



The RAF in a World Transformed, 1945–49

Monday 28 and Tuesday 29 September 2020
Hosted Online from the RAF Museum

This conference will bring together a broad range of academics and scholars to how the RAF reacted to a period of widespread changes which effected both the service and the world it operated in.

At the start of 1945 the RAF remained heavily engaged against Germany, and faced global commitments. By 1949 the RAF had demobilised a diverse force, adapted to a rapidly changing technological environment, engaged in international co-operation and helped resurrect several air forces. The RAF was also involved in the process of shaping the public memory of its wartime operations as well as attempting to absorb the lessons of the war and convert these into subsequent strategic doctrine

The Conference consists of an exciting line-up of speakers covering a wide range of areas including panels exploring Industry, Technology and Environmental Perspectives; RAF Operations in South-East Asia; Post-War Operational Design and Policy; and Fostering Air Forces? The RAF and its International Relationships. In addition to these panels, the conference will include papers which present research on The Potsdam raid, 1945; The Search for Missing Aircrew; From War to Windrush; Post-War Female RAF Service; Air Ministry Interpretations of the RAF's wartime history; and Exercise Thunderbolt: Objective assessment of the Bomber Offensive or the Air Staff view of history?

The conference will feature a keynote address on 'The Flyer Confronts the Post-War Age: Survival, Guilt and Politics' given by Martin Francis author of *The Flyer: British Culture and the Royal Air Force, 1939–1949* and *Ideas and Policies Under Labour, 1945–1951*.

The Conference Papers will explore themes related to:

- The RAF in the Far East
- Air Power
- Science, Technology, and Industry
- Environmental Perspectives
- The RAF and Windrush
- Research and Design
- The RAF's interpretation of role in the Second World War
- Strategic Bombing
- Post-War Operational Design and Policy
- Social History
- The RAF and International Relations

Links to all sessions will be sent to the email with which you register for the conference. Speakers will be live-streamed from the RAF Museum Lecture Theatre unless marked with an * (in which case their paper will be pre-recorded and they will join the live-streamed Q&A)

TIMES are GIVEN in British Summer Time (GMT/UTC + 1)

Monday 28 September

- 9:45 AM Welcome and Introduction
- 10:00 AM The RAF and Post-War Industry, Technology and Environmental Perspectives.
 Gary Willis — Wings Over Britain: The relationship between the RAF and the landscape it flew over, 1939-1949
 Hermione Giffard* — Designing for the War or After it? The case of the jet engine
 Patrick Major — Airmen on the Sun: Luftwaffe and RAF space scientists at the dawn of the Cold War
 Chair: Edward Young
- 11:00 AM Break
- 11:15 AM Post-War Operational Design and Policy.
 Paul Stoddart* — The White Heat of Technology? RAF Bomber Projects, 1945–49
 Eric Grove* — A Division of Labour? 'Carrier Strike' versus Bomber Command in the Immediate Post- War Years
 Michael Pryce — The Fall of Icarus: RAF policy and fighter design 1945-49
 Chair: Dr Maria Burczynska
- 12:40 PM Poster Session One.
- 12:45 PM Break
- 1:45 PM From Raids to Retrospection: Assessments of Strategic Bombing.
 Alastair Noble — Hitting the Heart of Prussian Militarism: The RAF and the Potsdam raid
 Seb Cox — Exercise Thunderbolt: Objective assessment of the Bomber Offensive or the Air Staff view of history?
 Chair: Paul Stoddart
- 3:00 PM Break
- 3:15 PM RAF History: People, Meaning and Interpretation.
 Sally Barber* — WRAF and The Cold War: The promulgation of the Women's Royal Air Force as a permanent part of the Royal Air Force, 1949
 Stuart Hadaway — Redefining the Missing Problem: The RAF and the search for missing aircrew, 1945-52
 Clive Richards* — Presenting 'the Air Force view': Air Ministry interpretations of the Royal Air Force's wartime history, 1945-1950
 Russell Smith — From War to Windrush: The Black British legacy in a changing world
 Chair: Dr Kathleen Sherit
- 4:45 PM Break
- 5:00 PM Virtual Social Event.

Tuesday 29 September

- 09:45 AM Welcome
- 10:00 AM Operations in War and Peace: The RAF in South-East Asia, 1945–49.
- David Omissi — The Royal Air Force in India and South-East Asia, 1945–1948
- David Jordan — The Royal Air Force and the Netherlands East Indies
- Meor Alif Meor Azalan* — Advanced Air HQ Malaya, Trioxone, and ‘jungle garden’ destruction during the Malayan Emergency
- Chair: Professor Wendy Webster
- 11:30 AM Break
- 11:45 AM Fostering Air Forces? The RAF and its International Relationships.
- Loris Paoletti* — The RAF and the French Air Defence Command
- Bill Pyke — The RAF and USAF ‘Special Relationship’ at a Time of Anglo-American Intergovernmental Strain, 1945-1948
- Jean-Charles Foucrier* — Co-Operation Between the Royal Air Force and the French Air Force: Diplomatic, technical & operational considerations, 1945–49
- Chair: Dr Sophy Antrobus
- 12:45 PM Poster Session Two.
- 12:50 PM Break
- 2:00 PM Keynote Address.
- Martin Francis: The Flyer Confronts the Post-War Age: Survival, Guilt and Politics
- Chair: Seb Cox
- 3:30 PM Closing Remarks.

Conference Registration

To cover the costs of hosting speakers and streaming the conference online we are asking those registering to choose to pay £6. As part of the Museum's commitment to encourage participation, however, we have provided the option to register for FREE to allow everyone who may wish to attend to do so.

PLEASE REGISTER AS SOON AS POSSIBLE to ensure that we can organise the event effectively online.

To register, please use the following link:

<https://royalairforcemuseum.digitickets.co.uk/event-tickets/29385?catID=28958&>

Further information can be found at:

<https://www.rafmuseum.org.uk/london/whats-going-on/events/conference-2020-the-raf-in-a-world-transformed>

If you are interested in taking part in the virtual networking events the Museum is planning please also email harry.raffal@rafmuseum.org

In your email please state your organisational affiliations (if any), and your interest in the conference topics; your comments will be taken into account if numbers have to be limited.

Please do not expect an immediate response. There will be a delay prior to you being informed details of the networking events.

If you have broader questions, contact the RAF Museum's Historian:

Dr Harry Raffal,

Archives, Library, and Research Department

Email harry.raffal@rafmuseum.org

Tel. 020 8358 4960

Keynote Speaker: Professor Martin Francis

Educated at the universities of Manchester and Oxford, Martin Francis is Professor of War and History at the University of Sussex. From 2003 to 2015 he was the Henry R. Winkler Professor of Modern History at the University of Cincinnati, having previously held posts at several UK institutions, notably Royal Holloway, University of London. He is the author of *Ideas and Policies Under Labour, 1945-1951* (Manchester, 1997) and *The Flyer: British Culture and the Royal Air Force, 1939-1945* (Oxford, 2008), in addition to articles and essays on topics as diverse as the emotional economy of 1950s prime ministers; male domesticity, empire and 1940s adventure films; the presence of repressed political and sexual desires in wartime British photography; jealousy and diplomacy in wartime Cairo; and poststructuralist approaches to the historiography of the Great War. He is currently working on two projects: *Celebrity, Empire and Excess: King Farouk of Egypt and British Culture, 1936-1965* and *Warrior Hearts: An Emotional and Medical History of Britain's Second World War High Command*.

Title: The Flyer Confronts the Post-War Age: Survival, Guilt and Politics**Abstract:**

In the closing months of the Second World War, directors Michael Powell and Emeric Pressburger were filming what was arguably their masterpiece *A Matter of Life and Death*. In this cinematic fantasy, Peter Carter (played by David Niven), having leapt from his stricken Lancaster without a parachute, insists that he was incorrectly selected to die, and claims the right to plea for his life (and for a future with June, the control tower operator with whom he has fallen in love as his plane falls to earth) in a heavenly court. In this keynote I will use *A Matter of Life and Death* as an entry point into thinking about how the men of the RAF (both fictional and real) transitioned from war to peace in the years immediately following 1945, and what that can tell us more broadly about what came to be termed the 'postwar' era. I will isolate two critical themes.

First, Peter Carter's love for June is necessary for him to overcome the fact that he had previously assumed he would not survive the war. Here a fictional character dramatizes the guilt and remorse that accompanied survival for those men who were confounded by the fact they were still alive, when so many of their comrades had died. We need to understand the significance in the transition to peace of this particular emotional moodscape, and to consider how it was accommodated and negotiated within British society.

Second, Peter's claim to life is based on a critique of an inflexible bureaucratic heavenly system which failed to account for the rights and desires of the individual. This gives us an opportunity to consider the political implications and contexts of the RAF flyer's transition from war to peace. Peter famously claimed to be 'Conservative by instinct, Labour by experience', a self-identification which dramatizes the ambiguities of the post-1945 social and political settlement. Labour's success in the 1945 general election was nowhere near as straightforward and unequivocal as it first appears, and Peter (like the myth of the 'few') reflects the resilience of a strong sense of romantic individualism in British society which ran counter to Labour's statist collectivism. Moreover such essentially Tory prescriptions were reinvigorated by the emerging cold war, and popular images of the RAF emphasized the idiosyncrasies and singularity of the service as a retort to the apparent soulless uniformity of Soviet totalitarianism.

Taken together, these discussions of both guilt/survival and politics demonstrate that the RAF flyer's transition from war to peace serves as a useful index of the essential ambiguity and fragility of Britain in the years between 1945 and 1949. Emotional and ideological demobilization was far from straightforward, and the transformed world into which the flyer emerged was one that was decidedly challenging and frequently fraught and disconcerting.

Speakers and Abstracts

Dr Meor Alif Meor Azalan

Meor Alif completed his Doctoral degree in Political Science at the London School of Economics and Political Science (LSE). Prior to which, he obtained an MSc in Comparative Politics and MRes in Political Science also at the LSE, upon completion of his undergraduate studies at the International Islamic University Malaysia (IIUM). Presently, he is Assistant Professor of Political Philosophy at the IIUM. His recent research focuses on the British Empire's counterinsurgency (COIN) campaign during the Malayan Emergency and her wider experience at decolonisation in Southeast Asia by using more nuanced reading of native sources through archival research. His current work expands on his doctoral research, in particular with regard to the use of tactical herbicides during the Malayan Emergency, as well as the philosophy of COIN and the decolonisation of COIN literature. His fields of interest include British Empire, Colonialism and decolonisation, Counterinsurgency, Southeast Asia, Civil wars, Comparative study of conflict, Political violence and terrorism, and Small wars.

Title

Beavers, Austers or S.55s, Captain Mackenzie? Advanced Air HQ Malaya, Trioxone, and 'jungle garden' destruction during the Malayan Emergency.

Abstract

The British introduction of 'food denial' operations during the Malayan Emergency was designed to control smuggling of excess food to the Communist Terrorists ("CT") through measures that included ration reductions, the 'punching' of canned food at point of purchase, strict checks by guards on all personnel moving in and out of New Villages, the forbidding of meals from being brought to civilian work areas, and orders permitting only the communal cooking of rice in order to prevent any private ownership of uncooked rice that might be smuggled to the CTs.

The effectiveness of these operations is well recognised and discussed elsewhere as essential to campaign success, but such discussions would typically be absent of any mention of the involvement of the Royal Air Force ("RAF"). A key component of these efforts, however, included the chemical destruction of CT food crops cultivated in the Malayan jungle better known as "bandit crops in jungle gardens" by means of delivery from air. A memorandum from the Secretary of State Dean Rusk to the American President in November 1961, would later describe these efforts as precedence such that the American use of defoliant in Vietnam did not violate any rule of international law concerning the conduct of chemical warfare as it was regarded as an accepted tactic of war due to British use of aerial methods of chemical spraying for crop destruction during the emergency in Malaya.

Overlooked and under-discussed aspects of RAF efforts during the Malayan war include trials in developing and determining the most effective use of aircraft options - fixed wing aircrafts or helicopters; the development of equipment for the delivery from the air of chemicals in the form of liquids, pellets or dust for the destruction of CT food crops; and reconnaissance operations during Operation Spittle to examine the implications of chemical attacks by air on CT cultivation areas conducted, with special reference to the respective parts played by visual and photo recce. This paper investigates the chemical destruction of CT cultivation areas by means of delivery by air of Trioxone (a chemical consisting of 2,4-D and 2,4,5-T initially used for purposes of controlling roadside vegetation to prevent ambushes in Malaya and later, the constituent compounds of Agent Orange) as ancillary efforts to food denial operations. This is accomplished by tracing the

involvement of Advanced Air Headquarters Malaya through its early stages in 1949, as well as early trials and execution to shed further light to the often-under-emphasised contributions of the RAF during this crucial phase of the Malayan Emergency.

Sally Barber

Sally McGlone completed a BA (Hons) in History and Politics in 1995. Whilst at University she was a member of the University Officer Training Corps (NUOTC). In 1997 she joined the RAF and graduated from RAF Cranwell in 1998. Sally served in the RAF as an Administrative (Secretarial) Officer for 16 years and left in 2013, whilst serving she completed operational tours in Kosovo and Afghanistan. Previously a Project Officer for the Commonwealth War Graves Commission's *Lest We Forget* First World War Project and a consultant advisor regarding Female Aviation History to Working Title Films, Universal Pictures and BBC Radio Four. Passionate about Military & Aviation History, the History of both the First and Second World War is currently studying for a Masters' Research Degree in Aviation History at University of Portsmouth. She is married to an ex GR4 Navigator and they live in Lincolnshire with their two Border Terriers.

Title

WRAF and The Cold War: The promulgation of the Women's Royal Air Force as a permanent part of the Royal Air Force, 1949

Abstract

Towards the end of the Second World War the WAAF found themselves posted to more overseas locations. There were radar plotters posted to Belgium and the Netherlands to assist tracking and location the launch sites of the V1 and V2 rockets. PMRAFNS were deployed to Europe after the D-Day landings and throughout the German withdrawal WAAFs were used to back fill roles in the United Kingdom and on the continent. When Germany surrendered in 1945 and was controlled by the Allies, Germany was divided into British, American and Russian sectors, the WAAF found themselves posted to RAF stations across Germany. A blockade of all land, air and sea routes by the Russians in 1948 which led to the "Berlin Airlift" (the biggest humanitarian aid effort in history up to that point) saw WAAF working alongside their male colleagues in logistics, supply, air traffic control ensuring that the yearlong, twenty-four hours per day relief effort could continue.

In 1946 Parliament announced it was planning to retain women in the Armed Forces on a permanent basis. Women in the WAAF were granted a continuation of Military service under the Extended Service Scheme, this ensured there was a nucleus of fully trained Officers and NCOs to assist with the development of a permanent force. Many of the women who signed on for extended service were offered overseas postings, Egypt, Germany, Gibraltar, Aden, Hong Kong and Cyprus were all places where the ladies could expect to be posted. Once the WAAF was disbanded and the Women's Royal Air Force was officially recognised as a service in 1949, there was a push for greater integration within the RAF. Recruitment, selection and training of the women were all streamlined to run alongside the training offered to their male colleagues. As the training was amended and improved, so to were the opportunities offered to the women of the WRAF.

The RAF motto "Per Ardua Ad Astra" – "Through adversity to the Stars" is a perfect summary of the part and impact that women have played in ensuring that the RAF is still revered and respected today as being the oldest and the finest Independent Air Force in the World.

Seb Cox

Seb Cox, OBE, is the Head of the Air Historical Branch (RAF) in the UK Ministry of Defence. He is the Chair of the Royal Air Force Museum Research Board. He is also a member of the Editorial Board of the Royal Air Force Air Power Review and serves on the Committee of the Royal Air Force Historical Society. He was the historical advisor to the Bomber Command Memorial Trust. He was previously curator of documents at the Royal Air Force Museum before joining the Air Historical Branch as a researcher in 1984, and then serving successively as a Historian and the Deputy Head before being appointed as Head of the Branch in 1996. His twenty-four year tenure as Head of AHB makes him the longest serving of the ten individuals who have held the post in AHB's ninety-seven year history. He was the first person to hold the post without having previous commissioned military service. He has written widely on the history of the RAF and air power, and has edited book series related to the field. He has also lectured on air power and related topics to military and civilian audiences on four continents, including Military Colleges in the UK, USA, Canada, Australia, France, Germany, Norway and Kuwait.

Title: **Exercise Thunderbolt: Objective assessment of the Bomber Offensive or the Air Staff view of history?**

Dr Jean-Charles Foucrier

Jean-Charles Foucrier completed his doctorate in contemporary history from Paris-Sorbonne University. Prior to which, he obtained a Master Contemporary History at the University of Tours and Caen, which considered Allied bombings on the Centre of France and on Tours. His research focuses on military strategy, propaganda, public opinion and the historiography of the Allied aerial bombardments on France during the Second World War. He has previously published *La Guerre des Scientifiques; La Stratégie de la Destruction – Bombardements alliés en France* and 'Bombing France: Solly Zuckerman and the Transportation Plan'. Currently a Research Fellow at Service Historique de la Défense (SHD)-Vincennes, France.

Title: **Co-Operation Between the Royal Air Force and the French Air Force: Diplomatic, technical & operational considerations, 1945–49**

Abstract

When the Royal Air Force emerged from the Second World War it had operational jet fighters and advocated for the integration of the atomic weapon. In contrast, the French Air Force, although associated with the winner's table, was far from achieving this level of evolution. Many of its air bases and air factories had been destroyed in the liberation battles. In the absence of new aircraft available, the squadrons were forced to operate a heterogeneous fleet of aircrafts, including American, British, French and even German aeroplanes. In addition to its multiple problems of organization and resources, the French Air Force was required to defend the huge colonial empire, being confronted immediately at the end of the Second World War with a new conflict in Indochina, and soon after, an insurgency in Madagascar in 1947.

To deal with its missions, the French Air Force was supposed to take full advantage of an ambitious aeronautical recovery plan devised at the Liberation, which in fact quickly failed in the face of the immediate needs of reconstruction of France. Contacts were planned with Moscow, but it came to nothing. With the Americans refusing for the time being to see their aircraft used in colonial conflicts, the French finally turned to the United Kingdom, which was also concerned with defending its Empire. By the end of 1945, an agreement was signed between General André Hartemann and Air Marshal William Dickson, leading to the delivery of equipment, including valuable Spitfires. The treaties of Dunkirk (1947) and Brussels (1948) intensified exchanges and laid the groundwork for

inter-allied cooperation, with London's decision to deliver several dozen Vampires jet fighters that same year.

The military archives of the Service Historique de la Défense (SHD) in Vincennes, France, contain many original documents on the cooperation between the RAF and the French Air Force in the late 1940s. These include multiple reports sent by the French military attaché in London, Colonel Henry de Rancourt de Minérand, about the organization of RAF and its technological innovations. The archives also highlight the significant difficulties faced by the French Air Force, with, for example, urgent requests to London to provide 20 mm shells for Spitfires engaged in Indochina.

Based mainly on the primary sources of the SHD, this communication aims to evoke the history of international relations between the Royal Air Force and the French Air Force in the years following the Second World War, from diplomacy to material cooperation. In particular, it would highlight the efforts made on both sides to achieve joint integration into NATO in 1949.

Dr Hermione Giffard

Hermione Giffard Completed her doctorate at Imperial College, London in 2011. In 2010–11 she was a Guggenheim Fellow at the Smithsonian Institute. In 2013, she was Scholar-in-Residence at the Deutsches Museum in Munich. Since 2014 she has been a Post-Doctoral Researcher in the Department of History and Art History at Utrecht University. Editor of *ICON*, the bi-annual journal of the International Committee for the History of Technology, and Managing Editor of *Technology and Culture*. She has published *Making Jet Engines in World War II: Britain, Germany, and the United States* (2017 winner of the Business Archive Council Wadsworth prize) and 'Engines of Desperation: Jet Engines, Production and New Weapons in the Third Reich'. Currently Project Leader of Industrial Engineering & Innovation Sciences, Technology, Innovation & Society at Technical University of Eindhoven.

Title: Designing for the War or After it? The case of the jet engine

Abstract

The different national programs to create jet engines during the Second World War had different goals. Although the war was certainly one theatre that the RAF had in mind for its fledgling jet engines, it was not the only one. The RAF and the British government were looking even more at post-war than war-time competitors. This was quite sensible for a technology for which new designs took on average five years to mature. Because of this post-war perspective, Britain's earliest jet engine designs were not so risky as Nazi Germany's and its wartime use of jets was extremely limited. Thinking about the post-war market meant catering for both civil and military applications. If we understand the British government's efforts to cultivate jet engine expertise among its aero-engine firms as an investment into post-war science and technology, we can make much more sense of Britain's wartime jet program.

Professor Eric Grove

Eric Grove was appointed a civilian lecturer at the Royal Naval College, Dartmouth in 1971 and left at in 1984 as Deputy Head of Strategic Studies. During this time, he taught on exchange in the History Department at the United States Naval Academy, Annapolis. As a self-employed strategic analyst and defence consultant he taught at The Royal Naval College Greenwich and the University of Cambridge and worked with the Foundation for International Security. Under the latter's auspices in 1988, he founded the Russia-United Kingdom-US naval discussions and confidence building talks. In 1993, he became a Senior Lecturer at the University of Hull, and obtained a PhD on the basis of his published works, and subsequently became Reader in Politics and International Studies and Director of the Centre for Security Studies. In 2005, he moved to the University of Salford where he became

Professor of Naval History and Director of the Centre for International Security and War Studies. After a brief period as Professor of Naval History at Liverpool Hope University he retired from full time teaching in 2015, although he continues as a regular lecturer at the Joint Services Command and Staff College and as a visiting supervisor at Cambridge.

Title: A Division of Labour? 'Carrier Strike' versus Bomber Command in the Immediate Post- War Years

Abstract

The paper will explore the effective division of labour between the Royal Navy's carrier force and the RAF's strategic strike forces in post-war posture and planning. The Royal Navy effectively conceded the long range strike role to the RAF while Naval Aviation concentrated on 'naval' concerns, convoy escort and cover. Nevertheless, the limited power projection capability of the RN's carriers proved useful in the immediate post war period. The major inter service conflicts over air power were yet to come.

Stuart Hadaway

Stuart Hadaway has been Senior Researcher at the Air Historical Branch (RAF) since 2009, and before that was Assistant Curator in the Department of Research and Information Services at the RAF Museum from 2004. He has published extensively including *Missing Believed Killed: RAF casualty policy and the search for missing aircrew, 1939-52*; *British airman in the Second World War* and *British Airfields of the Second World War*. He has previously presented conference papers on 'Royal Air Force, Dominion Air Forces and Allied Air Forces Missing Research and Enquiry Service, 1944-52' at the Social History Society annual conference; 'RAF in French Indo-China, 1945-6' at the British Commission for Military History "War in the Air in the 20th Century" conference; 'Allies at War: The RAF and the Western European Air Forces 1940-45' at the RAF Historical Society "The Royal Air Force – an international dimension" seminar, and 'Imperial Entanglements: British commitments to French Indo China, 1945-6' at the Second World War Research Group "When East Meets West: The Second World War in Global Perspective" conference at King's College London.

Title: Redefining the missing problem: The RAF and the search for missing aircrew, 1945-52

Abstract

By the end of the Second World War, 41,881 Royal, Allied and Dominion Air Force personnel were listed simply as 'missing'. Well over half of all RAF casualties had no known grave, and no known fate.

A generation earlier, a similar (albeit admittedly larger) problem had been met in France and Belgium with monolithic monuments to the missing. Determining the fate of missing men (including one thousand members of the flying services) had been left to luck; parties clearing the battlefields and the rear areas either found and identified their bodies, or they did not. No systematic search was conducted to account for the missing.

During the Second World War, the RAF refused to follow the precedent set during and after the First World War (and earlier conflicts) or by the other two armed services. Their efforts culminated in the formation of the Missing Research and Enquiry Service (MRES) in July 1945. A global network of teams was established to systematically investigate each individual missing person, and where possible provide them with a named grave.

It was a massive undertaking. Search areas were not confined to clearly defined battlefields, but encompassed tens of thousands of square miles of all manner of terrain. And yet, at a time of cut

backs and demobilisation, the RAF committed time, men, and resources to these efforts. The question is: why?

This paper will examine what drove the senior personnel who approved the formation and operations of this unit at the higher levels, and also the officers and men who conducted the work on the ground. For the latter, physically exhuming graves and searching wreckage, it was a gruesome task, and yet the search officers were all volunteers, many of whom had seen long years of war service and now postponed leave or demobilisation to conduct this work. Based partly on personal and official papers, but also on hours of interviews with surviving MRES veterans, this paper will aim to shed some light on their motivations and experiences.

Tom Hopkins

Tom Hopkins joined the RAF Museum as Curator of Aircraft and Exhibits in January 2019. Tom previously worked in collections management at the History of Science Museum, University of Oxford. Tom's role involves caring for the Museum's larger objects. Tom graduated with an MA in Classics from the University of Birmingham in 2010, but has had an interest in military aviation and maritime history from an early age. Tom is currently building a knowledge of RAF Coastal Command, with a focus on the Second World War period and the Command's role in the Battle of the Atlantic.

Poster: RAF Coastal Command in the early stages of the Cold War

Abstract

Enemy submarine activity, especially attacks against merchant shipping, posed a huge threat to Britain in the First World War. The Allies responded successfully to this threat in a number of ways. Naval aviation was part of that response. While instances of aircraft directly sinking or significantly damaging enemy submarines were very rare, merely keeping aircraft flying over vital sea lanes acted as a deterrent and forced submarines to remain submerged.

Come the end of the War and submarines seem to have been largely forgotten by defence planners. Instead, the emphasis remained on big capital surface ships.

If the Navy were more interested in fighting on (rather than under) the water, the Royal Air Force was more interested in attacking targets on land. In the interwar period, thinking on air power was dominated by ideas of offensive air forces that would take the fight to the enemy. Maritime aviation was largely neglected, and very little thought given to anti-submarine warfare and its potential delivery from the air.

There is no need to dwell on a summary of the Battle of the Atlantic or its potential impact on the Allied cause. As in the First War, defeat of the enemy submarine threat was brought about by a range of factors. By the second half of the Second World War, however, aircraft were playing a much more vital function than they had in the First World War. Not only were they acting as a deterrent, they were now much more capable to destroy enemy submarines.

Following the end of the Second World War there were huge cuts in defence expenditure much as there had been in 1918. RAF Coastal Command was no exception to this. With the U-boats gone, maritime patrol aircraft were re-purposed for air policing and supply duties across the world. Cold water had been poured into Coastal Command's specialised ASW functions that had been perfected during the Second War.

There were 21 years of peace between November 1918 and September 1939. The period between the end of the Second War and the ill-defined beginning of the Cold War was far shorter. Both periods however saw rapid defence-cuts followed by rapid re-armament as new political tensions materialised. But if anti-submarine aviation had been completely neglected after the First War, the

lessons learned after the Second War did not altogether fade. As the enemy submarine threat re-emerged in the early 1950s – this time from the Russians – the RAF and RN, although much reduced in size, were not taken on quite the same back-foot as they had been ten years earlier.

This poster will explore these various factors, with an emphasis on the changing role of coastal command during the immediate post-Second World War period as well as its re-focus as an anti-submarine force during the early stages of the Cold War.

Dr David Jordan

David Jordan joined the Defence Studies Department of Kings College London in June 2000 from the University of Birmingham. His PhD — completed at the University of Birmingham — examined air-land cooperation during the First World War. He is one of DSD’s air power subject matter experts, and was academic director for the air power aspects of ACSC between 2001 and 2013. He chaired the departmental examination board between 2001 and 2007, followed by a five year stint as Director of Teaching. He has served as the Air Warfare Historian for the Higher Command and Staff Course, and as academic director for the RAF Division at JSCSC. He has published widely on Air Power and Modern Warfare and is a member of the Chief of the Air Staff’s Air Power Workshop.

Title: The Royal Air Force and the Netherlands East Indies

Abstract

This paper will look at the work of the RAF when British and Dominion Force were sent to secure the Netherlands East Indies at the end of the war to facilitate the recovery of PoWs, and while the Dutch government put in place the necessary moves to resume colonial administrative control of the country. The British forces discovered that reports that the locals would be delighted to see the Dutch return were misplaced and arrived in a febrile situation. Nationalists had declared independence, with the more militant amongst them conducting a brutal campaign of revenge against Dutch civilians, many of whom had just been released from prison camps. After a disastrous encounter in which the GOC of 49 Brigade was killed, British forces assaulted and cleared the city of Surabaya, before embarking upon what we might now term stability operations. In 1946, the Dutch resumed authority, and the British left, with the local nationalist leaders who would ultimately lead an independent Indonesia, paying tribute to their efforts.

The RAF's part in operations is little known, but was significant, particularly in terms of air mobility (including humanitarian relief), attack and providing escorts to convoys evacuating PoWs and internees. The paper begins with a narrative of events, starting with the use of the RAF's Liberator bombers being used for air drops to PoW camps and concludes with an analysis of the use of air power, demonstrating that some of the experiences in 1946 remain relevant to the RAF's operations today

Professor Patrick Major

Currently researching the history of Anglo-American air attacks on Berlin during the Second World War, from the early 1940-41 raids, through the Battle of Berlin and the Mosquito Light Night Striking Force raids of 1944-45. Previously published 'The ionospheric response over the UK to major bombing raids during World War II'; Behind the Berlin Wall: East Germany and the Frontiers of Power; 'Listening behind the Curtain: BBC Broadcasting the East Germany and its Cold War Echo' and most recently 'Shooting Rommel: The Desert Fox (1951) and Hollywood's Public-Private Diplomacy'. Professor Major joined the University of Reading in 2008 having previously been a Senior Lecturer at Warwick University.

Title: Airmen on the Sun: Luftwaffe and RAF space scientists at the dawn of the Cold War

Abstract:

In the winter of 1945/46 a highly secret military-scientific operation took place across the Austro-German border. A convoy of some 200 German solar scientists, recently employed by the Luftwaffe to research the effects of the ionosphere on short-wave radio transmissions, made its way from occupied Austria to Lindau, near Göttingen in the British Occupation Zone of Germany, less than ten miles from the new Iron Curtain, in what is now the Max Planck Institute for Solar Research. The masterminds behind this operation were RAF Flight-Lieutenant Eric Ackermann, an electronic warfare specialist, and Dr. Roy Piggott, both associates of Edward Appleton, the 1947 Nobel prize-winning physicist heading the Department of Scientific and Industrial Research (1939-49). What was unusual was that this convoy moved behind the backs of British Military Government, which was mystified both by the volume of local encrypted radio traffic accompanying it (using borrowed SIS one-time pads), and the fact that a junior RAF officer appeared to have requisitioned a large part of military government's motor pool. When Ackermann was finally brought to book by military governor Air Marshal Sir Sholto Douglas, he confessed all to his mentor, R.V. Jones, who devoted a chapter of his classic *Most Secret War* to the escapade.

This paper benefits from the recent discovery at Harwell's Rutherford-Appleton Laboratory of the *en clair* cypher messages between Ackermann and Piggott, but also the post-war correspondence between scientists who had until recently been enemies, but whose pre-war scientific connections had endured. Piggott was instrumental in the denazification of the Luftwaffe military-scientific complex, against a background of victor powers seeking scientific spoils. As well as surrendering themselves, German physicists such as Karl Rawer brought a trove of research papers conducted for the Luftwaffe at their purpose-built wartime Alpine observatories, and collaborated closely with their British colleagues.

This paper will offer some theories of what the RAF and Ackermann got out of this arrangement. (Ackermann went on to supervise radar surveillance of the Soviet Occupation Zone from various airbases in the British Zone.) But it was not clear in this variant of the military-scientific complex who was exploiting whom: the RAF to further their sigint capability, or the scientists to restore their interwar research networks for pure ionospheric science, at government expense?

The speaker welcomes expertise and comments from sigint practitioners and RAF personnel from the early Cold War, but are also seeking more general leads on space weather and electro-magnetic storms and their effects on terrestrial and flight systems in the run-up to the next Carrington Event (a solar superstorm in 1859 which knocked out large parts of the electrical systems of the eastern United States). Some of this research may already be familiar from earlier work on the effects of heavy bombing in the Second World War on the ionosphere.

Dr Alastair Noble

Alastair Noble has been a Historian with Air Historical Branch (Royal Air Force) at RAF Northolt since 2015. Much of his work in the Branch has considered the impact of Defence Reviews on the RAF since the 1970s. He was previously a Senior Lecturer in Defence and International Affairs at the Royal Military Academy, Sandhurst. Prior to this he was a Ministerial Speechwriter and Policy Officer at the UK Government's Scotland Office in London. Between 2002 and 2009 he was a Research Assistant and later Senior Research Assistant in the Historians' team at the Foreign and Commonwealth Office in London. He also worked in Records Management at The National Archives, Kew (2000-2002). He has written a number of books, scholarly articles and book chapters, including *Nazi Rule and the Soviet Offensive in Eastern Germany 1944-1945*, a study based on his doctoral thesis

Title: **Hitting the Heart of Prussian Militarism: The RAF and the Potsdam raid**

Abstract

The Potsdam raid by Bomber Command on the evening of 14-15 April 1945 marked the last mass RAF attack on a German city of the Second World War. Over 500 Lancasters and Mosquitoes were despatched. It was the first time Bomber Command had sent four-engined Lancaster bombers into the Berlin defence zone since March 1944, the end of the bloody Battle of Berlin.

However, by April 1945, the circumstances were far more favourable for the attacking force. There was now little enemy territory to traverse before the target was reached. Nazi Germany was being throttled in a vice – by the time of the raid the Western Allies were on the River Elbe while the Red Army stood on the River Oder. The Third Reich was in the throes of defeat and its air defence capabilities were nearly exhausted – in its truncated territory there was no such thing as early warning, the Luftwaffe was rarely seen, and the flak was at the front.

Bombs had fallen on Potsdam before, largely because of its proximity to Berlin. In mid-April 1945 Potsdam was the target. It was the capital and administrative centre of the province of Brandenburg which surrounded Berlin. Potsdam was also the historic home of the Prussian Army with intact depots and barracks crucial for the Nazi regime's determination to mount last-ditch resistance. These were Bomber Command's primary targets.

Using a wide range of contemporary and published documentation from Britain and Germany, this long paper will examine the exercise of devastating air power by Bomber Command at the zenith of its capabilities. It will consider the order for the attack and the reasoning for the raid. Was Potsdam a legitimate target or does the raid deserve the condemnation heaped on it by commentators such as Jorg Friedrich? They underline the cultural damage to the city's historic heart and the high civilian death toll. There will also be an attempt to assess the impact of the operation – a task made more challenging as bomb-scarred Potsdam was captured by the Red Army less than a fortnight later.

Dr David Omissi

Dr David Omissi was most recently Senior Lecturer in History at the University of Hull. Before moving to Hull he was a lecturer in British Empire History at the University of Edinburgh and Prize Research Fellow at Nuffield College, Oxford. Dr Omissi has previously edited *Indian Voices of the Great War* and published *The Sepoy and the Raj: The Indian Army, 1860-1940* and *Air Power and Colonial Control*. Dr Omissi has contributed chapters to a number of published books. These chapters include "A most arduous but a most noble duty": Gladstone and the British Raj in India, 1868-98'; 'The Indian Army in Europe, 1914-1918'; 'Islam, the Indian Army and the Grand Strategy of British India, 1914-1916'. Dr Omissi also contributed to *The Impact of the South African War* which he edited with Andrew Thompson.

Title: The Royal Air Force in India and South-East Asia, 1945–1948**Abstract**

The period 1945 to 1948 was one of significant transition for the Royal Air Force in India, as it was elsewhere. As the world moved from war to Cold War, and as the strategic backdrop shifted from conventional to nuclear weapons, India was moving from Empire to independence. How did the RAF in India experience this period of transition?

The paper will begin with an evaluation of the actions of the 'forgotten air force' – the British and Commonwealth air forces in Burma and South-East Asia from VE-Day to VJ-Day. How significant was air power to the Commonwealth victories over the Japanese in Burma? In what ways did the air contribute? How did army-air relations in South-East Asia compare with the politics associated with the Allied 'bomber barons' in North-West Europe?

Victory in Europe, and elections in the UK, brought to power a Labour government, committed to some form of self-government for India. From 1945, therefore, the RAF in India was operating in the context of European decolonization, not only in India, but also in South-East Asia. RAF aircraft were used to drop leaflets, and, on occasion, bombs, in connection with the attempted suppression of nationalist movements in French Indo-China and the Netherlands East Indies. The paper will assess the political impact in India of the use of force, focusing in particular on the way in which RAF air attacks on nationalist strongholds were reported in Indian newspapers, and exploited by Indian politicians.

The war had transformed the RAF from a small body of peacetime regulars to a million-strong force, keen to be demobilized. The paper will consider the reasons for, and impact of, the RAF 'mutinies' in India in January 1946. What was their relationship to demobilization? Did the 'strikes' have any influence over the Indian armed forces, and in particular the Royal Indian Navy?

At the same time, the internal security situation in India was deteriorating, particularly after the Calcutta disturbances of August 1946. Aircraft had briefly been used against Indian rioters in Punjab in 1919, and again during the 'Quit India' movement of 1942–43. The paper will examine the fraught debate about whether to use aircraft to suppress the communal disturbances in Punjab from March 1947. The paper will then go on to consider the problem of the partition of the RIAF at Indian independence, the issue of the demobilization of the RAF in India, and the transition to civilian life of British former servicemen.

As well official and elite sources, the paper will draw upon a little-known memoir, 'RAF and Raj', written by a British aircraftsman, Jack Loveday, who served in India from 1944 to 1948. Although his politics were probably not typical of RAF servicemen in India, Loveday's observations about Indian society, food, landscape, and climate give some indication of how India was experienced, and interpreted, by the RAF's other ranks during the final years of British rule.

Loris Paoletti

Loris Paoletti is currently serving as a Military Historian in the French Air Force at CERPA (Centre d'études, rayonnement et partenariats de l'armée de l'air), whilst completing a history PHD at Paris-EPHE which analyses the role of Air Defence in French diplomacy and strategy during Cold War. He has published in *Air Actualités* and *Penser les Ailes Française*

Title: The RAF and the French Air Defence Command

Abstract

This proposal of short paper intends to explore to what extent the RAF model of Air Defence helped the French Air Force to build its own Air Defence Command (Commandement de la Défense Aérienne du Territoire) at the end of World War II. Indeed, France's defeat in 1940 showed that the French doctrine and organisation in terms of Air Defence was obsolete for modern air operations. As a result, fighter units were scattered all over the metropolitan territory, which ended being useless against large German Blitzkrieg units. In addition, French Air Defence suffered from a significant technical inferiority, from fighters to anti-aerial artillery and radar systems. Hence, in 1945, France naturally turns towards its British ally in order to resurrect its Air Defence.

Notorious officers such as André Hartemann or Martial Valin fought during the war in the ranks of the RAF and the Forces Aériennes Françaises Libres. Their experience, added to British counselling, will prove useful to rebuild an Air Defence which collapsed in 1940 and lacks national resources, such as industry or qualified personnel. In January 1945, General De Gaulle creates a single and unified command on the model of the Fighter Command: the Commandement de la Défense

Aérienne du Territoire. It is the first time that the French Air Force fully possesses the means to complete its mission of Air Defence, using every available tools, military and civilian. In 1945, the French civilian and military authorities still hope to rebuild a national army with domestic means only, especially for Air Defence, which is considered as an expression of the country's sovereignty. However, the context of massive demobilisation, of destroyed national industry and growing turmoil in the colonies forces the government to postpone the realisation of this new command.

The French Air Force, based on World War II's return of experience, begins to considerate the solution of practicing its Air Defence mission in coalition. The first and logical reflex is to exploit the tradition of cooperation with the Royal Air Force with whom contacts never stopped (Fressanges Commission). The Hartemann/Dickson agreement of 1945 provides a delivery of British planes to the French Armée de l'Air. The Treaty of Dunkirk (1947), an agreement introducing the idea of mutual defence in Europe, follows it. The objective for France is to obtain doctrinal and material aid (radars, Spitfires and Vampires), but also to achieve a common Air Defence over the British Channel, that could be efficient against future attacks from the East (first from a remilitarised Germany, and then from USSR), especially for London. As Cold War intensifies aerial danger, this model is extended towards Belgium, Luxembourg and the Netherlands (Treaty of Brussels, 1948). This alliance asserts the will of Western Europe to organize its defence inside a military and diplomatic coalition, under RAF leadership for Air Defence matters. This alliance is a way to prepare West European nations to NATO and its collective defence based on a repartition of military responsibilities.

This presentation, based on my PHD research, will use archives from the Service Historique de la Défense (papers and oral history), and a selection of specialised literature (including reviews such as Forces Aériennes Françaises and the Revue Historique des Armées) in order to depict the decisive role of the RAF in building a collective Air Defence in Europe.

Dr Michael Pryce

Currently Senior Air Systems Analyst, Defence Science & Technology Laboratory providing Operational Analysis and Decision Support for future RAF acquisition programmes. Previously he was a Lecturer in Defence Acquisition at Cranfield University and led the Low Cost by Design research network exploring the role of good design in defence acquisition. He sits on the Editorial Board of the Defence Acquisition Research Journal and is a member of the Royal Aeronautical Society. Dr Pryce's research focus is on understanding complex technologies, particularly from a design perspective.

Title: The Fall of Icarus: RAF policy and fighter design 1945-49

Abstract

The end of the Second World War saw Britain's air forces and aviation industry at the height of their powers. Production and incremental change had forged them into war-winning tools, celebrated in the victory fly-past of June 1946. By the time the last aircraft had passed over Buckingham Palace the great air fleets of the Empire had already been rendered obsolescent by events in the skies over Germany and Japan.

The desperate attempts by the Luftwaffe to defend against the bomber raids of 1944 and 1945 had combined with new approaches to the design of aircraft and missiles to create a new conception of the fighter aeroplane. Allied to the dramatic change in potential threat indicated by the searing artificial suns over Hiroshima and Nagasaki, RAF policy continued to prioritise air defence, but the new conception of fighter aircraft led to it abandoning its existing resource base. This radical change proved too great a challenge for the UK combat aircraft industry to endure.

Infused by German technology, personnel and scientific ideas, the attempt to fly close to the atomic sun was realised through the development of technology for what were to become the Hawker Hunter and English Electric Lightning. The role of the state's research establishments in driving forward the new approach, as well as the response of the aircraft industry, is shown through an illuminating examination of the design work on these fighters, intended to defend against nuclear attack, in 1945-49. Lessons for today are drawn out, and new historiographical avenues highlighted.

Based on extensive archival research, interviews and work as an independent technical advisor to the RAF, this paper re-casts the period after 1945 as a fork in the road, one from which Britain's fighter design ability has yet to recover.

Bill Pyke

Bill Pyke is an independent air power researcher who has focused on the role of the RAF in air intelligence and reconnaissance during the early years of the Cold War (1945-1960). Bill completed an MA in Air Power Studies at the University of Birmingham in 2016 under the guidance of Air Commodore (retd.) Peter Gray. Bill has subsequently published in the RAF's Air Power Review and has previously given a lecture at RAF Cosford in March 2018 as part of the Cold War lunchtime lecture series on the role of MRAF Sir John Slessor in establishing Britain's independent airborne nuclear deterrent. Bill previously had a 42-year career in the oil industry. He has always maintained a keen interest in the role of air power.

Title: The RAF and USAF 'Special Relationship' at a Time of Anglo-American Intergovernmental Strain, 1945-1948

Abstract

This paper focuses on the evolution of the joint air power relationship between the RAF and the USAF in the areas of policy, intelligence and operations. It also argues that this post-war re-forged relationship did much to eventually improve the higher Anglo-American intergovernmental relationship.

The years 1945 to 1948 marked a difficult period for the Anglo-American 'special relationship'. In many instances the relationship was often neither close nor special. The Truman administration had abruptly terminated the US/UK Lend Lease provision in August 1945. In addition, a large section of American opinion viewed Attlee's incoming Labour government as socialist and was therefore likely to support future Soviet communist policies. The relationship was strained further when the U.S. Congress passed the McMahon Act in June 1946 that banned all future joint nuclear research and development. In areas of foreign policy America criticised British actions in Palestine and its handling of the Greek civil war.

In sharp contrast the relationship between the RAF and the USAAF, and later in 1947 as the renamed USAF, continued seamlessly from World War to Cold War. The relationships between British and American senior air commanders were often close and cordial and were forged in joint operations during the Second World War. Examples included the Anglo-American Combined Bomber Offensive (CBO), the OVERLORD campaign, and the Mediterranean air force. However, in moving into the early post-war period joint activities did not merely rely on previous wartime bonhomie and nostalgia, but rather developed on a pragmatic basis that involved mutual respect and shared objectives.

Three key examples demonstrate the importance of the relationship during the early post-war years:-

In recognising the threat posed by the Soviet Union in the immediate post-war period, the RAF and USAAF reached agreement in June 1946 to enable the future stationing of its bombers initially at five

RAF bases in eastern England. This was the start of a USAF basing arrangements that developed during throughout the Cold War.

Air intelligence and reconnaissance became a key joint endeavour for both the RAF and USAF personnel. Operations such as TURBAN enabled RAF and USAAF to examine captured wartime German imagery taken over large areas of the western Soviet Union during the Eastern Front campaign. In early 1946, an agreement was finalised that that expanded joint air intelligence to include ‘worldwide exchange of photographic cover of every description on a worldwide basis...without financial compensation’ (Aldrich, *The Hidden Hand*, 213). It was the first of many Anglo-American post-war air intelligence treaties.

The Berlin Blockade between June 1948 and May 1949 was the first serious Cold War confrontation and a critical test of test of Western resolve. A major combined operation by the USAF and the RAF ensured that supplies of food and fuel were airlifted to West Berlin. It was a major political logistical success and milestone leading to of the formation of NATO in 1949.

Clive Richards

Clive Richards is an independent scholar based in Truro, Cornwall. He served on the staffs of the Department of Research and Information Services, RAF Museum between 1993 and 1996 and the Ministry of Defence Air Historical Branch between 1996 and 2008. Since leaving the Ministry of Defence in 2008 he has continued to research and write on air power matters, and in December 2017 he was awarded an MA in Air Power: History, Theory and Practice by the University of Birmingham. Clive has delivered papers on a variety of subjects relating to the history of military aviation to conferences held by the Royal Air Force Museum, the RAF Centre for Air Power Studies, the Royal Air Force Historical Society, the British Commission for Military History and the Polish Historical Society. A paper on the early development of military aviation in India and the creation of the Indian Air Force, presented at the BCMH Summer Conference 2012, was published subsequently in *The British Indian Army: Virtue and Necessity*, edited by Dr Robert Johnson (Cambridge Scholars Press, 2014). He was the author *The University Air Squadrons. Early Years*, which was published by the Council of Military Educational Committees (COMEC) in their Occasional Paper series in 2016. Clive returned subsequently to the initial history of the University Air Squadrons in a paper entitled ‘Flying for King and Country? British Universities and the Royal Air Force during the Interwar Period’, which he delivered at the Royal Aeronautical Society on 31 October 2019 as part of the RAF Museum’s Trenchard Lectures in Air Power Studies. He has also contributed to a number of journals including the RAF Historical Society Journal and the Royal Air Force Air Power Review.

Title: Presenting ‘the Air Force view’: Air Ministry interpretations of the Royal Air Force’s wartime history, 1945-1950

Abstract

Even as the Second World War was being fought, the Air Ministry had begun to consider how the Royal Air Force’s role in the conflict should be shaped for, and presented to, peacetime audiences. Recognising that the Government’s official history programme would take some time to reach fruition, senior officers, politicians and civil servants looked for other means to project a positive image of the RAF’s recent history to the British public. In part, this reflected the requirement to explain the Service’s wartime activities, and to account for their human and financial cost. The Air Ministry also looked to history to help rebut (or, at least, balance) criticism of the RAF’s contribution to the war effort, especially that levelled by the other Services and Service Departments; to garner popular support for the reconstruction and reequipment of the Service, at a time of financial stringency; and to enhance the standing of the RAF in the eyes of those who might be drawn to a Service career.

In addition to the value of history as a means of enhancing the RAF's status within British society, it was argued that a wider knowledge of the former's wartime exploits was an important element in the development a distinctive unifying ethos within the Service itself. The Air Staff also believed initially that Service's recent history could offer significant practical lessons for the conduct of future operations. To this end, a Directorate of Staff Duties was re-established in 1944 and charged with distilling lessons learned during the war that could be applied to peacetime RAF doctrine. However, the emergence of new military technologies – notably, the advent of the atomic age – would lead many to question the validity of lessons extrapolated from wartime experience.

This paper will draw upon material held by The National Archives and the Air Historical Branch, together with a range of secondary sources, to examine how Royal Air Force history was interpreted by the Air Ministry in the immediate aftermath of the Second World War. It will concentrate primarily, but not exclusively, upon the role played by the Air Ministry in the production of three key publications. Firstly, the paper will consider how the Air Ministry approached the requirement in King's Regulations and Air Council Instructions for the Royal Air Force for senior commanders to produce Despatches describing the actions for which they were responsible, and their publication in The London Gazette. Secondly, the Air Ministry's position with regard to the writing of popular histories will be examined, together with the place of these histories within the 'preliminary history' programme authorised by the Cabinet and overseen by the Cabinet Office. Thirdly, the paper will consider the degree to which lessons distilled from the application of air power during the Second World War informed the development of RAF doctrine, as expressed in the Service's first peacetime doctrinal publication – Air Publication AP 1300 War Manual, Part 1: Operations, the third edition of which was promulgated by the Air Ministry in January 1950

Russell Smith

Russell Smith is an Independent Scholar currently engaged as a Research Volunteer with the Royal Air Force Museum exploring the RAF's Colour Bar and subsequent personnel policies. A published author he has also written and contributed to access and learning events on Black British Military History at the Tower of London and Leeds City Museum. He serves as a Heritage Ambassador for the Tottenham Hotspur Foundation and in this role he has researched and given talks on the history of Black British players at the football club including Walter Tull who went on to be the first British-born black officer in the British Army. He has previously chaired the University of Florida Panel on African American Military Service in World War One. His work and research has been funded by a Milford Bursary and a grant from the RAF Historical Society.

Title: From War to Windrush: The Black British legacy in a changing world

Abstract

The Second World War saw vital contributions from African, West Indian and Black British personnel and the RAF proved a home for many such volunteers. The contribution these volunteers made has received some attention, however, little work has been done on what they personally gained or wanted in return for their service.

This poster will examine the motivation of and contributions of volunteers such as Squadron Leader Ulric Cross, DSO, DFC. This poster will also consider whether the expectations and inspiration that wartime service provided to men such as Cross influenced how veterans perceived society and their ability to shape it. For Cross, the war was just one chapter in a truly legendary life story. Despite this, the extent to which Cross' experiences in the RAF provided the means by which he changed the landscape of several nations in Africa, and his native West Indies, has received little analysis. This poster will also examine the RAF personnel and ex-RAF who filled the berths of the Empire Windrush who were destined for a life of significance in Britain, such as Sam Beaver King MBE, who went from

helping to ensure the Empire Windrush stayed its course to becoming the first Black Mayor of Southwark. It will also look at some of those already in Britain and making a difference to the everyday lives of the newcomers, such as Hubert ‘Baron’ Baker, who not only helped the Windrush passengers with accommodation upon their arrival but later helped them to defend their settlements by organising communities in the face of racial violence. Finally, this poster will examine the legacy of settling generations equipped for tough civilian battles by their time in the RAF, such as former RAF Corporal Paul Stephenson, an instrumental figure in the Bristol Bus Boycotts and legend in his town.

Paul Stoddart

Paul Stoddart was commissioned into the Royal Air Force in 1983 and served as an aero-systems engineer officer for eight years. He served on the VC-10 and Hawk and as directing staff on Initial Officer Training at the RAF College Cranwell. After leaving, he worked as a journalist on a car magazine and as a teacher of English as a foreign language before joining the Ministry of Defence as an analyst. He then worked at Farnborough on the Tornado successor programme and Boscombe Down as the programme manager for the Harrier and Sea Harrier trials clearance projects. His final role at Boscombe Down was as the programme manager for the Jaguar. It is notable that all three types he was involved with, Harrier, Sea Harrier and Jaguar were withdrawn from service much earlier than planned. Fortunately, he did not touch either Tornado or Typhoon. He then attended the Advanced Command & Staff Course at the Joint Services Command & Staff College at Shrivenham from 2000 to 2001 gaining an MA degree in Defence Studies from King’s College London. He then took up his current post as an operational analyst for the RAF. Paul is a Fellow of the RAeS and a member of the RAeS Air Power Group committee. He has written and lectured on a range of military aircraft subjects, most recently organising RAeS conferences on the 1943 Dams Raid (17 May 2018), the future of UK air power (19 Nov 2018) and a review of Air Power in 1944 North-Western Europe (15 May 2019).

Title: The White Heat of Technology? RAF Bomber Projects, 1945–49

Abstract

Two developments occurred towards the end of the war which had a transformative effect on the Royal Air Force. The first of these was the development and use of nuclear weapons at a time when both the USA and the UK had produced huge conventional bomber forces. The UK was already lacking reach which helped to determine the pragmatic adoption of the B-29 Washington as opposed to developing a UK aircraft, such as the Vickers Windsor. The choice was also based on a decision to focus research and development on the next generation (the V-Bombers) rather than continuing development of Second World War standard aircraft.

The second development was the use of Jet engines from 1944. The Jet engine provided a performance increase in speed and height for bomber aircraft and in 1945 the UK was the world leader in gas turbine technology. Hence various British engines were licenced to other countries, US, France and Sweden. The Soviet Union also copied designs without authority (The RAF never used the excellent RR Nene while the Russians made very good use of it).

These two developments had enormous consequences for UK industry. In 1945 there was an excessive number of companies when compared to inevitably reduced post-war demands. Scarce funds were spread thinly across too many design concepts (some promising, some less so) which slowed the pace of development with inevitable results. Many companies lacked the depth of research and development to turn promising ideas into prototypes. An example of this was Martin Baker and the slow progress made on the otherwise excellent MB.5 with the result that it was

obsolescent when it finally appeared. Combining the talented people of several companies would have achieved far superior and faster results.

This paper will also consider the cost-effectiveness of the decision to support multiple V-bomber projects. It will consider whether the support of a number of designs was prudent and whether the decision for three types to enter service was extravagant.

The paper will also explore the surprising lack of exploitation of turbo-props in designs whose origins lies within the immediate post-war period. It will consider whether certain high quality aircraft designs could have been extended, and new types provided with improved performance through a different balance of technological priorities.

In examining the above the paper will assess whether there was a lack of strategic, long-term planning despite the foresight of some of the decisions made.

Abby S. Whitlock

Abby S. Whitlock currently works at the National Gallery of Art's Center for Advanced Study in the Visual Arts in Washington DC as Assistant to the Program of Research on the History of Early American Landscape Design and The History of the Accademia di San Luca, c. 1590–1635:

Documents from the Archivio di Stato di Roma projects. In September, she will start in the University of Edinburgh's History MSc Program. She graduated with a Bachelor of Arts with Honours in History and European Studies from the College of William and Mary in 2019, focusing on social, cultural, and military history and war as a cultural production. Her thesis, "A Return to Camelot?: British Identity, The Masculine Ideal, and the Romanticisation of the Royal Flying Corps Image", took an interdisciplinary approach to identifying and analysing the promotion of the Royal Flying Corps and the typical British airman's experience during the First World War. A native of Virginia, she enjoys creative writing, content creation, and watching the English Premier League in her free time.

Poster: Against the "mischievous device": The Berlin Blockade as a Case for Collective Defence in the Western Bloc

Abstract

After the defeat of Nazi Germany, the Potsdam Agreement divided Germany amongst the four Allied Powers: the United States, the United Kingdom, France, and the Soviet Union, with Berlin also being divided into occupation zones. Along with concerns of economic rebuilding and decolonization in many European colonial holdings, Berlin became a focal point in both Western and Soviet efforts to align Europe with their respective post-war visions for economic, political, and social structure. Tensions between Western Allies and the Soviet Union arose along the lines, as emphasized by Soviet Foreign Minister Vyacheslav Molotov when he noted, "What happens to Berlin, happens to Germany; what happens to Germany, happens to Europe." These tensions increased with the Soviet Union hindering communications between the Western Bloc and West Germany, especially West Berlin. In June 1948, Joseph Stalin imposed the Berlin Blockade, cutting off all railway, road, and canal transit to Berlin sectors under Western control. In response, British and American officials created a joint airlift operation to provide necessities (such as food and fuel) to West Berliners, which included aircrews from the Royal Air Force, the newly created United States Air Force, the French Air Force, Royal Canadian Air Force, Royal Australian Air Force, Royal New Zealand Air Force, and the South African Air Force. The airlift operations resulted in the blockade being lifted and West Berlin remaining under the control of the Western Allies.

I will discuss how the Berlin Blockade clearly highlighted increasingly deep ideological differences between East and West. Attempted economic cooperation through the Marshall Plan and the 1948 formation of the Organisation for European Economic Co-operation (OEEC) was threatened by the

Soviet Union's Berlin Blockade and heightened tensions emphasized the need for collective defence amongst members of the Western Bloc.

With the Western Union Defence Organization implementing the 1948 Treaty of Brussels, which provided for defence coordination and supply fields for France, the United Kingdom and the three Benelux, initial ideas for collective defence were present amongst the Western Bloc. However, the Berlin Blockade, highlighting increasing tensions with the Soviet Union, highlighted the need for this collective defence organization to be expanded both logistically and through broadening membership. These building blocks lead to the signing of the North Atlantic Treaty in April 1949 and the establishment of the North Atlantic Treaty Organization (NATO), with the United Kingdom serving as a founding member state. British involvement in the Berlin Blockade was crucial not only for Britain's economic rebuilding, but it also served as an attempt to preserve Britain's presence on the world stage as major power. The establishment of a collective defence organization not only provided for global defence coordination, but it also helped strengthen Britain's place in the balance of power. As Churchill emphasized, a special relationship existed between the US and the UK culturally, economically, and military-wise, strengthened by World War Two. The Berlin Blockade, through the common enemy of Soviet Union (and, more generally, communism), cultivated extensive defence cooperation between the British and American forces. This cooperation set a standard in British involvement in collective defence, particularly with the United States, as a key player going into the 1950s, as seen with the increased numbers of shared air bases between the two nations' forces. By aligning itself with a major world power, Britain was able to not only preserve global security, but to also preserve and further develop its own goals for a post-war world. However, this concern for a place in the post-war balance of power would continue throughout the entirety of the Cold War.

Gary Willis

Currently completing a PhD at the University of Bristol examining 'Fields into Factories - The Impact on the Rural Landscape of the Expansion of Britain's Military-Industrial Capacity, 1936-1946'. Previously completed a MRes in Historical Research (p/t), at the Institute of Historical Research, School of Advanced Study, University of London during which his dissertation answered, 'How did British voluntary organisations concerned with the environment balance their commitment to protect it with supporting the Second World War effort?' His research is particularly focused on understanding the environmental impact of conflict, and in particular the impact on the British environment and landscape of Britain's involvement in the First and Second World Wars. Previously published "'An Arena of Glorious Work": The Protection of the Rural Landscape Against the Demands of Britain's Second World War Effort' in the journal *Rural History*. He has presented his research at a number of conferences including the 2019 European Society of Environmental History conference.

Title: Wings Over Britain: The relationship between the RAF and the landscape it flew over, 1939-1949

Abstract

The contribution of the RAF's men, women and aircraft to Britain's Second World War effort is generally well-served by the existing historiography. From an environmental history perspective however, there is a deficit. The British, and in particular, English rural idyll over which RAF fighter and bomber airmen flew was, through Government propaganda, made increasingly emblematic of our national identity. Rural landscapes also however had another purpose specific to the nation's war effort – as a vital resource, utilised for optimum agricultural production, for army training camps, coastal and inland defences – and also for the location of military airfields and new purpose-

built military-industrial sites to manufacture a new generation of defensive and offensive aircraft, and the munitions they required.

By war's end, 450 new military airfields had been constructed, the majority concreted to accommodate heavy bombers, located – necessarily - on flat, well-drained land at a low altitude, which very often equated to valuable agricultural land. In the years following the Second World War, land use by the armed forces, including the RAF, did not return to pre-Second World War levels. A review of armed forces ongoing land requirements in 1947 determined that the majority of military airfields be retained, enabling only a partial restoration to agricultural use of land that had been transformed into military airfields during the war.

What is more undocumented is the other dimension to the RAF's war-time needs: from 1937 onwards a new generation of purpose-built "shadow factories" were constructed. This was a vast undertaking. By 1945 there were 87 factories under the Ministry of Aircraft Production's control, covering 13,000 acres, or 20 square miles, mainly in England; nearly all of these factories were built on green-field sites, operated directly by the State or on a contractual basis with the private sector.

In June 1943 however, the Minister of Aircraft Production, Sir Stafford Cripps, warned that 90% of aircraft plants in England would probably have to be closed after the war. The Government's Board of Trade was tasked with finding alternative uses for the surplus-to-requirements military industrial plant, including many aircraft factories, and by the end of 1946, a total of 262 sites had been leased for post-war non-military use. The major beneficiary of these leasing arrangements was the car industry, as exemplified by the main Spitfire-producing shadow factory at Castle Bromwich, Birmingham, which has been in almost continuous car production since the war and now produces Jaguar cars. My PhD research to date indicates that out of all the sites constructed to build military aircraft for the RAF, and not retained at the end of the war - only one site, at Calgarth, Windermere, was returned to anything like its pre-war rural identity.

Both in terms of the industrial plant where its planes were manufactured, and the airfields from which it flew, the RAF's war-time and immediate post-war needs left an indelible imprint on the country's landscape. My paper would provide an environmental and industrial perspective on this period of the RAF's history.