

**SPEECH BY CHIEF OF AIR FORCE
AIR MARSHAL GEOFF BROWN, AO
LAUNCH OF PLAN JERICHO
CAF SEMINAR, MELBOURNE
23 FEBRUARY 2015**

Today is an important milestone in the history of the Royal Australian Air Force. Today I want to launch Plan JERICHO which describes the vector that Air Force will pursue on our transformation path towards becoming a 5th generation – enabled force. The introduction to service of the F-35A Joint Strike Fighter opens a new era in the distinguished history of our Air Force.

But Plan JERICHO is about much more than the Joint Strike Fighter. Indeed, it is about much more than all of our aircraft and platforms. It is about root and branch *transformation*. It will affect the way we train, the way we fight and the way we sustain ourselves. We must transform our relationship with industry to ensure we procure and innovate in alignment with the breathtaking speed at which technological change is occurring in the information age. Clausewitz described war as the ‘true chameleon’, which changes its complexion to conform to its socio-political context.

Unsurprisingly, the information age has given birth to information warfare. This has implications for a force that has always relied on a technological edge to enhance its combat power. We understand that our technological edge must also deliver superior situational awareness. We also understand that we must share this situational awareness and operate as an integrated team across the Services, Defence, our national agencies and our coalition partners. This is the only way we will win in the information age. This will demand pervasive change in the way we acquire, share and store the massive amount of information that is now available in the battlespace.

Of course, where we are heading is shaped by where we have come from. And our inventory has been shaped by our relentless efforts to stay abreast of technological change, as well as by changes in the geo-political context in which air power will be employed. Australia is a relatively young nation, so our military history corresponds almost precisely to the age of air warfare. Of course, the Centenary of the Gallipoli landings, later this year, will commemorate our emergence as a nation. Throughout our history, our strategic culture has been characterized by our willingness to support our allies in the maintenance of a global order, conducive to our interests and values. While Australians will proudly pay tribute to the exploits of our diggers, we should also recall that war is not a romantic adventure. It is the ultimate act of policy, whereby the nation risks the lives of its people as a last resort to secure its justifiable national interests. It is a destructive, awful business, which must always be the last resort of any civilized society.

Ever since the Anzac landings, Australia has pursued a maritime grand strategy to secure a favourable global order. Every military commitment we have made has been

directed at maintaining our unrestricted access to the global commons, in concert with our allies. This has been the unifying thread, which gives coherence to our strategic policy, from Federation to the present day. It is appropriate to reflect on that history before I outline Plan JERICO.

At this very moment, our airmen and airwomen are fighting in the Middle East to uphold that global order. They are operating over Iraq, near where the very first Half Flight of the Australian Flying Corps flew its first sorties. We were at war in the air even before the famed Anzac landings. Our recent operations have burnished the proud history of the Royal Australian Air Force. Moreover, they have given us an insight into the challenges facing air forces in a period of heightened, great-power tensions, of hybrid wars against non-state actors with the backing of states, of the demands of rapid deployment to provide humanitarian aid to distressed populations or to repatriate dead or injured Australians from trouble spots overseas.

In the past year, Air Force has constituted the long arm of Australian policy. We have conducted every one of those operations that I alluded to above and more. In every case we responded as our government required. In so doing, we exemplified all of the distinctive attributes of air power—speed, reach, agility, lethality, precision and discrimination, as well as allowing the government to calibrate our involvement in distant conflicts to a degree that is commensurate with our interests.

Over the past year, we have conducted strike operations and air battle management in Iraq, having already delivered humanitarian aid to internally displaced Yazidi civilians. We delivered humanitarian aid to the Philippines after a natural disaster. We led a multi-national coalition search-and-recovery operation after Malaysian Airlines flight MH370 disappeared over the Great Southern Ocean. And when another Malaysian Airlines jet was shot down over the Ukraine, our Air Force provided the most visible, timely and decisive element of Australia's response to that crisis.

In every case, air power exhibited those characteristics that have made it a unique and indispensable element of military power. Our response was rapid. It was calibrated. It was relevant. And it represented extraordinary global reach for a regional middle power. Air power provided the Australian Government with its most agile, flexible, potent, and visible strategic response to a diverse range of security challenges. The future geopolitical context in which air power is to be employed will be at least as complex as the era through which we have just passed. We will almost certainly experience more extreme climate events, especially in the archipelagos to our north, as well as a proliferation of other non-traditional threats, such as illegal people movements and epidemics, as globalisation and demographic and climate pressures intensify. That is not our estimate. All of these trends are shaping the United States pivot towards our region and influencing US Pacific Command in its planning. Likewise our RAF cousins are predicting a shift from a period of sustained land centric 'campaigning' to an era of contingency. As our premier air power theorist Alan Stephens presciently argued, the era when Western Armies went abroad to occupy large swathes of territory is over.

We are also likely to witness increasing great power competition in our region. This will take the form of competition for resources, disputes over spheres of influence but also competition in the expanded global commons constituted by the Information Age.

Those expanded global commons now include space and cyber space. Information is both a prized resource as well as an enabler of capability. Any military force, which fails to grasp this reality and fails to respond to it appropriately, faces catastrophic defeat.

And we are likely to be required to support coalitions of like-minded nations against capable non-state actors, whether backed by state sponsors or not. This will require a full spectrum response, which only a balanced Air Force can provide. The evidence of the immediate past is that governments now require increasingly rapid military responses, whether in the form of humanitarian missions or combat forces capable of deploying over vast distances rapidly and being immediately able to operate with our major allies. Air Force invariably meets these requirements. We must expect to be the force of first resort more often than ever before. Both our geography and the innate reach and agility of air power make that inevitable.

Fortunately we *are* a balanced force. The contemporary Royal Australian Air Force is one of the most capable in the world. It is the product of substantial investments in air power by governments of all stripes over a long period of time and a direct result of our close alliance with the United States.

While there has been a lot of focus among commentators on the arrival of JSF, the fact is that we have already substantially modernised our entire inventory. The recent or imminent entry into service of C-17, the Growler, the Super Hornet, the E-7 Wedgetail, P-8 Poseidon, C-27 Spartan and the Triton UAS, all in addition to the F-35—enabled by the latest space and surveillance systems—will rank us among the most modern and well balanced forces in the world.

But modernisation is *not* transformation. And, unless we transform, we will not only fail to exploit the maximum advantages conferred on us by our modern weapons and systems, but we will also risk operational failure in the complex, dynamic and fluid environment of the Information Age.

I really like the phrase ‘The F-35 replaces *nothing* – yet it changes *everything*’. Each of our new platforms will give us a formidable amount of ISR and lethality. But the real challenge is to link them in real time so that the copious amounts of information they can gather can be available across our entire force. When that happens—and it will—Air Force can truly claim to be a ‘system of systems’. A 5th generation – enabled force with vastly improved situational awareness and the ability to operate as an integrated team. That must be our goal.

After a number of false dawns, in the guise of so-called revolution in military affairs, and effects-based operations, I expect some healthy scepticism about claims that an aircraft can transform how we fight. But in the case of the JSF, the claim is not mere hype. By recognising that JSF is more than merely a replacement for the F/A-18, we will realise its potential to transform our force. And by integrating it with all of our other platforms and our ground-based distribution networks and space assets, we will not only realise its enormous potential as a weapons system and ISR platform, we will also increase the situational awareness and realise the full warfighting potential of our entire force.

We all know from our daily lives that information is proliferating at an exponential rate. But it's not just the *volume* of information available to both business and military leaders, it is the *speed* with which it is collected and transmitted that defines the world we now live in.

The great British military thinker, Basil Liddell Hart, once wrote:

'Of all qualities in war, it is speed which is dominant, speed of both mind and movement, without which hitting power is valueless, and with which it is multiplied.'

Airmen have long understood that truth. Indeed, it was that fine airman John Boyd who adapted it as the basis for his famed OODA loop, with which all military commanders now agree, and describes the key elements of decision superiority in any domain. Decision superiority through more rapid accumulation, interpretation and dissemination of information is *the* fundamental aim of Plan JERICHO. The reality is that we, like all of our allies, will face a severely constrained fiscal environment well into the next decade, while the proliferation of information technology erodes our comparative advantage over state and non-state foes alike. That requires that every cent we invest in our sensors and our shooters must be exploited to maximum effect. Decision superiority underpinning agile, adaptive and seamlessly joint C2 is the only future path to success for the ADF. Plan JERICHO provides the strategic vector to achieve that.

Plan JERICHO is built on three themes—we will harness the potential of our existing force with an increased focus on integrated air combat effects, we will promote innovation and reward it by empowering our workforce, and finally, we will change the way we acquire and sustain capability to keep pace with technology.

The Jericho Vision entails harnessing the combat potential of a fully integrated force. This will require a concept of operations for a future 5th generation – enabled force that postulates how Air Force will fight as an integrated team, rather than simply defining individual platform capabilities. We will revisit our Command and Control (C2) processes to take advantage of the enhanced information sharing and decision support capabilities that we will employ in the information age. We will train as we fight—together, as an integrated force, leveraging the expertise and industry of our men and women at the tactical level.

The RAAF Air Warfare Centre will be established as a centre of excellence to coordinate and facilitate war-fighting experimentation and innovation across our Force Element Groups, services, national agencies, coalition partners and, of course, defence industry. Both the USAF and the RAF have highly effective Air Warfare Centres. They are therefore an excellent model for us to adapt for our specific needs. The Air Warfare Centre experimentation will be supported by a comprehensive Live, Virtual and Constructive (LVC) operational training and evaluation environment. We have long understood the value of this technology, but we no longer look upon it as a future requirement. Our experience with the Super Hornet has confirmed that we need LVC today, and we expect it will play a central role in developing our war-fighting concepts for tomorrow.

Of course our people are central to all of this. We must develop an innovative and empowered workforce in order to achieve this. We must design and implement contemporary trade structures that reflect the domain expertise we require to win in the

future. For example, we know information will be increasingly contested in future warfare. It follows that we need the people with the know-how to fight for it. We need to start growing them now.

We must adopt ‘systems of systems’ thinking. Our platforms may no longer be distinguishable by contemporary roles and characteristics, such as strike or reconnaissance, electronic or kinetic attack, or even between sensors and shooters. The boast of the F-35 designers is that ‘no aircraft fights alone’. We will be an Air Force where ‘no airman fights alone’. This must become the mantra of Air Force in the era of Jericho. Empowering our people to train and experiment together will deliver an integrated force that takes full advantage of 5th generation technology.

And finally we must Change the way we acquire and sustain capability. We have to align our acquisition times to the rate of technological innovation in the real economy. We’ve got to fundamentally move away from an industrial acquisition process. We must develop new ways to sustain capabilities. I want to use our sustainment funds to solve immediate problems, to stay abreast of changes to software and enabling capabilities. Too often, we allocate capital acquisition funds over time frames that simply cannot keep pace with technological change. We must give priority to the unglamorous but essential enablers—especially those joint projects whose purpose is to share information throughout the deployed force or to provide a common operational picture in real time. We must develop a force by design. Currently we stifle innovation through processes, which reward arid compliance rather than sound governance. We need to improve our working relationships with industry.

We have already engaged industry in the development of Plan JERICHO. In mid-2014, I invited industry to contribute their ideas and suggestions. Their response to date has been outstanding. I intend to build a partnership with industry above the project level so that we might take advantage of the agility and innovation which the pressures of profitability and shareholder accountability demand.

Furthermore, we must stay aligned with Army and Navy during this process. Removing our internal stovepipes is vital. But the walls preventing truly seamless joint operations must also come down. In that regard, I am pleased to report that we are already discussing Jericho with Army and Navy, as well as the Force Structure Review and White Paper teams. Commander One Brigade has already drafted an Air/Land integration paper and his formation will become a key test bed for us to develop truly joint concepts.

The last action I will announce this morning is that of the Jericho Team and the Jericho change model. I have established a dedicated Plan JERICHO team. They report directly through both DCAF and ACAUST to me. However, there is something quite different about this team. Previous large-scale changes experienced varying degrees of success. One lesson that we learned from our past experience is that plans such as JERICHO only succeed if there is widely shared, persistent ownership of the plan. So, rather than take a traditional approach of a top down designed and owned change program, I have decided to empower the future leaders and innovators across the Air Force to design and then implement the Jericho transformation program.

The Jericho team is led by two Group Captains—Jake Campbell and Rob Chipman.

They, supported by a small team of Wing Commanders and SNCOs, will form a peer level network across the Air Force to design and implement Jericho. The idea is that, as they and their peers continue in their careers, they will be responsible *as a team* to implement and adapt the plan they developed, regardless of whatever post they fill. So, rather than one or perhaps two star-ranked officers designing the change, only to have it stall when they are posted from their jobs or retire, we will empower the future leadership of our Air Force to own the change program for the remainder of their careers. The team will be mentored by the senior leaders across Air Force and Defence. However, the design and shared ownership will be theirs.

So—what next? The Jericho Team will develop a detailed Transformation Plan over the next six months. This plan will further expand on the three Jericho themes with detailed action plans and future operational concepts. The team will look at both short term changes to Air Force that can achieve a more integrated and networked Air Force within the next two years; and to begin the ground work for more complex medium and long term projects that require more comprehensive organisational transformation. This is a big agenda and a broad canvas.

However, be assured that we have already taken off. Distributed Ground Station Australia (DGS-AUS) has recently been established in Edinburgh providing our air warriors access to global ISR in real time. In recent months, Air Mobility Group will demonstrate new SATCOM and Link 16 capabilities as part of Exercise JERICHOW DAWN, enabling soldiers in the back of RAAF aircraft the ability to tap into DGS-AUS and receive updated intelligence information en-route to their mission. It's an example of advanced communications technology and outstanding workforce innovation combining to enhance our warfighting capability. It provides a valuable template for how we may be able to improve our acquisition processes to make Jericho work. I expect this experience will become commonplace in the years to come.

Today is an important day for Air Force. However, it is also important for the ADF and the Australian nation. The world is changing rapidly. Technology is changing rapidly. Since its inception, air power has needed to adapt to the combination of changes in strategic context and technology. We have always adapted. But today we face the most significant change to our structures and culture since the dawn of the jet age. We are living through a disruptive time. The proliferation of information, and the speed with which it is transmitted and shared, has rendered industrial era structures and work practices irrelevant. We must embrace this change. Plan JERICHOW is the vector Air Force will follow into this challenging exciting future.

I look forward to all of you joining us on this journey. As that moving message on the Royal Australian Air Force Memorial beckons us to do, it is time to 'slip the surly bonds of earth'. We must reach and touch the stars.