seek to replace these lost assets with further forces at an ever more hectic pace. This could lead to greater quantities of forces eventually committed, could it not?

War is not simply the mechanical application of fire to a static target. If it were then the introduction of PGMs would indeed reduce in absolute terms the tonnage of weapons required to do the job. But war is not like that. It is reactive. For every action there is an enemy counter-action. Widespread introduction of PGMs may simply accelerate meat-grinder attrition, just (as the essay itself pointed out) air power in World War II didn't end attrition -- it simply moved it up to twenty thousand feet.

8. Airpower's unique characteristics necessitate that it be centrally controlled by airmen.

I would certainly agree with this. Indeed, what I was saying about an air campaign's priorities in sections one four and six necessitates a single command authority to effect. Ideally, the air assets in an air force should be as flexible (ie multi-role) as possible (like the F-18 for instance) so that they can be concentrated on OCA and DCA to win air superiority early, and then re-rolled to interdiction or CAS as necessary once this has been assured. Flexible re-rolling like that requires a central authority to apportion effort.

9. Technology and airpower are integrally and synergetically related.

I could hardly disagree with this, although I am cautious about throwing around the word "revolution" as the essay did in your discussion of this proposition. When I look at the history of warfare (even in this century) I see far more evolution than revolution, right up to and including the present. But air forces are clearly highly sensitive to technological change.

10. Airpower includes not only military assets, but an aerospace industry and commercial aviation.

This is certainly true in a broad sense, although it is not so much of a concern for a smaller power like Canada. We are a technological society, but we simply don't have the economic base to develop a great deal of our own aviation (especially military aviation) industry.

Concluding Remarks

As one may gather from many of my remarks above, a theme that I think worth stressing in considering air power is the concept of "levels of war" -- tactical, operational, strategic, grand-strategic. One does not hear this approach applied to analyzing air warfare very much; usually there is a lot of talk about "strategic issues" (ie heavy bombing of the enemy homeland), and a lot of talk about "tactics" (ie the hands-in-the-air-to-explain -a-dog-fight talk of old fighter pilots). Seldom does one hear much talk at all about the operational level of consideration. I believe this to be an oversight. Viewing the history of air warfare through this lens brings, I think, some issues into resolve. It focuses attention on the fact that there is an air campaign to be won, and that the first order of business is winning air superiority -- it is not simply a matter of wading in and starting to do everything. It makes clear the role of position, deployment, and "reserves". It makes clear the role of a single air commander, and the special professional knowledge that that commander must possess.

Anyway, in the spirit of academic debate about these important issues, I offer my own, somewhat modified list of propositions as my contribution to the debate.

1. 1. Air superiority first.
2. 2. Do not tie air power to direct support.
3. 3. Air power works via offensive action.
4. 4. Air power must be intertwined with intelligence.
5. 5. Dominate time with air power's shock action.

6. 6. One air commander for all air power.
7. 7. Air power and technology are inter-related.
8. 8. National air power includes civil aviation.

In conclusion, I thoroughly enjoyed the paper and the thought it provoke in me. Indeed, as I look back on my commentary here I find that I've written rather more than I had thought I would. Further debate is encouraged, my home page on the world wide web is at: "<http://www.igs.net/johnstons>". My e-mail address is johnstons@igs.net

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