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'The Forgotten Ones'. Finding and Recruiting the Men on the Ground for the Royal Flying Corps During the First World War

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ABSTRACT
When the First World War began the Royal Flying Corps was just two years old and over the next four years it changed beyond all recognition. To successfully support the Army, the RFC recruited almost 300,000 non-officers, the vast majority for service on the ground and, for most, service in Britain. While their roles were less glamourous than the so-called 'aces' who dominate the historiography, the service would not have existed without them. This article explains how the RFC found multiple ways to attract sufficient manpower to successfully prosecute Britain's first war in the air.

Introduction

The Royal Flying Corps (RFC) ground crew grew from 1,097 men in August 1914 to over 270,000 at the Armistice. As a group, they constituted between 88 and 93 per cent of the total British air force throughout the war.[1] They were vital to the war effort, but the historiography all but ignores their story. While much has been written about recruiting into the armed forces more generally, such works do not focus, or mention only in passing, the recruitment of ground crew into the RFC and RAF.[2] The

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[1]H.A. Jones, *The War in the Air: Being the Story of the part played in the Great War by the Royal Air Force: Volume Six,* (Uckfield: Naval & Military Press, 2002, p. 28, footnote 2. Percentage derived from The War Office, *Statistics 1914-1920 of the Military Effort of the British Empire During the Great War,* (London: War Office 1922), p. 227 and p. 506.

[2]See for example, J. McDermott, *British Military Service Tribunals 1916-1918,* (Manchester: Manchester University Press, 2011); T.Bowman, W. Butler, M.Wheatley, *The Disparity of Sacrifice : Irish Recruitment to the British Armed Forces, 1914-1918,*

term 'Forgotten Ones', used in the title here, comes from a rare book on the subject written by former pilot and later Air Chief Marshal Philip Joubert de la Ferté. This article, drawn from new research, sets out to complement de la Ferte's work and in doing so helps fill the gap in the historiography.[3] It will investigate who the men were, how they came to join the Corps and how the RFC ensured they were sufficiently skilled. Such an exploration can only be made with reference to the complex environment in which the recruitment occurred. Consequently, the article must assess the RFC's efforts against the backdrop of industrial manpower demand. Following a broadly chronological path, the article examines how demand and supply shifted across the war years and how the RFC responded to these changes with a combination of pragmatism and creativity.

The First Men of the RFC

The first men of the RFC, upon its creation in 1912, were recruited predominantly from the ranks of the Army, especially the Royal Engineers who had provided the men of the RFC's precursor organisation the Air Battalion. The discipline of these experienced men proved invaluable in the early chaotic days of the war. Describing the pressures of his first taste of combat accompanied by inclement weather, young air mechanic Percy Butcher looked on the experienced men as father figures. He remembered,

> The gales and the Battle of the Aisne almost coincided so that the fitters never left their work […] This is where the new boys like myself owed so much to the skill and technical knowledge of the experienced men who had transferred from the Royal Engineers.[4]

In the early months of the war, recruiting officers had paid little or no attention to the occupations of men enlisting in the infantry. Consequently, men with applicable skills for technical services, such as the RFC, were 'lost'. In October 1914, it was calculated that engineering trades had seen 12 per cent of their workforce leave to enlist, a figure

(Liverpool: Liverpool University Press, 2020); K. Grieves, *The Politics of Manpower, 1914-18,* (Manchester: Manchester University Press, 1988); I. Beckett, K. Simpson (eds) *A Nation in Arms, The British Army in the First World War,* (Barnsley: Pen & Sword, 2014); H. McCartney, *Civilian Soldiers. The Liverpool Territorials in the First World War,* (Cambridge: Cambridge University Press, 2011); P. Simkins, *Kitchener's Army. The Raising of the New Armies, 1914-1916,* (Barnsley: Pen & Sword, 2014).

[3]P. Joubert de la Ferté, *The Forgotten Ones: The Story of the Ground Crews,* (London: Hutchinson, 1961).

[4]P.E. Butcher, *Skill and Devotion: A personal reminiscence of the famous No. 2 Squadron, Royal Flying Corps,* (Hampton Hill: Radio Control Publishing, 1971), p. 32

that would rise to 20 per cent by July 1915.[5] This rush to enlist men was understandable given that the focus of the War Office was firmly on the recruitment of the infantry. Lacking direct orders, Sir Hugh Trenchard's biographer Andrew Boyle, claims that initially Trenchard and Deputy Director of Military Aeronautics, Sir William Sefton Brancker, took matters into their own hands. They opened a recruitment centre 'in the West End of London fixing pay rates as high as those offered to the best army tradesmen.'[6] The 10/- a day offered was 'the special rate sanctioned for the Army Service Corps in an emergency.'[7] The scheme proved a distinct success, capturing some of the most skilled tradesmen available.

In its recruitment literature, the RFC was very clear about the professions of the tradesmen it sought. They were listed at length in materials provided to recruiting officers and can also be found advertised on posters and in newspaper advertisements. Midlands motor mechanic James Gascoyne was one man who responded to a poster. He had never so much as seen an aeroplane and laboured under the misapprehension that he would soon be flying. This was not to be the case, though his skills were just what the RFC required and he was promptly sent to France not as a pilot but as a motor mechanic. He fondly recalled the excited and thankful French locals showering his lorry with gifts. So grateful, he claimed tongue-in-cheek that he believed the lorry had more wine onboard than spares when he reached the airfield.[8]

Motor fitter Samuel Saunders responded to a newspaper advertisement. In his case, an October 1914 Dublin newspaper called specifically for mechanics.[9] He was told to report to his local recruitment office at 10 a.m. sharp. In his naivety, Saunders expected this would be a personal appointment and expressed comic incredulity on discovering queues 3-4 men wide and half a mile long containing men seeking to join all three services.[10] Victor Utting, an 18 year old piano shop apprentice, also saw an advert in a newspaper, in this case encouraging men to join and train as wireless operators.[11]

Initial recruitment materials stated that men needed to be 18 to 30 years old and 5'2" or over tall. However, that men who failed to conform to these standards often joined is hardly surprising when an accompanying statement to the recruitment conditions read, 'Candidates not in all respects eligible to physical standard, but otherwise

[5]Jones, *WITA, vol 6,* p. 58.
[6]A. Boyle, *Trenchard: Man of Vision,* (London: Collins, 1962), p. 118.
[7] Ibid.
[8] Imperial War Museum (Hereinafter IWM) Sound Archive 16 - James V Gascoyne.
[9] IWM Sound Archive 292 Samuel Saunders.
[10]Ibid.
[11]IWM Sound Archive 9759 Victor Utting.

qualified, may be specially considered for enlistment.'[12] By way of example, an unnamed civilian was sent a rejection letter dated 1 November 1914 by RFC recruitment officers. In it, they tactfully told him that he was too old and had 'no prospect of employment with the RFC'. That was unless he could 'give particulars of very special qualifications.'[13]

In other words, the RFC would be brutally pragmatic regarding recruitment. Their principal concern was always the skillset. Age and height were and would remain strictly secondary priorities. When recruitment was relatively straightforward during the first two years of the war, standards could afford to be more stringent. Then, as recruits became more challenging to find, they were often relaxed. Ernest Humberstone, for example, was rejected by the RFC in 1914 when his chest measurement failed to reach a satisfactory level.[14] He returned in 1916 to less exacting tape measures in 1916 and was accepted. The RFC also recognised that ground crew fitness levels need not be as onerous as for the infantry. Such flexibility opened up a pool of men rejected by the infantry. For example, James Seignior was turned down by the infantry because he was not physically fit enough and encouraged to join the RFC who, he was told, were 'less interested in physique'.[15] Service records throughout the war demonstrate that many men who joined the RFC did so having been wounded or declared unfit for further service in the infantry.

The *qualifying trade test* was a standard RFC recruitment feature used throughout the war. As the title suggests, it aimed to ensure that a man was proficient in his trade. However, they were also used early in the war to find experts who became immediate or near-immediate NCOs in the rapidly expanding service. In December 1915 the RFC opened a dedicated testing centre at Chelsea Barracks.[16] Men sent here for trade tests were given a certificate that could be presented to recruitment officers to help smooth their application. Trade tests often varied in form. Ernest Humberstone, a trainee electrician, was sent for his trade test on a platform fitted to the back of a Crossley tender. He had to name many tools for his examiners before explaining their application. With this done, he went on to become a storeman.[17] Percy Butcher remembered his tests with the appropriately named supervisor, Mr Measures. Butcher's tests involved making a hexagonal ¼-inch nut from a 3-inch metal bar. With

[12]'Royal Flying Corps' in *Flight Magazine* (No23, vol IV, June 8, 1912, p. 510).
[13]The UK National Archive (hereinafter TNA) AIR 1/366/15/231/6 - Directorate of Military Aeronautics' Records – Vol. VI.
[14]IWM Sound Archive 22 Ernest Humberstone.
[15]IWM Sound Archive 34543 James Seignior.
[16]H.A. Jones, *The War in the Air: Being the Story of the part played in the Great War by the Royal Air Force: Volume Two,* (Uckfield: Naval & Military Press, 2002), p. 289.
[17]IWM Sound Archive 22, Ernest Humberstone.

these tests complete, he was shown to a Crossley tender. After exercises testing his reversing skills, he was asked to drive his instructors through Farnborough to Aldershot and back. His driving skills impressed more than his metal work, and he became a driver.[18] Dubliner Samuel Saunders recalled a two-stage process. He first had to pass a verbal test before he was allowed to take a practical one – an initial screening element introduced to stop examiners from wasting their time.[19]

Finding Tradesmen Comes Easily

Throughout the first eighteen months of the war, the RFC received far more civilian applications than it needed. For example, Herbert Dodman of the Isle of Wight received a letter in response to his application advising him that 'recruiting for the Royal Flying Corps is open in the London area only to a limited number of first-class tradesmen.'[20] He was warned that any trip to London for a test and interview would be at his own expense. If he was not already suitably discouraged, a hand-written personal message was appended stating, 'Only men possessing a high standard of technical ability will be accepted.'[21]

Some men went to great lengths to join. William Berry made numerous applications before being accepted in October 1915. He recalled he was:

> On constant watch for the opportunity to join the Corps, but whenever the RFC started recruiting within five minutes, it was shut again. They had no problem getting high-calibre men who knew their trades.[22]

Berry, an export clerk, eventually pleaded his case with a sympathetic recruitment officer who allowed him in as a cook on hearing that he had once worked as a chef.[23] It is this 'proficiency' that is on his attestation form. Berry's experience of difficulty entering the Corps is borne out in advertisements in the press. One of numerous examples is found in the *Dundee Courier,* where the advertisement states the following:

> The Royal Flying Corps is now open for a limited number of highly skilled tradesmen. Do Not Delay, or you will be "Too Late".[24]

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[18]Butcher, *Skill and Devotion: A personal reminiscence,* p. 15.
[19]IWM Sound Archive 292 Samuel Saunders
[20]TNA AIR 1/381/15/231/22 *Directorate of Military Aeronautics' Records – Vol. XXII.*
[21]Ibid.
[22] IWM Sound Archive1 William Berry.
[23]Ibid.
[24]'The Royal Flying Corps', *Dundee Courier,* (14 January 1916, p. 5).

Alongside civilian applicants the Commander of the Administrative Wing, John Salmond, and his Chief Staff Officer, Guy Livingston, devised a scheme to 'comb out' skilled tradesmen from non-technical units of the Army. These men also had the advantage of some military experience and associated discipline. Once identified, and if willing to join the Corps, these potential transferees were subject to trade tests by one of many RFC recruitment parties established in France to vet them. On 22 December 1915 for example, Captain MacSweeney of the Directorate wrote to the Administrative Wing giving details of eighteen men returning from the British Expeditionary Force to join the RFC.[25] These included men like Private A. Nutt and Rifleman C. Gillings. Nutt was a fitter by trade and had been in France since May 1915 with the 1 Battalion Somerset Light Infantry. Gillings, already 41, was a South African War veteran with the Rifle Brigade who had re-joined his old unit in April 1915. He entered the RFC in his pre-war occupation as a coppersmith.

It should be noted that the flow of men was not entirely one-way. The expanding munitions industry also sought skilled men and appealed to the RFC to release those with industry-specific experience. Appeals are evidenced in a letter to the Directorate asking for details of men who had previously worked for Vickers Ltd before the war. On this occasion, in December 1915, six RFC men were identified. However, the men were given a choice as to whether they wished to remain with the RFC or return to England as munitions workers. In this event, only 1/AM Kingsworth opted for release from the RFC.[26] In a further example, in February 1916, 2/AM Edmund Archer was approached about a return to England to work on munitions production with Victor Motors in Kent. In internal correspondence, Major Powell at the Directorate says that Archer will move 'if he is willing', again showing that men had the agency to resist transfers.[27] Archer's service record is unbroken, so he evidently opted to stay with the RFC.[28]

New research supports the assertion that recruitment was relatively straightforward in 1915. Despite more than doubling attestations from 14,344 to 29,615 between 1914 and 1915, the RFC found men in their target trades more successfully. In 1915, 76% of the men whose service records listed a trade matched those in recruiting materials.[29] This proportion was some 10% higher than in 1914 and was more significant than in the two years preceding the war. The most significant trade

[25]TNA AIR 1/381/15/231/22 - *Vol. XXII.*
[26]Ibid. AM refers to the rank Air Mechanic. The number refers to first class, second class etc.
[27]Ibid.
[28]https://www.findmypast.co.uk/transcript?id=GBM%2FAIR79%2F33148. Accessed 18 January 2024. Record of E. Archer.
[29]Calculated from searches of over 20 trades plus associated variants.

recruited is, at face value, surprising. There were 2,281 clerks recruited in 1915, more than any other trade, including carpenters and joiners (1,741) and fitters and turners (1,562). Such men were actively sought as well-educated and easily trainable; in many cases they also had organisational skills and some modest man-management experience. As the war progressed there would be two clerks per flight to record flying times, clerks in workshops to keep a tally of tools, and up to a dozen clerks in each store's depot accounting for issues and returns.[30]

Another reason for the relative absence of strain on the recruiting system was that casualties remained very light. Consequently, the demands for extra men from France were relatively modest. In February 1915, for example, just 44 men were requested to replace casualties and support growth. The only stipulation to the request was that the men sent include six coppersmiths, four riggers and five clerks for Headquarters.[31] In comparison, two years later, in 1917, the corresponding monthly request would be for 576 men.[32]

However, even at this early stage, the RFC realised that even skilled men needed training in aeroplane specifics. Early training in squadrons alongside experienced pre-war men was proving insufficient. The solution arrived at by Salmond and Livingston involved an outsourced system whereby fitters, riggers, camera repairers, drivers and wireless operators were sent to suppliers and colleges to be trained in aircraft specifics. The outsourcing scheme, which included more than fifty specific arrangements, operated throughout 1915 and 1916, training thousands of men and proving an invaluable solution while an in-house training system was built in parallel.

Working Harder to Find Those Needed

As 1916 opened Trenchard was happy with both the manpower levels and the recruitment process. He wrote to the Administrative Wing in London to praise Lt. Col. Charlton for his 'excellent organisation' given:

> The various large drafts which have been sent overseas … have invariably arrived on time, in good order and accompanied by clearly made out and accurate nominal rolls giving all the information necessary about each mechanic.[33]

[30]TNA AIR1/122/15/40/137 *Schools of Aerial Gunnery & Fighting.*
[31]TNA AIR 1/368/15/231/8 *Directorate of Military Aeronautics' Records – Vol. VIII.*
[32]TNA AIR1/1288/204/11/42 *Personnel - Requirements in for the Expeditionary Force – January to June 1917.*
[33]TNA AIR1/1288/204/11/43 *Requirements of Personnel by trades for the Expeditionary Force - February 1915 to June 1916.*

During 1916 there was a further doubling of attestations to 58,805 and at face value the RFC was similarly successful in finding numbers of skilled men. The proportion of men in target trades was unchanged in 1916 at 76%. However, the RFC had to work harder to make this happen.

They sought more creative ways of attracting men to the Corps. One of the best examples of this was via the use of cinema. The Corps took advantage of the relatively new medium and put on patriotic pictures at cinemas nationwide with increasing frequency. An early example was the screening of '*The Eyes of the Army*'. This propaganda piece was shown before the main picture, '*Far From the Madding Crowd*,' in April 1916.[34] In time, screenings of RFC pictures were accompanied by a presentation by an officer or senior NCO who had returned from France. When the film or presentation ended, recruiting officers swooped and attempted to recruit available men.

In January and May 1916, the Military Service Acts introduced compulsory military service, now better known as conscription, first for single men and then for all men. Some men chose to enlist in the RFC in a bid to avoid being drafted into the infantry. Hubert Harrison, who was 25 in 1916, had a few years of experience in a building yard when he was younger. During this time, he learned many aspects of joinery, the experience he successfully used to join the RFC as a carpenter.[35] Norman Bates, a 19 year old plumber, also opted to use his trade experience to apply for the Corps, and his metalwork abilities allowed him to enlist as a tinsmith.[36] Both specifically joined the RFC to avoid a potential infantry draft. John Boon had signed up under the conscription precursor Derby Scheme in late 1915 but continued his employment as a telephone linesman at the General Post Office for another year. A driven man from a poor background, he had attended night school to gain City & Guilds qualifications. What makes Boon's recollection of joining the RFC just after Christmas in 1916 interesting is that it signifies a subtle but significant change had taken place. He was *assigned* to the RFC and given no choice in the matter. His technical background and employment meant his drafting to a technical service was mandatory.[37]

While the introduction of conscription was in many ways an advantage for the RFC, as summer advanced, it was becoming apparent that finding skilled civilians who could pass trade tests had become significantly more challenging. Competition for resources was intensifying. In July 1916, Air Board minutes captured the situation thus:

[34]'The Eyes of the Army', *Dundee Courier* (20 April 1916, p. 1).
[35]IWM Sound Archive 10916 Hubert Harrison.
[36]IWM Sound Archive 10262 Norman Bates.
[37]IWM Sound Archive 9476 John Boon.

> The Air Board had written to the War Office regarding the return of skilled workmen from the Army. Meanwhile, the War Office were writing to the Ministry of Munitions with a view to obtaining skilled labour for enlistment in the Army. The Army Ordnance Corps were much in need of skilled artificers. It appeared that there was a general demand for skilled labour in excess of the supply available from all sources.[38]

Demonstrating that the RFC was not immune to these manpower allocation challenges, the removal of sixteen workers from Rolls Royce for service in the infantry in February 1917 stopped all deliveries of magnetos to the RFC even though aeronautical production was supposed to be exempt from such moves.[39]

To produce a functioning service the RFC recognised that it could either recruit men with the necessary skills or train unskilled men to proficiency. Finding a suitable trade-off between the two options would become a perennial challenge as the war progressed. As Livingston commented after the war, 'we were trying to turn butchers and bakers into technical tradesmen' and that with growth, 'the efficiency of the technical personnel would very rapidly deteriorate unless some new method' of obtaining men could be found.[40] Alongside the outsourced training solution, the Corps' first training school, which was to become the School of Technical Training, opened near Reading in July 1916. Accompanied by other specialist schools for wireless and photography, these schools began to take over and centralise the men's training.

Manpower Shortages

In Britain in 1917 the demand for skilled manpower now significantly exceeded the supply. In January, the Government stated that 100,000 men needed to be released from previously protected industries in agriculture, mining and munitions to meet the demands of the Army. A Government Committee was formed to discuss the issue and to confer with Sir Douglas Haig. Their March 1917 report increased to 330,000 the men that would need to be found from protected industries between March and July. After fierce opposition from industry, further discussion took place, and a compromise of 250,000 was agreed upon. The announcement immediately led to large-scale industrial unrest as plans, which included large-scale labour dilution, were resisted.[41] When the scheme's target date of July 1917 arrived, only 18,000 men had been released from munitions industries instead of the 124,000 targeted as part of the

[38]TNA AIR 2/127/B12062 *Policy for Development of Canadian Air Service.*

[39]K. Grieves, *The Politics of Manpower, 1914-18,* (Manchester: Manchester University Press, 1988), p. 108.

[40]G. Livingston, *Hot Air in Cold Blood,* (London: Selwyn & Blount, 1928), p. 89.

[41]Labour dilution called for the substitution of skilled men with unskilled men.

250,000 ambition.[42] To provide additional complications, the German decision to declare unrestricted U-boat warfare led to a renewed shipbuilding programme, which required an unplanned 80,000 extra workers.

Amid these issues came a July 1917 decision to double the size of the RFC. Thus, with Britain facing significant labour supply issues, the Corps also needed an additional 17,000 pilots, 5,500 observers, and 61,000 mechanics. Though the RFC's Director of Recruiting stated:

> I feel reasonably confident that we will find all the men required for the RFC, but it is quite certain that this large expansion of the flying corps personnel will affect infantry drafts.[43]

But he was only considering front-line personnel. The extra squadrons would need thirty-five new aerodromes, and each aerodrome would need to be resourced. Extra squadrons meant extra aircraft. Producing these extra aircraft would require 25,000 skilled men, 58,000 unskilled men, and 70,000 women. The challenge was enormous.

Admirably, but to little effect, the RFC attempted to find some internal economies to help the situation. In July 1917, the War Office appointed an RFC Dilution Officer whose duty was to examine the air service stations at home and report on possible savings in skilled labour. This effort was expanded the following month and seventy air stations were eventually visited. Unfortunately, the final report dated 16 November 1917 concluded the opposite of what was desired. Rather than finding savings it reported that skilled fitters were already dangerously thin on the ground and recommended recruiting 30,000 women to help fill immediate shortfalls.[44]

By mid-1917 the RFC had accepted that unskilled men were required to improve the manpower situation. Initially this had proved to be hard to swallow. An internal memorandum as late as February 1917, for example, stated that the RFC,

> Is prepared to accept raw recruits, provided they are not of trades in which they will require to go through a course of instruction before employment in the RFC. That is to say, any raw recruits drafted must be sufficiently skilled in their trades to carry out the work required of them immediately.[45]

[42]Jones, *WITA, vol 6,* p. 65.
[43]Ibid.
[44]Ibid.
[45]TNA AIR 1/1288/204/11/42 *Personnel - Requirements.*

Essentially, this gave nothing and was an untenable position. Those men who attested from target trades fell from 76% in 1916 to 68% in 1917. Though the percentage reduction does not sound material it was on a much larger base of attestations and the number of untrained men entering the service was significant. Unskilled labourers doubled to over 2,000. More than 800 salesmen, 600 painters and decorators, and 500 grocers were among the men joining the ranks and requiring training from scratch. An August 1917 advertisement sums up explicitly how things had changed when recruiting tradesmen. For the first time, advertisements looked for 'skilled or unskilled men of almost any occupation'.[46] Age requirements, too, were explicitly relaxed, and advertisements included comments such as, 'men of military age and over age accepted'.[47]

The expansion of the RFC was second only to shipbuilding in the government's priorities, and it was given an unprecedented opportunity to recruit men from previously protected industries. By this stage of the war, most skilled men still at home held what was known as the Red Card – officially Army Form 3476A – that was granted under the Schedule of Protected Occupations.[48] It allowed men in protected industries, such as war production or munitions, to avoid being drafted via conscription. The RFC however, was allowed to call on such men, though it could not force them to join. Newspaper advertisements in 1917 confidently assured men holding the Red Card that they could have it withdrawn if they so wished. As an incentive, adverts stressed that,

> Special rates of pay prevail in the technical Corps. They are higher than those in the infantry [and] it is hoped that large numbers of skilled men will embrace the opportunity of placing their skill at the disposal of the Nation with the certainty that it will be employed to the best advantage.[49]

While digging deep for men in Britain, the RFC also turned to Canada in 1917 to provide some of the answers to their recruitment needs. Canada provided 4,971 air mechanics between March and November 1917, receiving applications from 13,844 men.[50] As can be judged from the relatively low conversion of applicants to recruits,

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[46]'Wanted at Once', *Exeter and Plymouth Gazette,* (10 August 1917, p. 4); and 'Royal Flying Corps', *Dundee Courier,* (21 September 1917, p. 1).
[47]'Royal Flying Corps', *Nottingham Evening Post,* (14 September 1917, p. 2).
[48]Hansard, (HC Debate, 11 June 1917, vol 94, c586).
[49]For example, 'Artificers Wanted, *Daily News, (London)* (23 June 1917, p. 4) & 'Artificers Wanted to Serve in the Royal Flying Corps', *Manchester Evening News,* (24 September 1917, p. 2)
[50]TNA AIR 2/166/RU4527 *General Statistics of RAF in Canada and Memo on the Development of the RFC in Canada.*

recruitment in Canada was not straightforward. Wage inflation presented a particular challenge for the RFC and resulted in 6,418 men rejecting the RFC on the grounds of insufficient inducements.[51] While RFC rates were 15 per cent higher than the Canadian Expeditionary Forces (CEF) rates for unskilled men, this proved insufficient to attract the best tradesmen.

Canadian Medical Boards proved a further problem for the RFC. The CEF's policy was only to enlist men of Category A fitness. Consequently, the RFC found that 'Boards absolutely refused to pass men for us if other than A.'[52] Though frustrating for the RFC, the Medical Boards were not simply being difficult. Such intransigence can be understood given that if a man was found to be unfit for service on arrival in England, the Board was held responsible for the cost of returning him to Canada. The RFC requested that the British system of A, B and C be adopted for their recruits. Though eventually successful, the debate 'caused considerable delay and had to be carefully handled to avoid friction.'[53]

Between March and August 1917, some 400 men a month were recruited in Canada. Then, on 29 August, the RFC was aided by the Canadian decision to introduce the Military Service Act. The act allowed the Government to conscript men aged 20 to 45. As in Britain, the decision helped swell RFC numbers as men enlisted in the RFC to avoid conscription into infantry units. Numbers enlisting jumped to 691 men in September 1917 and almost doubled to 1,261 in October.

That month, the RFC in London approached Pathé Freres Ltd to create recruitment material for them. The company filmed at nine RFC locations, and commanding officers were asked to,

> Issue instructions for every assistance to be given to the cinema operator, and that he should be allowed considerable latitude in his taking of his photographs as these will be censored later.[54]

The resulting thirteen-minute film was then used in cinemas to aid recruitment in 1918.[55] It is not surprising that even internally produced films were slick. They were often produced by Edmund Distin-Maddick. Distin-Maddick had previously been an officer in the Directorate of Military Intelligence at the Home Office where he assisted in creating propaganda. He had been in charge of cinematographic film production on

[51]Ibid.
[52]Ibid.
[53]Ibid.
[54]TNA AIR1/129/15/40/203 *Cinema Propaganda for R.F.C.*
[55]IWM 870 *Basic RFC Training for Pilots in Britain, 1917.*

the Western Front and claimed to have been involved in the famous film *The Battle of the Somme* before transferring to the RFC.[56] An example of how sophisticated the combined propaganda and recruitment evenings became can be found on 30 January 1918, when Lt. Alston presented '*A Pilot's Experiences on the Western Front*' at the Kinnaird Hall, Dundee. Part of a national tour, his presentation of '100 thrilling lantern slides' was accompanied by the band of the Royal Garrison Artillery.[57]

Alongside these initiatives, in mid-1917 the RFC began actively recruiting boys and women in Britain.[58] In the case of 'boys', these young men were required to be between 15½ and 17 years of age. They would undertake an apprenticeship in woodworking, engineering or sail making if selected.[59] Harold Eager was one such 17 year old. Though he had been doing well at school, his family had been unable to afford to send him to college and at fourteen he was working two jobs at a barber shop and at a butchers. By the time he was sixteen, his stepfather had got him a job at a dockyard as a messenger boy. Harold saw the advertisements for this new scheme and joined as a 'boy' in November 1917. He 'learned a trade', became a rigger and transferred to the RAF on his eighteenth birthday in July 1918.[60]

By the time Eager joined, the scheme was going well. A 6 October 1917 RFC memo reported that:

> The experiment of enlisting boys into the RFC […] and of training them in one or other of the Flying Corps trades has already proved most successful. Boys have come forward freely, are of an excellent type and are proving an extremely valuable aid to our work.[61]

Thus, the RFC successfully enlisted young men who while learning a trade were also helping to ease the RFC's manpower crisis. At this stage, the RFC also reversed its attitudes toward using women in the service. In September 1915 Miss Enid Alderson, a 22 year old Australian who lived in Richmond in Surrey, attempted to join the service. Though her letter does not survive, the RFC's response to her request does. In it she was told concisely that 'there is no position in the RFC in which a lady could

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[56]P. Hodgkinson & J. Clarke, 'The Great War Dead of Norwood Cemetery' in *Stand To! The Journal of the Western Front Association,* (Number 126, April 2022).
[57]'Royal Flying Corps, Air Fighting in France', *Dundee Courier* (30 January 1918, p. 1).
[58]TNA AIR 1/1288/204/11/42 *Personnel – Requirements.*
[59]'Required for the Royal Flying Corps', *Rochdale Observer* (12 May 1917, p. 2); and 'Wanted, Fifteen boys for Royal Flying Corps', *Coventry Evening Telegraph,* (11 June 1917, p. 3).
[60]IWM Sound Archive 16310 Harold Eager.
[61]TNA Air 2/12/87/Labour/38 *Employment of Boy Labour 1917.*

be employed, and it is, therefore, regretted your application cannot be entertained'.[62] Two years later, it was a very different story. Female recruits were first used in February 1917 when women began to be recruited as drivers. Later they were recruited in growing numbers to carry out an increasing number of roles including those in repair shops and at service depots.

When the Royal Air Force (RAF) was formed in April 1918, it became necessary to constitute a separate corps for women, the Women's RAF (WRAF), which offered women the option to transfer from the existing air arms of the Women's Army Auxiliary Corps (WAAC), the Women's Naval Service (WRNS) or the Women's Legion. By the end of April 1918, 67 officers and 6,738 other ranks transferred from the WAAC, 46 Officers and 2,821 other ranks from the WRNS, and 496 drivers from the Legion.[63] At the Armistice, some 25,000 women were serving in the WRAF.[64] Though it had been stipulated that none should serve overseas, an exception was made for some women employed at aircraft repair shops at Rouen who had been posted there as members of the WAAC.

Motivations for women joining were as varied as for men. Florence Parrott joined the WAAC and later transferred to the WRAF driven by a desire for revenge. She had been working as a wine waitress at Liverpool Street Station in London when a bomb from a Zeppelin caused damage to the station and lightly wounded her. Parrott joined at the Connaught Club after an interview, which consisted principally of an exercise to discover what applicable skills she had. Having had some previous cookery experience whilst working as a young housekeeper, she joined as a cook and served with the Officer Training Corps at Denham.[65] Dorothy Bairfield, who had been a nurse with a military family, joined the WAAC in 1917 in a desire to do her bit and became a waitress at an airfield at Hastings. Like the male recruits, she enjoyed the feeling that she was working for a 'unique body' and chose to transfer to the WRAF in 1918. She served in the officer's messes on airfields at Shorncliffe and Uxbridge to the war's end.[66]

Outside the RFC, the importance of these women and boys to the aircraft industry cannot be overstated. In August 1916 the industry employed some 12,600 women and 6,500 boys. These numbers accounted for 32% of the workforce. Just fifteen months later, in November 1917, there were 52,700 women and 17,100 boys, 40% of

[62]TNA AIR 1/374/15/231/15 - *Directorate of Military Aeronautics' Records – Vol. XV.*
[63]Jones, *WITA, vol 6,* p. 73.
[64]Ibid.
[65]IWM Sound Archive 8857 Florence Parrott.
[66]IWM Sound Archive 3454 Dorothy Bairfield.

employees. Numbers continued to grow, and by the war's end, 126,600 women and 33,000 boys would equate to 46% of the industry's workforce.

All Change. Recruitment in 1918

The sheer scale of ground crew operations in Britain in 1918 was formidable. There were twenty-two aircraft acceptance parks, two Marine Acceptance Depots, thirteen Repair Depots, ten Stores Distributing Parks, eight Stores Depots, as well as a Balloon Acceptance Depot, a Transport Issue Park, and a Transport Depot.[67] The store depots alone employed some 8,000 men and a similar number of women.[68] The RFC/RAF recruited almost 111,000 men during the final eleven months of the war, a 44% increase on those recruited in the whole of 1917. Nevertheless, of 1918 recruitment, Livingston recalled that 'the human material was, of necessity, deteriorating in quality'.[69] While there is no evidence to show that the workmanship of the men in 1918 was inferior, there were essential changes in the type of man being recruited in the last year of the war. A functioning training system allowed the Corps to recruit and train unskilled men rather than relying on their having had relevant civilian occupations. Consequently, the recruits of 1918 were much less likely to come from an advertised trade than at any point in the war. They were also more likely to be much younger or older than those recruited earlier. The men themselves were physically smaller than they had been historically. The RFC/RAF had to widen their geographical net in new ways to find such men.

While some men continued to transfer from the infantry, they were comparatively few compared to previous years. By mid-1918, any attempt to target specific trades or recruit from a narrow age group had been abandoned.[70] Even men who had been previously rejected were asked to reapply.[71] Despite skill shortages and generalised advertising campaigns, the proportion of men recruited from trades listed in recruitment materials was still 62% in 1918. While this is lower than the 76% in 1915 and 1916, it is still a testament to the skill of RFC/RAF recruiting officers. However, as more men joined in 1918, many more unskilled men were recruited in absolute terms. By now, however, the RFC/RAF training system was enormous. Some sixty-five schools had opened to train pilots and men in the intricacies of their roles, allowing unskilled and semi-skilled men to come up to speed more quickly.

[67]TNA AIR 1/452/15/312/26 Vol. II *Aerodrome Board. Quarterly survey of Parks and Depots of the RAF (U.K.).*
[68]TNA AIR1/683/21/13/2234 *Precis of Training, RFC and RNAS.*
[69]Livingston, *Hot Air,* p. 113.
[70]'Volunteer Immediately', *Coventry Evening Telegraph,* (6 July 1918, p. 1).
[71]'Irish Recruiting Council', *Londonderry Sentinel,* (31 August 1918, p. 2).

	1914	1915	1916	1917	1918
Total Recorded	6,464	13,699	26,626	30,062	47,257
Occupation	%	%	%	%	%
Fitter/Turner	13	11	10	9	17
Clerk	10	17	13	18	14
Mechanic/Engineer	16	10	7	8	9
Carpenter/Joiner	12	13	26	14	6
Driver	4	7	6	6	4
Electrician	3	5	3	3	3
Sailmaker	1	3	4	3	2
Draughtsman	1	1	1	1	2
Warehouse/Storeman	1	1	2	2	1
Instrument Repair	1	1	1	1	1
Wireless	1	3	1	1	1
Photographer	1	1	2	1	1
Other advertised trade	3	2	3	2	2
Total % in Advertised Trades	**66**	**76**	**76**	**68**	**62**
Labourer	14	7	4	7	13
Students	-	1	1	3	4
Farmer	1	-	-	1	2
Salesman	1	1	3	3	2
Painter/Decorator	2	1	2	2	1
Other Non-advertised	12	12	15	16	16
Total % in Non-Advertised Trades	**34**	**24**	**24**	**32**	**38**

Table 1: Attestation Occupations of Enlisting RFC/RAF Men[72]

Table 1 contains the records of all men where attestation occupations were listed. As shown, more unskilled labourers (13%, 5,930) joined than all classes of employee bar fitters, turners and clerks in 1918. In 1915 and 1916, just 100 students were recruited from schools and universities. In 1918, this number rose to 1,747. There are also sharp rises in teachers, butchers, farmers, grocers, painters, salesmen and miners in the latter part of the year.

The men themselves were also quite different, as the RFC/RAF accepted men younger and older than their previous target range. As shown in Table 2, based on a sample of

[72]Using those attestation records where a trade is listed.

random attestations where age is known, 78% of the men recruited in 1918 were either 20 or under or over 30, compared to 33% in 1914.

	1914	1915	1916	1917	1918
	%	%	%	%	%
Under 20	11	29	19	36	44
21-25	46	44	31	17	17
26-30	21	16	25	18	5
30+	22	11	24	29	34
Under 20 or 30+	33	40	43	65	78

Table 2: Percentage Age at Attestation, a sample of 1,000 Men.

As stated earlier, from mid-1917, the RFC found that:

> It is possible to employ a considerable number of boys in the RFC in substitution for full-grown men. … The more boys we can take in … and usefully train, the easier will the solution of this very difficult problem become.[73]

A manpower return dated 13 July 1918 shows that 4,900 boys had been recruited.[74] While with contemporary eyes, one may expect this total of 4,915 boys to compare to student recruits in Table 1, they do not. It must be remembered that most of these boys were at work when they joined the RAF. Therefore, they transferred to the Corps from other trades rather than coming from schools and colleges. None of these youngest recruits was allowed to serve overseas before they reached 18. Thus, they were distributed across almost 20 RFC establishments in Britain, including Training Depot Squadrons, training schools, store hubs and depots.[75]

It was not just the young that the RAF were recruiting in 1918. Harold Eager, the former 'boy' recruit mentioned earlier, recalled that by mid-1918, 'old chaps, 55 and that' were joining.[76] The Military Service Act (No.2), effective 2 May 1918, raised the military age to 51, the explicit intention being for these older men to replace younger

[73]TNA AIR 2/12/87/Labour/38 *Boy Labour.*
[74]TNA AIR 2/87/RFC/642 *Sanction for the Employment of boys in R.F.C.*
[75]Ibid.
[76]IWM 16310, Eager

ones in support or garrison duties.[77] Like the boy recruits, such men were guaranteed service in Britain, and it was men like Eager who headed to France.[78] The RAF's explicit call for older men to enlist met with a healthy response. There were many examples of men over 50 joining. Tasmanian Bannatyne Macleod enlisted as a 58 year old civil service pensioner. He had previously worked in the Indian Civil Service and married in Bangalore an incredible 32 years before the war broke out. He enlisted on 8 May 1918 as a batman. Sixty one year old Harry Osborn enlisted as a labourer from Salisbury and had served in the Army Medical Corps since October 1916. Oborn, though, is not the oldest recruit this research identified. Thomas Cox was born on the 20 March 1856 in Shrewsbury, and his enlistment form notes his age as 62 ¼. He enlisted in June 1918 and was a labourer with various balloon sections. As noted, men joining at this age were generally guaranteed home service as they fell outside of the Military Service Act. However, men joining the RAF would, at any age, still be offered the chance to serve overseas.[79]

Partly due to the old and young recruits, the physical stature of the men enlisting in 1918 was also very different from earlier in the war. Using the same sample as above for age, this research recorded men's chest and height measurements across the war years. The results show that men were, on average, 2" shorter in height in 1918 - 5'6" on average – compared to 1914 and 3" less broad around the chest at 32". Whilst such differences might not sound significant, as the statistics below show, many men who would have been deemed physically unacceptable earlier in the war were now recruited.

	1914	1915	1916	1917	1918
	%	%	%	%	%
Percentage of men enlisting under 5'3" height	4	7	11	15	17
Percentage of Men Enlisting with Chest Measurement of 30" or less	1	5	7	15	17

Table 3: Percentage of Under Size Men Enlisted by Year

[77]J. McDermott, *British Military Service Tribunals 1916-1918,* (Manchester: Manchester University Press, 2011), p. 28.
[78]IWM 16310, Eager.
[79]'Not Too Old at Fifty' *The Halesworth and East Suffolk Advertiser,* (2 April 1918, p. 1).

The 1918 recruits were then, increasingly from outside traditional-age groups and physically smaller than their earlier counterparts. They also came from different regions than those who had joined before them.

The southeast of England had been the traditional recruiting ground for the RFC since its inception in 1912. The proportion of recruits from the southeast had increased to a peak of 55% in 1916. Of course, birth location does not equate directly to enlistment location. Men may have moved locations for work or even to the South East to join the force. By 1918, other regional recruitment centres had also opened. However, even with those caveats, the 1918 change is marked. Table 4 is compiled using all attestation records where a location is known. Though still up in nominal terms, the proportion from the South East collapsed to just 26% of recruits in 1918. Scotland and Ireland, which had accounted for only 6% of recruits in 1917, jumped to 16%. There were also increases in men from northern counties and the Midlands.

	1914	**1915**	**1916**	**1917**	**1918**
Number of Records	10,498	16,381	22,315	25,434	84,153
	%	%	%	%	%
South East	35	48	55	45	26
North	26	19	18	21	25
Midlands	15	12	10	13	19
Other	10	11	11	13	10
Total England	**85**	**90**	**93**	**92**	**79**
Scotland	8	5	4	5	9
Ireland	4	2	1	1	7
Wales	3	3	2	2	3
Total Other Great Britain	**15**	**10**	**7**	**8**	**19**
Overseas	0	0	0	0	2
Total	**100**	**100**	**100**	**100**	**100**

Table 4: A Geographical Widening of the Net by Year

Ireland accounted for only 253 attestations in 1916, a year marked by the Easter Rising in Dublin. In 1918, the RFC adopted a particular and subtle change of focus in their advertisements seeking men in Ireland. They now required men 'for the maintenance of aeroplanes employed on the destruction of Zeppelins' rather than for service in

France.[80] Nor was this the only 'revenge' focused bid to attract recruits. In May 1918, the RAF advertised for 5,000 recruits to help 'our Royal Air Force keep on bombing Germans'.[81] The fact that the RAF was an independent service and no longer part of the Army also assisted recruiters in Ireland. As Bowman, Butler and Wheatley note in their discussion of Irish recruitment in *The Disparity of Sacrifice*, 'the RAF was the service of choice for recruits in late 1918.'[82] So great was the response to advertisements in Belfast that an appeal went out for men to desist from attending in person at the Recruits Depot until further administrative manpower had been added, and instead to apply in writing.[83] This research shows the significance of Irish recruitment in 1918 by comparing it to total English recruitment across the war years as follows:

	1914	1915	1916	1917	1918
English Enlistments	8,896	14,780	20,756	23,218	67,169
Irish Enlistments	379	286	253	294	5,768
English to Irish Ratio	**24:1**	**52:1**	**82:1**	**79:1**	**12:1**

Table 5: Ratio of English to Irish recruitment by year

The ranks of the RAF were also swollen in 1918 by men from America. Britain's need for manpower and America's need for training assistance resulted in a signed reciprocal agreement. The result was that America would send 16,000 technical men to Britain for training, the equivalent of 15% of British 1918 enlistments.[84] Once training was complete, the men would join RAF Training Depot Stations in Britain, allowing the freed-up RAF men to go to France.[85]

Conclusions

The recruitment of the ranks of the RFC/RAF is ultimately one of profound success. When the war was declared, the chief challenge faced was a lack of infrastructure and clarity around potential manpower requirements. Complicating matters was the fact that a significant number of skilled men joined the infantry in the initial flush of recruitment enthusiasm in 1914. However, the relatively slow build-up of the RFC meant that the Corps was relatively untroubled by such issues until mid-1916. At this

[80]'Skilled Tradesmen are Required', *Londonderry Sentinel,* (19 September 1916, p. 2).
[81]'Last London Air Raid, Over 200 Casualties', *Dublin Post,* (30 May 1918, p. 3).
[82]T.Bowman, W. Butler, M.Wheatley, *The Disparity of Sacrifice : Irish Recruitment to the British Armed Forces, 1914-1918,* (Liverpool: Liverpool University Press, 2020), p. 132.
[83]'French's 50,000', *Belfast News-Letter,* (26 July 1918, p. 4).
[84]TNA AIR 1/686/21/13/2252 *Statistical data of the R.F.C and R.A.F.*
[85]Jones, *WITA, vol 6,* p. 77.

stage of the war, the competing needs of home industries and the infantry made the recruitment challenge much harder.

Despite competition for manpower, the RFC always found ways to recruit the people it needed, and the statistics presented here highlight its success. In each year of the war, the RFC/RAF recruited over 60% from the class of trades that they had defined in initial recruitment materials. In 1915 and 1916, more than three-quarters were from target trades and throughout the war, the percentage never fell below 60%. This was a considerable achievement, particularly in the context of Britain's national shortage of skilled labour.

The RFC quickly recognised the importance of the skillset over the rigid interpretation of physical attributes, even stating such in their recruitment guidelines. They realised, too, that men not necessarily fit for life in the trenches would be suitable for roles in stores, depots and workshops. As the war continued, men were increasingly likely to be recruited with low medical board examination results. They became shorter and physically less imposing as the war continued, but there is no discernible evidence that the force's efficiency was reduced.

The RFC later spotted an opportunity to recruit younger men, so-called 'boys', into the service. Guaranteeing them service in Britain reduced potential parental opposition and gave them an apprenticeship in a trade. From a service perspective, it created a skilled pipeline of men once they turned eighteen. These young men were joined by increasing numbers of older workers who, unfit for the trenches, were perfectly capable of many roles within the RFC. Across Britain a dilution of skilled labour in factories and munitions plants occurred and women became invaluable to the war effort. The RFC/RAF, too, recruited substantial numbers of women to free up men for service abroad and the WRAF was successfully created in parallel with the men's organisation. As labour shortages became acute by the close of 1917, the RFC had a fully functioning training establishment in place. Its importance in allowing the recruitment of unskilled men was vital in finding sufficient numbers.

Using newspapers and cinemas allowed the RFC/RAF to recruit from beyond their traditional bases in the South East of England. Specifically targeted appeals, such as the one in Ireland in 1918, resulted in unprecedented success when accompanied by a message that stressed the independence of the air service from the Army. Canada also provided significant numbers of tradesmen as it did with pilots. Though recruitment was not without its challenges, there remained a significant Canadian presence from 1917 until the end of the war, bolstering the ranks when most needed.

Combining all the factors above, the RFC and the RAF successfully recruited those needed to fight and win the first war in the air. As this article has shown, it was a success made possible by significant compromise, pragmatism and creativity.