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Gendered divisions of military labour in the British armed forces.

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Abstract

This paper examines statistical data on the employment of women in the British armed forces. It reviews some of the issues shaping debates about women's military employment, in order to establish the on-going significance of the topic. It looks at patterns of female military employment across the three services, and places discussion of this in the context of observations about gendered divisions of labour in the wider UK labour market. It examines data for the gendered divisions of labour within different corps, branches and occupational groups within each of the three armed services, and looks at gender patterns across ranks. It concludes by discussing the implications of these findings for both policy and conceptual work on women's military participation.

Keywords

Gender, armed forces, division of labour, military, feminisation, war

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Gendered divisions of military labour in the British armed forces.

Simple statistics, complex stories

This is a paper about the complex stories that lie behind a simple statistic. The simple statistic is that which shows the percentage of women's military participation over the previous decade. The complex stories are those which explain differential levels of women's military participation in the contemporary British armed forces. In 2005, women comprised 9.0% of the UK Regular armed forces (HCDC 2006). A decade later, at the start of 2015, that figure had crept up to 10.1% (MOD 2015). This proportion of around 10% is notable because it is small, because it is fairly consistent across time (reviews of defence statistics show its very gradual increase and the 2005 to 2015 comparison does not mask any dramatic increases or decreases), and because behind it lie a host of additional statistics about women's military participation, analysis of which indicates more nuanced stories about women's uneven participation in the military labour market. In this paper we contribute to an on-going debate about women's military labour by examining the statistical evidence to show the detail of this uneven participation, arguing that analysis at this level is useful to practical and conceptual arguments about the actual and potential contribution of women to military forces.

The paper is structured in three sections. First, we explain why rates of women's military participation merit attention, and to whom. We review some of the key issues shaping the debate on women's military employment in the UK from the perspectives of defence policy-makers and military command, and scholars of military and security issues including feminist scholars working across the social sciences. Second, we look at patterns of women's military participation in different occupations within each of the three UK armed services (British Army, Royal Air Force (RAF) and the Royal Navy / Naval Service) over the past twenty years, including data on rank progression of women personnel. We suggest how observed trends compare with trends in the broader national labour market, and explore how the structuring of women's labour market participation in the civilian world is reflected in gendered divisions of military labour. Third, we discuss what these patterns of participation might imply both for future defence personnel policy at a time of military transformation, and for feminist debates about women's military participation, arguing that these debates are incomplete without an assessment of that participation as a form of labour market structuring.

Why women's military employment matters

Given that the proportion of women employed in the UK Regular armed forces has basically remained static over the past decade, it could be suggested that there is little of interest here to comment upon and explore. This is not our view. The question of rates of women's military participation merits attention for three reasons.

First, women's military participation merits close examination because the issue is of perennial interest within public and academic debates about military affairs. Enhancing that public debate with informed comment is partly about making visible the patterns and practices which make up the statistic of 10%. Much media commentary on gender in UK armed forces cites the 10% figure and leaves the question of women's differential participation within military labour markets unexplored. In parallel, much analytic academic commentary on gender in UK military forces moves swiftly on from an acknowledgement of the 10% statistic, using more qualitative data to examine the experiential, political and cultural manifestations of a division of labour which is frequently taken as monolithic across the armed forces (and we would include our own work here: see for example Woodward and Winter 2004, 2006, 2007; Duncanson 2009, 2013; Cornish and Duncanson 2012; Duncanson and Woodward 2016). Yet, as we argue in this paper, if we go back to that figure of 10% and start asking how that average is comprised and what disaggregation of that average reveals, a more complex and nuanced picture emerges which mirrors broader social trends in terms of women's labour market participation. In turn, as we show, this prompts new questions about the military labour market and women's place therein. For example, it shifts focus away from issues which so often dominate news media headlines (and indeed academic work), such as the viability of women's close combat participation, or the construction of gendered military identities and performances. Although these are of course significant, they are only part of a much wider picture – sometimes even a distraction. Although discussing women's military participation in labour market terms may not have the allure of more titillating media headlines about sexual transgression, or the excitement of finding new conceptual ways of understanding the performative enactment of military gendered identities, at root women's military participation is a question of work, of labour markets and of participation therein. Given that labour markets are gendered (for an overview, see Mills, 2016), we argue that understanding women's military participation through the gendered labour market is both interesting in and of itself, and necessary for a more informed understanding of that participation.

Second, women's military participation is a significant policy issue. It matters to government and defence planners because in order to function effectively, military forces need to have what they perceive to be the right combination of the right people, with the right skills, doing the right job in the right place at the right time. This in turn relies on complex processes of recruitment, selection, training, personnel management, deployment and retention. Personnel issues faced by defence planners at the present time include the practicalities of pinch-points and skills gaps (HCDC 2014), recruitment shortfalls and overstretch (HCCPA 2014), and responses to the challenges of budget restrictions limiting numbers of personnel employed on a full-time basis (MoD 2013). They also include more strategic questions around the evaluation of security threats and trends at more global levels over longer timescales and the implications of this for manning strategies (DCDC 2014, MoD 2015). These challenges require carefully planning and management of military personnel to ensure that military forces have a workforce in place appropriate to the tasks expected of it by government and civil society. Needless to say, we would argue that these processes of planning and management are gendered in that they are social processes through which gender is constituted and expressed.

Gender is significant to personnel management and thus to wider strategic issues because women provide a source of labour power. As has so often been the case across military forces (see Carreiras 2006; Carreiras and Kümmel 2008; Segal, 1986, 1995), the British armed forces have drawn on female labour power when they have needed it, for example in times of national emergency or when men have been in short supply (Noakes 2006; Dandeker and Segal 1996). Following the restructuring of the UK armed forces under the 1991 *Options for Change* programme which included the disbanding of women-only units and the incorporation of all personnel together, the 1990s saw the expansion of roles open to women (for example, in the Royal Artillery (RA), Royal Electrical and Mechanical Engineers (REME) and Royal Engineers (RE)). There were commentaries at this time about the necessity of this move not just in response to wider civil society and government pressures for employment equity, or because of the relative shrinkage of more traditional recruitment pools to the armed forces (white, male, working class labour), but also because of the demands upon the UK armed forces at that time in the 1990s in terms of peace-keeping and peace-support roles and arguments about the soldiering skills required by these roles, which might include skills held by both men and women (de Groot, 2001).

The UK was not alone here. Since the mid 1970s and early 1980s, all NATO member states, bar Iceland (which does not have a standing armed forces), have passed legislation permanently integrating women into their ranks, as demands for labour power and equal opportunities legislation have taken hold (Obradovic, 2014). The number of women in NATO militaries and the extent of their service rose dramatically, from 30,000 in 1961 to 300,000 in 2001 (Obradovic 2014: 1). There is some variation within NATO of course. The United States and Canada have long had relatively large proportions of women in their ranks – around 15%. The newer NATO states present a slightly different picture of a relatively recent but more dramatic rise. For example, the percentage of women in Hungary’s military rose from 6.8% in 2000 to 20% in 2012 (Obradovic 2014: 53). Yet it is also clear that all NATO states have experienced an increase in the number of women, and that the roles they play are similarly expanding (Obradovic 2014).

Gender has continued to be of policy significance to UK defence planners during the long period of conflict starting with British contributions to coalition responses to the 9/11 attacks and including the wars in Iraq and Afghanistan. British personnel deployments included the deployment of women, of course, and there are indications that these deployments contributed quite markedly to the normalisation of women’s military participation. This is based on growing evidence that women have, quite simply, been able to do the jobs for which they have been trained, working alongside men. They have done so because they are competent, capable employees. As Anthony King (2013) notes, judgements of the performance of women personnel on active operations in Afghanistan by British soldiers have commended the professional competence of a great many deployed women. Although there has yet to be a comprehensive assessment of women’s specific contribution to the British deployments in Afghanistan, anecdotal evidence suggests not only competent performance but also the sense of normality their presence brought to otherwise all-male units in situations which were anything but normal (see Bury 2010, Taylor 2011). Although false expectations and the challenging context undermines claims that Female Engagement Teams (FETs) were a success in Afghanistan, British military women working in FETs have been identified as making some important contributions to work with Afghan civilians, especially women, in order to build security (Azarbaijani-Moghaddan 2014).

Anecdotal evidence also suggests that generational changes in attitudes to gender roles are playing a role in the declining resistance to women's military employment within the armed forces. At the same time, however, levels of reported sexual harassment and bullying are still unacceptably high, with the 2014 Armed Forces Continuous Attitude Survey finding that 10% believed themselves to have been the subject of discrimination, harassment or bullying in a Service environment in the previous 12 months (MoD 2014a).¹ Furthermore, there is some evidence of the 'token effect' (see Carreiras (2006), following Kanter (1977) and Yoder (1991)) playing out for women in the British military, with the attendant issues of heightened visibility of a small minority, exaggeration of differences and exclusion, and assimilation to organisational (masculinist) norms (King 2013; Roohan 2013). As with most militaries, comprehensive evidence of the extent to which women are accepted and the difference women make to the British Armed Forces is lacking. But in order to begin to establish this, it is instructive to explore exactly where military women are employed, not least because as we have discussed, gender is a significant factor in military personnel policy.

The continued policy significance of gendered divisions of labour to UK armed forces, is also evident through the proposed lifting of the exclusion of women from direct combat roles. Posts in the Household Cavalry, the Royal Armoured Corps, the Infantry, the Royal Marines General Service and the RAF Regiment have remained closed to women, although there are strong indications that this ban will be formally lifted in 2016 (MOD 2014b, Fitriani et al 2016). What is significant here is less the lifting of these exclusions, which are in many ways symbolic – and we discuss this point in our conclusion as patterns of women's military participation speak directly to this (see also MacKenzie 2015). Rather, what is significant is the language used to frame this debate by defence policy-makers. For example, in urging the Government to review the combat exclusion for women in 2013 following policy changes in the US armed forces, the UK's Shadow Defence Secretary did so on the grounds that 'We in Britain must maximise everyone's talent and courage for our military' (cited in Haynes 2013, 17), an argument echoing that of Brigadier Nicky Moffat², the British Army's most senior female soldier until her retirement in 2012. Personnel debates, in other words, are about

¹ Note that this survey does not distinguish between gender-based discrimination, harassment or bullying and such activities rooted in other forms of social discrimination.

² Brigadier Moffat was speaking in the context of the US lifting of the combat exclusion for women, noting that 'The [US] policy change will, in my view, ensure that a wider pool of talent is available to maintain a capable and operationally-relevant force, fit to meet the challenges of 21st century warfare. It will also remove bars to employment and progression which, hitherto, will have held women back from competing for more senior roles.' <http://www.channel4.com/news/women-served-in-male-only-british-ta-combat-roles>

military forces having what they perceive to be the right combination of skills and talents to meet the challenges of contemporary conflicts and deployments and about what policymakers, the defence community, government and civil society want their military forces to do and be. Gender is central to this recognition of the benefits of diversity³ (Acker 1992; Britton 2000; Carreiras 2006; Woodward and Winter 2006).

Third, looking closely at women's military employment and patterns of the gendered division of labour is of significance because of what conclusions might bring to feminist political and conceptual debates about gender and the military, and about gender equality more broadly. As we have already noted, the development of peace-keeping roles in the 1990s in, for example, the Balkans shifted arguments towards assessments of the specific utility of female labour in such roles. Indeed, the Army recruitment campaigns of the late 1990s and early 2000s reflect this very clearly (Woodward and Winter 2007). Yet the idea that women may have particular skills is a contentious one, because it risks an essentialising discourse which can ultimately disadvantage women by constructing them as 'naturally' having a specific set of attributes (see Jennings 2011). Women may be expected to offer diversity and such expectations can be problematic (Kronsell 2012), an issue noted around the use of Female Engagement Teams in Afghanistan (McBride and Wibben 2012). Women's inclusion may also serve ideological purposes such as a signifier for 'modernization' in Gaddafi's Libya or the demonstration of 'white political unity' in apartheid South Africa (Mathers 2013: 132, 134). At the same time, women's inclusion opens up the possibility for the valorisation of skills which may previously have been disparaged as 'feminine', and thus disrupts and shakes up gendered dichotomies in ways which may be very beneficial both for gender equality and for peace-building (see Duncanson and Woodward 2016). This is a reminder that just as the debates on women's military participation matter in very practical ways to those responsible for the deployment of armed forces, they matter also to those interested in whether women's military participation represents progress towards feminist goals or the co-option of feminism, and to those interested in the wider social meanings and effects of military forces with regard to gender relations.⁴

There is something very specific, however, about the contribution that a close attention to gendered divisions of labour can make to feminist conceptual and political debate. Militaries

³ Note also the parallels and discontinuities with policies on ethnic diversity (see Ware, 2012).

⁴ For a range of viewpoints on this issue, see contributions to Woodward and Duncanson (forthcoming).

are male dominated numerically, especially in sectors mostly closely related to their core functions, and those that confer greater prestige and rewards, and more chance of promotion. There are a number of core areas of feminist inquiry which follow the effects of patterns of numerical domination or exclusion, including the domination of masculinist cultures and ideologies (Cockburn 2007, Enloe 2007), the potentially negative consequences of that for the facilitation of peace and security (Whitworth 2004), or the possibilities of transformation and stasis through the inclusion of women (Carreiras 2006, Herbert 1998, D'Amico and Weinstein 1999, Woodward and Winter 2007, Basham 2013, Roohan 2013). What close attention to the basic patterns of the gendered division of labour enables is a more nuanced and detailed understanding of the institutional spread of women, tackling the idea of 'the military' as somehow monolithic in its gendered form, and enabling a more informed conceptual debate to take place.

Clearly, then, to a range of different interest groups in policy and academic circles, the question of women's military employment matters greatly, often for very different reasons, and there remain a number of unresolved and conflicting issues around both the practices of women's inclusion, and their implications. This paper does not set out to resolve all of the wider contextual and political arguments which circulate around women's military employment. Rather, our intention is to add to these debates by exploring a facet of this which has hitherto received little attention in British contexts. This concerns the patterns of women's employment in the armed forces and the comparisons and inferences which we can draw about current trends and future changes on the basis of these patterns for an armed forces in a state of transformation, and in ways which contribute to arguments about the purposes of military forces. We use the term 'the gendered division of labour' to refer to this complex and differential structuring of women's military employment, to signal that work in the armed forces is unevenly structured by gender. It is our contention that by looking beyond the basic statistic of 10% and disaggregating it across the three services and between occupations within those services to establish more precisely the patterns of this gendered division of military labour, we can contribute to a more nuanced set of interventions into debates about women's military participation.

Unpacking the 10%: patterns in women's military employment

It is, we hope, self-evident that the figure of 10.1% (as it currently stands) is of limited utility when actually *explaining* anything to do with women's military employment in the UK context; it shows merely an overall aggregated proportion for the armed forces as a whole and it says little about its underlying reasons. In what follows we disaggregate this single statistic in order to show what the present gendered division of military labour looks like in more detail, and to provide some suggestions as to why it looks like it does.

The figures that we use are drawn directly from, or are calculated from, National Statistics publications for the MOD in the quarterly and annual personnel reports, which are publically available documents. In addition, we draw on data provided by MOD Defence Statistics (Tri-Service) in response to a direct inquiry made in October 2013 requesting data on the numbers and proportion of women, disaggregated by rank, for the British Army, the Royal Air Force (RAF) and the Naval Service, at specific points in time.⁵

Table 1 shows the figure of 9.9% for the proportion of armed forces personnel who were women as of 1st April 2014, disaggregated by service and rank, and compares this against the same statistic for the previous four years.⁶ Note that overall, employment across all three services fell from 191,710 on 1st April 2010, to 159,630 on 1st April 2014; the figures shown indicate the proportion of that overall number of employees who were women. Framing the discussion which follows, therefore, is the fact that the overall number of people employed in the armed forces continues to fall year on year, reflecting both current tranches of redundancy and longer-term reductions in personnel numbers.

[Table 1 about here]

Table 1 shows how the proportion of women employed in the three services has increased year on year from 2010. The exception to the overall increase is the Naval Service, where an overall decrease is accounted for by a decrease of 0.8 percentage points amongst Other Ranks. The figures in Table 1 show clear differences between the three services, with the greatest increase being 0.9 percentage points amongst RAF officers. However, although there has been an increase in the proportion of women RAF officers, there was in fact a

⁵ This data is Unrestricted, but does not exist in published form at the present time as far as we are aware. In accordance with academic protocols for data transparency, a copy of the data set is available from the authors on request.

⁶ We use the data for 1st April for consecutive years; data for April 2015 was not available at the time of writing, hence the use of 1st April 2014 figure as the last point in the time series (9.9%), rather than the figure of 10.1% given above (1st January 2015).

decrease in the actual number of women RAF officers, as noted above, from 1,510 in 2010 to 1,290 in 2013. The figures in Table 1 also show quite clearly the differences between Officers and Other Ranks in terms of the proportions of women personnel in each. The Officer class clearly attracts higher proportions of women than Other Ranks across the three services. We can see that the changes taking place, albeit small for all three services, are happening at different speeds and in different ways. The key point we can infer from this table is that the three services offer different employment opportunities and environments for their personnel, reflecting their specific roles within defence and thus their personnel requirements. It is a basic but fundamental point: the military labour market, as with all labour markets, is differentiated and structured in various ways around roles, skills and capability requirements, status and remuneration, and there will always be gender differentials at play here.

Comparisons with the civilian labour market

For the purposes of comparison with Table 1 and subsequent tables, Table 2 shows for the UK labour market as a whole the percentage of men and women working in each of the nine major occupation groups used by the Office for National Statistics. These standardised occupational classifications are developed from the national Labour Force Survey to provide data on the socio-demographics of the UK workforce, and provide a basic indication of the gendered divisions of labour nationally.

[Table 2 about here]

There are two points to make here. The first, quite obviously, follows from the clear disparities between men and women in different occupational groups, with the much higher proportions of men in ‘Managers and senior officials’, ‘Skilled trades and occupations’ and ‘Process, plant and machine operatives’. Women dominate in ‘Administrative and secretarial occupations’, ‘Caring, leisure and other service occupations’ and ‘Sales and other customer service occupations’. Note also that labour market segregation patterns remain quite constant over time; although Table 2 shows only a snap-shot for 2013, other studies confirm that whilst women’s overall participation in the labour market has increased over the last four decades, gendered divisions by occupational category remain consistent (see ONS 2003, ITUC 2008). The question to consider is whether the armed forces as a whole mirror a wider gendered division of labour. Although it is very difficult to make direct comparisons

between military and civilian jobs⁷, it is useful to consider how the skills and personal attributes required of different military occupations might correspond to a nearest civilian equivalent.

The second point to note is the pay and status differences between and within these groups. Men dominate in occupational groups associated with higher levels of pay, such as ‘Managers and senior officials’ where they make up 66.9% of the total. The apparent equality implied in the ‘Professional occupations’ category (which is the most common occupational category for both men and women, at 19% and 21% respectively – see ONS 2013b), is slightly misleading, as within this professional category, men and women are unevenly distributed over a wide variety of jobs. For example, the most common occupation for women was nursing while the most common for men was programmers and software development. In other words, men tend to dominate in professional occupations associated with higher levels of pay (nurses earn on average £16.61 per hour, whilst programmers and software developers earn £20.02 (ASHE 2012)). It is widely recognised that women are more likely to be found in the low paid ‘five Cs’ of cleaning, catering, clerical, cashiering (retail), and caring work (Perrons 2009). This is significant for gendered divisions of military labour, because it indicates how even apparent equalities in broad statistics can mask status differences.

In the data which follows, we are able to see a more fine-grained disaggregation which more accurately describes the jobs that military women do, and Table 2 provides a useful schema for understanding how the gendered divisions of military labour which we discuss below replicate or diverge from gendered divisions of labour in the national labour market.

British Army

When we break down the statistics on the proportion of women in each service into their component job specialisations so that intra-service differences become evident, we see the gendered divisions of military labour in a much more nuanced way. Table 3 shows the proportion of women employed in the different arms and corps of the British Army at 5-year

⁷ Direct comparisons are difficult as there are no civilian equivalents of many military occupations. To complicate things further, the Standard Occupational Classification system allocates military personnel to one of two possible categories (depending on whether they are Officers or Other Ranks). Nonetheless, we feel it is worthwhile trying to illuminate the patterns of military employment by reference to the civilian labour market because it is the only way to gain a sense of the distinctiveness (or not) of the pattern of women’s employment in the military.

intervals from 1998. It is important to note that data for the Infantry, the Household Cavalry and Royal Armoured Corps, the Royal Army Chaplain's Department, the Small Arms School Corps and those in Senior Soldier Continuity Posts have been excluded, as the data on these groups contains no women. If it were included, the picture would look less inclusive of women.

[Table 3 about here]

Trends over time in the gendered division of labour

We have chosen 1998 as the start point for this series, because it marks the most recent significant point of change in gender integration, when the Royal Artillery (RA), Royal Engineers (RE) and Royal Electrical and Mechanical Engineers (REME) became open to women. We can infer from this data the following points. The rise in the proportion of women in staff roles mirrors a wider change in UK labour markets with the gradual and long-term advance of women to senior managerial roles. A crude indicator of this from wider labour market data shows a rise from 31% of women in managerial positions in 2001 to 33% in 2013 (ONS 2001; ONS 2013b). The rate of the rise of the proportion of women in staff roles (from 1.4% in 1996 to 5.6% in 2013) has thus been faster than the rise of women into management in civilian sphere in the last decade, but with women in only 5.6% of senior positions, the gap between men and women at senior levels remains much more stark in the British Army. In the RA, RE, REME and the Army Air Corps (AAC), the proportion of women is small, has grown, but is still below the average for the Army as a whole. Again, this mirrors a pattern in the wider UK labour market, where if we think in terms of the nearest civilian equivalent jobs, we see much smaller proportions of women in technical, engineering and construction roles associated with 'Skilled trades occupations' (see Table 2).

In the corps where women have longer histories of employment or association – Royal Signals (R Signals), Royal Logistics Corps (RLC) and the Intelligence Corps – there has been stasis or decline. We have no immediate explanation for this. It is possible that women wanting to pursue careers in these jobs which use skills and aptitudes in nearest equivalent fields to communications, logistics, etc., are looking to pursue them as civilians, rather than in military contexts with lower pay and more rigidly defined working conditions. It is also possible that whilst there has been some expansion of job opportunities in these corps, women in or considering joining the British Army are showing little interest in taking these

specific roles, electing to join other corps and take other roles instead. It may also be the case that as the role of intelligence is regarded as increasingly important in the multidimensional operations of the post 9/11 era, it has become redefined as a more prestigious corps, has attracted more men and become, in effect, masculinised. The way in which social tasks become 'sex-typed' (assigned as work suitable either for men or for women) is a familiar phenomenon to feminist scholars (Cockburn 1983, 1989, 1991; Acker 1992; Bradley 2007). Noting the way in which 'when women have performed similar tasks to men on the production line, what counted as natural aptitude and dexterity for women (nature) has often been interpreted as trained skills for men (culture), with pay and conditions of work following accordingly', Charlotte Hooper concludes that 'It is not the actions themselves but the gendered interpretations placed on them that are crucial in determining which activities count as masculine and valued and which count as feminine and devalued' (Hooper 2001, 47-8).

In the other sector where military women have long histories of employment, medical and related roles, there has been an increase in the proportion of women working in the RAMC as medical professionals and a decrease in those occupying nursing roles, seen in the QARANC becoming less female-dominated. This is mirrored to some extent in the wider civilian labour market with the increase in the proportion of men pursuing careers in nursing and related health-care roles (although the proportion of men working as nursing is only around 10% at present) and an increase in women working as doctors from 40% to 45% (ONS 2001; ONS 2013a). There is a significant increase in the proportion of Army dental and veterinarian staff who are women, which mirrors a similar rise in the proportion of women in these professions in the civilian labour market (ONS 2001; 2013).

In the AGC, where women have traditionally worked in much larger numbers since the First World War, there is a marked increase in the proportion of women from one quarter to one third. This mirrors the expansion of female employment in the civilian labour market in equivalent administrative, organisational and managerial jobs. This is difficult to evidence simply, as re-categorisation of jobs has affected the counts of men and women in administrative and secretarial roles, but note how women comprise 76.6% within 'Administrative and secretarial' occupations in 2013 (Table 2). Indeed, although we show aggregated figures for AGC here, data for 2013 which disaggregates this Corps still further shows 20% of those in the AGC Provosts branch are women, 38.9% in Staff and Personnel Support, 45% in Education and Training Services and 41.6% in Army Legal Services, adding

further detail to the picture of gendered divisions of military labour which seem to mirror the wider labour market.

The General Service Corps / General List, which includes individuals under training, shows a very uneven pattern in the proportion of women officer cadets. This could be an example of the dynamic nature of the relationship between the civilian and military labour markets in graduate recruitment, where variations in the health of the graduate labour market over time are in turn reflected in differences in the attractiveness or otherwise of an Army career for women graduates (Segal 1995; Carreiras 2006).

Overall, the figures in the table confirm what many within the British Army have noted anecdotally to us; that whilst women, in electing to pursue a career in the British Army, are choosing to enter what is widely perceived to be a non-traditional occupation and sector for female employment, once in the Army, have tended to be employed in roles which in their civilian labour market equivalent have tended to be commonly understood as ‘female’ This pattern has also been noted in existing research in other national contexts, Israel for example (Sasson-Levy and Amram-Katz 2007; Sasson-Levy, 2003, 2007). Carreiras (2006) cites evidence from the Czech Republic and Belgium which indicates that women have *chosen* jobs which have traditionally been defined as feminine, rather than being prevented from choosing others through discrimination, but that information only gets us so far, as we do not know the many factors which have gone into that decision. There is also evidence that gendered divisions of military labour are also shaped by the influence of ideas of masculinities (see for example Hale 2012, Brown 2012). Understanding with precision the reasons for the gendered divisions of military labour evident in Table 3 clearly requires more focused research on Army women’s career choices and motivations. The effects of discrimination, the gendering of educational pathways pre-recruitment, the cultural and social influences on individual women as they determine their career choice, the comparability or otherwise between military work and the demands of family life, and the availability of jobs wherein women have been able to develop career pathways, will all be factors. These possible explanations are not mutually exclusive of course, and will interact in order to influence the gendered division of labour within militaries. Given current concerns within the British Army about the continued low levels of recruitment of women, we suggest the detail of differential recruitment and retention to the different corps and services is helpful in understanding where exactly patterns of over- and under-representation lie. In research terms, these patterns of differential engagement suggest not only that the reasons behind

differential participation as articulated by women within the British Army merit continued scrutiny, but also suggest that transformations in military roles over time may be a significant component in feminist debates about women's military participation.

The dynamics of generation and rank

We also drew on available data to consider how women's participation within different arms and corps has changed over time in terms of career progression. Because of the rank structure of the armed forces, comparisons over time have been straightforward to calculate.⁸ For reasons of space we only do this for two corps – the Royal Artillery and Royal Engineers. We chose these because they had no prior history before 1998 of direct female employment and are in certain respects very non-traditional areas for women's military participation. However as Table 3 shows, they have developed quite different gender profiles since 1998. Each illustrates points relevant to the broader analysis of women's military employment.

Table 4 charts the changing proportions of women at different ranks within the Royal Artillery from 1998 to 2013, and shows quite clearly gradual progression in the proportions of women at each stage of promotion.

[Table 4 about here]

The table shows the first female Sergeants and first female Majors appearing ten years after women first formally enter the Royal Artillery, although in fact data for 2005 not included here shows ten of each appearing in 2005 (figure reflects rounding). By 2013, the first Staff Sergeants and WO2s are visible, although ten SSgts appear in the data for 2010, again not shown here. The only slight anomalies are the decline in 2013 in the proportion of female subalterns and female Corporals and Lance Corporals. Crude as the data in Table 4 is, it would appear to support an argument that once they are trained and commence their careers in the Royal Artillery, there is career progression for women through the ranks. Whilst the numbers at each rank have declined as a result of overall Army personnel reductions, the proportions of women relative to men have stayed constant or gradually increased. Also significant, though also not shown in this table, is the proportion of untrained personnel at the

⁸ We note, however, that there may be various differences between corps in terms of the availability of promotion opportunities and the application of promotion criteria, which may affect this data, but which we have not been able to allow for.

most junior level who are women. The data for 2008 and 2013 (the only two years for which we have the data) shows these at 9.1% and 17.5% respectively. We can infer that the Royal Artillery is gradually but definitely becoming a career option for women both as Officers and as Other Ranks, and it would be worth exploring further the reasons for this.

Table 5 shows the results of a similar exercise, illustrating the changing proportions of women within the Royal Engineers across the ranks from 1998 to 2013.

[Table 5 about here]

Again, we see patterns of progression through the ranks across time. Visible also are two other issues. The first of these is the very small proportion of women in the Royal Engineers (RE) as Other Ranks. Table 3 illustrated the overall small proportion of women in the RE, and Table 5 gives some indication of how this plays out. A simple explanation might have something to do with the roles performed by the RE; although there are no direct civilian equivalents to combat engineers, the nearest civilian equivalents – the construction industry and other trades – similarly have very small proportions of women working in them at the lower-status end of the spectrum of manual occupations. The second issue is what appears to be the relative popularity of the RE as a career pathway for women officers. In addition, and not shown here, is the fact that in 2013, 16% of untrained RE officers were women.

Explanations for this relatively large proportion, compared with other Arms and Corps, may lie with the Defence Technical Undergraduate Scheme (DTUS) gradually bearing fruit. This was established to provide specialist degree-level training in primarily engineering and related science programmes for those intending to pursue a career in the armed forces at officer level, and funds around 100 new entrants per year through generous bursary support. It may also reflect a national increase in the number of women graduates from science and technology undergraduate programmes more generally. There may also be initiatives within the RE to encourage more women officer applicants. Again, this points to the need for closer investigation of the specifics of different arms and corps in terms of employment practices, in order to explain observable patterns. It may be the case that personnel policies (such as DTUS) initiated without explicit regard for their gendered effects can end up having very pronounced effects on the gendered division of labour.

From the data on the Royal Artillery and Royal Engineers, we infer two things. First, there is career progression through the ranks, albeit amongst small numbers of women, and at a slow pace. Second, the jobs where women are increasing fastest as a proportion of the workforce

in these two corps are those at officer level, indicating that it is in more senior managerial-type roles that we see evidence for the enthusiasm for women in these two corps, which both remain very male-dominated.

Future Force 2020 and the feminisation of the British Army

Overall, what is notable in the data on the changing proportions of women across different occupations in the British Army is that whilst the overall numbers of people employed has fallen, the proportion of women has increased. In 2010, excluding the Infantry and Household Cavalry / Royal Armoured Corps, the British Army employed 75,010 people, and 11.4% of these were women (7,670). In 2013, 68,020 people were employed (with the exclusion as above) of which 12.3% were women (7,520). This time period has seen four tranches of redundancies under the Armed Forces Redundancy Programme set in motion by the 2010 Strategic Defence and Security Review. It is evident from the figures we have noted already in this paper, from calculations of the proportions of men and women in each tranche, and from analysis of the Army trades selected for redundancy where Infantry and Royal Engineers form the biggest group, that the implementation of the AFRP has fallen disproportionately on soldiers who are men.

A significant component of the Future Force 2020 programme is the replacement of full-time members of the Regular forces with reservists and the greater integration of those reservists within the whole force structure. Although this programme covers all three armed forces, it has greatest effect on the British Army which has the most ambitious targets for Reserves expansion. The expansion of the Army Reserve raises some potentially very interesting questions around its effect on the proportions of women employed overall. Table 6 shows the number and proportion of women in the Territorial Army⁹ (Group A) by gender and rank for 1st April 2013.

[Table 6 about here]

Clearly, the proportion of women in the TA / Army Reserve exceeds by some margin the proportion in the Army overall, even accounting for the absence in Table 6 of untrained

⁹The data was classified by Defence Statistics as 'Territorial Army' rather than Army Reserve at point of delivery. Group A TA personnel can be deployed. Group B (Officer Training Corps cadets attending UK universities) cannot.

personnel. It would be unwise at this stage in the Future Force 2020 process to predict with any degree of certainty the likely changes in the proportions of women as the Army Reserve expands. We can however speculate that this move has the potential for the further increase in the proportion of women in the British Army (Regular and Reserves). There has been no research to date of which we are aware, which satisfactorily explains the higher proportion of women in the Army Reserve, relative to the Regular army. Again, this is an area for closer investigation. We suggest that the reasons for this lie with compatibility between Reservist roles and civilian employment such that Reservist participation offers a more manageable means of pursuing military participation for some women; and with the popularity of Reservist participation for former Regulars enabling continuity of participation for women. There is a sense in which the Future Force 2020 programme may, potentially, feminise the British Army's labour force in ways that gender-orientated policy interventions have not.

Royal Air Force

As noted in Table 1, the RAF has a much higher proportion of women employees relative to the British Army and the Naval Service. This has long been recognised, at least anecdotally, as reflecting the much higher ratio of support and technical staff to those deployed in direct combat roles (i.e. as pilots), and reflecting historic patterns of gendered employment which have in the past excluded women from flying roles (although this has now changed). The RAF (again anecdotally) has been seen as a more attractive career choice for women pursuing a military career because of an organisational culture which has been more open to accepting women's participation. Because of changes in the categorisation of RAF personnel between 2004-2009 and 2009-2013 making direct comparisons across time quite difficult, it is not possible to show the changing proportions of women in different branches in one table, so this data is shown separately in Tables 7, 8 and 9 which give the proportions of women RAF officers in different branches for 2004, 2009 and 2013.

[Tables 7, 8 and 9 about here]

Note that the original data for 2013 includes the number in General Duties (GD) together with the numbers in 'Flying', and note also that the differences between 2009 and 2013 in the allocation of staff to 'GBO (Ground Based Operations)' and 'Specialist' categories give the impression of significant changes, which are misleading. What *can* be inferred from the table

is the difference between branches of the RAF in terms of the proportion of women in each, and the obvious increase to 16.2% by 2013 in the total proportion of RAF officers who are women. This is much higher than the Army and Navy, and way above the overall 10% for the armed forces as a whole.

[Table 10 about here]

Table 10 shows the proportions of women in each RAF Trade Group for Other Ranks, for 2004, 2009 and 2013. It is clear that within the mechanical and technical trades, there are far lower proportions of women, compared with the much higher proportions in the flight operations, intelligence, administrative, catering and medical trades. As with the Army, there is a reduction in the proportion of women in intelligence-related and ICT functions, and again we speculate whether this may be explained by the increasing status of these roles. Also notable is the sharp increase in women in physical training instructor roles in the RAF; this might be connected to the rise in the number of civilian women at the highest levels of fitness (e.g. women's participation rates in ultramarathon have increased six-fold since the 1980s (Hanlon 2010)), although this is not replicated in the comparable figures for the Army indicating no simple explanation for this rise.

[Table 11 about here]

Table 11 shows the distribution of women by rank across the trained strength of the RAF in 2004, 2009 and 2013. In contrast to Tables 7, 8, 9 and 10, because all trades and branches have been grouped together, comparisons across time are feasible. Note the very small proportion of women in chief technician and senior aircraftman roles – again, reflecting lower proportions in technical trades. What is also significant, however, is that although the overall numbers are very small (only 20 in total, a number which may also reflect rounding in the original dataset), amongst Officer Designates undertaking training, there is parity in proportion between men and women in 2013. Not shown in this table, but completing the picture, is data from Defence Statistics which shows that in the Royal Auxiliary Air Force by 1st April 2013, women constituted 16.9% of the overall workforce. Again, we speculate on patterns of feminisation of the armed forces under Future Force 2020.

Naval Service

The Naval Service includes the Royal Navy, Royal Marines and the Maritime Reserve. The Royal Marines General Service is not open to women, and it was only in 2014 that the first women were deployed as submariners so are not included in the data collection for 2013. Table 12 shows the proportion of women Officers in the Naval Service by branch, for 2003-2013, and Table 13 shows the proportion of women Ratings for the same period.

[Tables 12 and 13 about here]

Note that the data in Tables 12 and 13 is derived from three separate publications and direct comparisons across the years should be made cautiously. That said, the data has a basic utility in showing the distribution of women in the different branches of the Naval Service. We see, again, the much smaller proportions of women in Warfare and Engineering branches, and the larger proportions in logistics and medical functions. These broad patterns are replicated both for Officers and Ratings. Although direct comparative data from the nearest civilian equivalent is unobtainable, note that for the Royal Fleet Auxiliary, which is civilian-manned, the overall proportion of women is very low but gradually increasing over time – 3.4% in 2003, 4.6% in 2008 and 6.3% in 2013.

Table 14 shows the proportion of women at different ranks each year from 2009 to 2013, and we include also figures for the Maritime Reserve. Note the differences between Tables 1 and 14 for the total proportions for Officers and Ratings for 2013, which reflect differences in raw data which we are unable to explain. Two points can be made about the overall proportions of women in the Naval Service. The first is that, as with the Army and in contrast to the RAF, the increases in the proportion of women in the Naval Service have been very slow. However, at a time of redundancies and overall contraction in the size of the Naval Service, it seems that the redundancy programme (as with the other two services) is not affecting the roles where women are present in greater numbers. The second point is the much higher proportion of women in the Maritime Reserve, which includes the Royal Naval Reserve (which includes women) and the Royal Marines Reserve (which does not). Data for just the RNR (not included here) shows that the proportion of women who are Leading Rates is 29.4%. Again, this is interesting in the context of the proposed expansion of the Reserves under the Future Force 2020 programme, with a (possibly unintended) effect of this expansion being, as with the Army, the ‘feminisation’ of the RNR. The higher proportions of women in the RNR we presume reflect the shore-based nature of RNR roles.

Gendered divisions of military labour: looking forward

In summary, the data presented in this paper indicates the following. The proportion of women in the armed forces remains low overall, with increases happening very gradually. However, between the three services there are visible differences, and within each individual service, there are stark differences between different occupations where women are present in greater proportions in (broadly defined) administrative, service-related and medical occupations.¹⁰ The patterns shown in the data reflect similar differences in nearest equivalent civilian occupational classifications, where women tend to be concentrated in administrative, caring and service occupations. The gendered division of military labour thus reflects patterns of gendered labour in the wider labour market. There are higher proportions of women at more senior levels (i.e. amongst Officers), indicating that in managerial and senior administrative functions, there are greater opportunities for employment for women relative to Other Ranks. Again, this reflects patterns across the wider labour market in terms of women's recent small rises in employment in professional and managerial roles. Overall, there are specific niches where far greater proportions of women are located, and explicit recognition of this seems to us to be important for those seeking to engage with the multiple arguments (practical and conceptual) around women's military participation, and by extension, the relationships between gender and the military. It is important because if, as policy-makers and some feminist academic commentators have suggested, an increase in the proportion of women in the armed forces is positive because of consequences for military capabilities and for what advanced liberal democracies want their armed forces to be and do, then it makes sense to examine how and why an increase in the proportion of women in some areas has occurred.

We have three concluding observations which follow from this, and bring us back to our opening comments about the stasis of the 10% figure and the nuances that this conceals. The first is about the significance of personnel policy changes which may directly be targeted at increased gender diversity. We could attribute the overall changes in patterns of women's military employment just to broader national labour market shifts over time, with the incremental but often quite slow expansion of the pursuit of paid employment by women, within labour markets highly structured by gender. What seems to be significant, though, is

¹⁰ The proportions of military musicians who are women may also be significant, given their high levels of public visibility because of their public performance roles.

the fact that at a time when the overall numbers of military personnel are contracting, the proportion of women is maintained. It is instructive, then, to consider the patterns we have discussed in the context of observations about military labour markets from previous decades (Segal 1995, Carreiras 2006), which appear still to apply. These argue that whilst social and cultural factors (such as women's labour market participation and the things which shape this) frame the processes and create the background conditions for women's military recruitment, it is transformations within the military which are probably the more direct drivers of change. Policies directly attentive to diversity continue to be significant. One example, looking forward, is the likely effect of the New Employment Model (NEM), which amongst other things sets out to address issues of geographical mobility for service personnel. This may have a direct effect in consolidating the increase in women personnel because although reduced frequency of moves anticipated under the NEM will affect different groups of personnel in different ways, it may be particularly beneficial for women wishing to combine a military career with family life, including life partnerships with other serving personnel.

The other example, looking forward, which may have an effect is the likely lifting of the regulations excluding women from direct combat posts. At time of writing, this is under review and has yet to be formally confirmed by the Ministry of Defence, although there are many positive indications that this will happen (MOD, 2014b). The lifting of the combat exclusion policy will be of far greater symbolic importance than anything else, given that it demonstrates quite clearly a de-coupling of a link between military capability and the masculine. It is unlikely that there will be any sudden and pronounced influx of women into the Infantry, RAF Regiment or Royal Marines General Service. This is because of the requirements of physical selection, which although they control for gender difference are still rigorous to a degree that there will be relatively few women with the physiological capabilities to reach the levels of fitness required. It is also likely that these careers will be less appealing to large numbers of young women recruits because of the nature of the work involved, judging on the basis of experience of other units, particularly, as we show above, the Royal Engineers and Royal Artillery. Furthermore, as one interviewee (a Major working in Army recruitment) put it to one of us many years ago, in her experience, the last thing wanted by the bright, capable, robust women that she encountered as a recruiter was what they perceived as the tedious work of, for example, patrolling associated with the Infantry;

they were after something else entirely.¹¹ At the same time, the lifting of the combat exclusion may change impressions of the military as an institution founded on principles of sexist discrimination. At present, with the combat exclusion in place, the armed forces sit at odds with all other public sector employers and with long-term developments in wider labour markets, which have accepted and promoted the principle of equity in employment for all without regard to gender difference. In being able to argue for military exceptionalism – exemption from national and European legislation on gender equity in employment – the armed forces come to be imagined in particular ways in the public mind: as the last bastion of a set of traditional masculinist values. In sum, the lifting of the combat exclusion may be symbolic, but that symbolic change may have wider effects on perceptions of the armed forces as offering suitable career opportunities for appropriately-qualified young women.

The second observation that we have about why, exactly, close attention to the proportions that lie behind the 10% statistic is necessary, is that policy-makers and analysts need to be alert to the unintended consequences for gender equity policies which are not ostensibly about gender. We have already speculated how, for example, a small-scale scheme aimed at attracting primarily undergraduates on engineering degree programmes to military careers (DTUS) may be responsible for relatively large proportion of women in the RE at officer level. More significant is the expansion of the reserves under the Future Force 2020 programme. Existing patterns shown above indicate that the proportion of women in the Reserves across the three services is much higher than for regular personnel. On the basis of the data available to us, we cannot establish with any certainty whether rates of increase in the proportion of women in the Reserves over the past decade or so are higher than in the Regular armed forces, but this is a possibility. It is also not possible to predict at this point in time how exactly the changes proposed under the Future Force 2020 programme (and particularly Army 2020) will play out in terms of the gendering of the military labour market, including continuation of this trend.¹² What does seem evident, though, is the effect of this policy shift in, potentially, 'feminising' the British military labour force. Again, we would

¹¹ Research interview, *Gendered Bodies, Personnel Policies and the Culture of the British Army*. ESRC research project, R000223562 Rachel Woodward and Trish Winter, Newcastle University, UK, 2001-02.

¹² This and other issues are currently under research through *Keeping enough in Reserve: the employment of hybrid citizen-soldiers and the Future Reserves 2020 programme*. ESRC research project, ES/L012944/1. Rachel Woodward, Tim Edmunds, Paul Higate, John Hockey and K. Neil Jenkins, 2014-17. This project is one of four which constitute *Future Reserves Research Programme* funded by the ESRC in collaboration with the MoD and British Army, which is exploring a wide range of Reserves issues under Future Force 2020; see <http://www.esrc.ac.uk/news-and-events/press-releases/31573/what-is-the-future-of-reservists-in-the-armed-forces.aspx>.

argue that looking at the close detail of patterns of gender participation at arm or corps level can inform policy strategies aimed at enhancing diversity.

Our final observation concerns the research agendas for feminist academic analyses that our findings suggest. We noted in our introduction that the issue of women's military participation as a matter of labour matters to those interested in whether women's military participation represents progress towards feminist goals or the co-option of feminism by military institutions. We also noted how paying close attention to the detail of where, exactly, women are employed is contributory to that discussion by negating the idea that 'the military' is somehow monolithic. Two research agendas follow from this. One is about the generation and analysis of quantitative and qualitative data from primary and secondary sources which may explain some of the patterns identified here. These include the stasis or fall in women's participation in combat support roles (such as signals, intelligence and logistics), and the likely causes and consequences of the greater proportion of women in Reserves roles, including attendance to the future direction of travel here. The other research agenda concerns feminist debates on women, peace and security, the changing operational environment of western militaries, and potential military transformations. As we note elsewhere (Duncanson and Woodward 2016) in the context of analysing the extent to which women's military participation represents progress for feminism, it is insufficient to argue that the participation of military women may lead to transformations in military culture and structures. The questions are whether, where, when and how that happens. Cracking the seemingly monolithic notion of 'the military' to look at the nuance and detail around women's military participation is an important first step here.

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Forces: Lesson from Afghanistan (Reference: SG131064), Claire Duncanson (PI) with Rachel Woodward, 2013-15.

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Table 1: Percentage of women employed across the three armed forces, 2010-2014.

	1 Apr 2010	1 Apr 2011	1 April 2012	1 Apr 2013	1 Apr 2014
All services	9.6	9.6	9.7	9.7	9.9
Officers	12.2	12.3	12.4	12.6	12.7
Other Ranks	9.0	9.0	9.1	9.1	9.3
Naval Service	9.6	9.4	9.2	9.1	9.1
Officers	9.7	9.7	9.7	9.9	10.0
Other Ranks	9.6	9.3	9.1	8.8	8.8
Army	7.9	8.2	8.2	8.4	8.7
Officers	11.3	11.6	11.6	11.8	11.8
Other Ranks	7.3	7.7	7.7	7.9	8.2
Royal Air Force	13.7	13.8	13.8	13.9	13.8
Officers	15.4	15.9	15.9	16.3	16.5
Other Ranks	13.2	13.2	13.2	13.2	13.0

Source: UK Armed Forces Quarterly Personnel Report, Ministry of Defence, 1st April 2014.

Table 2 Percentage of men and women working in occupation groups, UK labour force, April to June 2013

	Men	Women
Managers and senior officials	66.9	33.1
Professional occupations	50.3	49.7
Associate professional and technical occupations	57.4	42.6
Administrative and secretarial occupations	23.4	76.6
Skilled trades occupations	90.0	10.0
Caring, leisure and other service occupations	18.0	82.0
Sales and other customer service occupations	37.3	62.7
Process, plant and machine operatives	88.6	11.4
Elementary occupations	54.3	45.7

Source: Labour Force Survey household datasets, from ONS (2013a)

Table 3: British Army, percentage of women by Arm or Corps, 1998 - 2013

ArmCorp	1998	2003	2008	2013
Staff	1.4	2.5	2.4	5.6
Royal Artillery (RA)	3.8	4.8	5.9	7.7
Royal Engineers (RE)	0.1	0.6	1.3	1.6
Royal Signals	10.3	10.5	9.6	9.0
Army Air Corps (AAC)	2.4	3.0	3.9	4.9
Royal Logistics Corps (RLC)	12.5	11.5	11.2	12.4
Royal Army Medical Corps (RAMC)	19.2	26.1	30.2	29.9
Royal Electrical and Mechanical Engineers (REME)	2.2	2.9	3.6	4.1
AGC (Adjutant Generals Corp)	24.5	28.0	31.5	32.7
Royal Army Veterinary Corps (RAVC)	20.0	29.4	25.9	30.7
Royal Army Dental Corps (RADC)	42.8	51.6	52.6	63.8
Intelligence Corps	22.2	19.8	16.7	17.0
Royal Army Physical Training Corps (RAPTC)	8.3	7.5	6.6	6.9
QARANC	74.2	70.4	67.0	65.6
Corps of Army Music	4.4	9.1	13.7	20.5
General list / officer designate	15.6	18.7	11.1	14.7

Source: Defence Statistics (Tri Service).¹³

¹³ Percentages calculated on basis of totals derived from original data provided by Defence Statistics (Tri Service). Figures include trained and untrained personnel, and exclude Full Time Reserve Service Personnel and mobilised reservists. All numbers in the original dataset have been rounded to the nearest 10 to limit disclosure and ensure confidentiality, and in the original data numbers ending in "5" were rounded to the

nearest multiple of 20 to prevent systematic bias. The order in which Arms and Corps appear in Table 2 is the order in which they appear in the original dataset.

Table 4: Royal Artillery, percentage of women by rank, 1998-2013.

Royal Artillery	1998	2003	2008	2013
OF4 Lt Col	-	-	-	-
OF3 Major	-	-	4.4	7.1
OF2 Captain	2.7	5.4	9.7	12.6
OF1 Subalterns*¹⁴	5.2	17.6	19.3	13.8
OR9 WO1	-	-	-	-
OR8 WO2	-	-	-	2.3
OR7 SSgt	-	-	-	3.5
OR6 Sergeant	-	-	2.0	5.3
OR4 Corporal	0.7	2.5	6.7	4.9
OR3 LCpl	2.0	6.5	6.5	6.0
OR2 Private	8.7	8.2	6.9	9.9

Source: Defence Statistics (Tri Service)¹⁵

¹⁴ The data for 2008 and 2013 aggregated Lieutenants and 2nd Lieutenants as Subalterns, a category we have reproduced here. The data for 1998 and 2003 listed each of these separately, but we have continued to aggregate them together in order to show trends. In summing the two categories, we have not been able to account for the effects of rounding for each of the individual categories in the original dataset.

¹⁵ For technical details on the data, see footnote to Table 3.

Table 5: Royal Engineers, percentage of women by rank, 1998-2013

Royal Engineers	1998	2003	2008	2013
OF4 Lt Colonel	-	-	-	-
OF3 Major	-	-	4.5	8.1
OF2 Captain	2.7	4.7	10.9	9.1
OF1 Subalterns*	-	17.6	12.5	14.0
OR9 WO1	-	-	-	-
OR8 WO2	-	-	-	-
OR7 Staff Sergeant	-	-	-	-
OR6 Sergeant	-	-	-	-
OR4 Corporal	-	-	-	-
OR3 Lance Corporal	-	-	0.7	0.7
OR2 Private	-	0.3	0.8	1.1

Source: Defence Statistics (Tri Service)¹⁶

¹⁶ For technical details on the data, see footnote to Table 3.

Table 6: Territorial Army (Group A) trained personnel by gender and rank, 1 April 2013.

Rank	Men (n)	Women (n)	Total (n)	Women (%)
OF6 Brigadier	10	-	10	-
OF5 Colonel	70	10	80	12.9
OF4 Lt Col	280	60	350	18.1
OF3 Major	1 310	260	1 580	16.6
OF2 Captain	1 120	300	1 420	21.2
OF1 Subaltern	290	80	370	20.7
OR9 WO1	200	10	210	5.7
OR8 WO2	1 020	60	1 080	5.3
OR7 S. Sergeant	1 050	120	1 170	9.9
OR6 Sergeant	1 650	230	1 880	12.3
OR4 Corporal	2 280	410	2 690	15.2
OR3 L. Corporal	2 760	540	3 300	16.2
OR2 Private	4 580	500	5 080	9.8
Total	16 600	2 580	19 230	13.4

Source: Defence Statistics (Tri Service)¹⁷

¹⁷ The data was classified by Defence Statistics as 'Territorial Army' rather than Army Reserve at point of delivery. Group A TA personnel can be deployed. Group B (Officer Training Corps cadets attending UK universities) cannot.

Table 7 Royal Air Force, percentage of women Officers by branch, trained, 2004

Branch	% women
GD	3.9
Flying	3.4
Operations Support (OPS SPT)	19.8
Ground Based Operations (GBO)	19.0
Total	12.0

Source: Defence Statistics (Tri Service)

Table 8 Royal Air Force, percentage of women Officers by branch, trained, 2009

Branch	% women
GD	4.8
Flying	4.4
OPS SPT	22.8
GBO	24.4
Total	14.8
Non Commissioned Aircrew	3.3

Source: DASA (AIR) Publications DASA Stat 143, 18th June 2009.

Table 9 Royal Air Force, percentage of women Officers by branch, trained, 2013

Branch	% women
Flying	3.8
Ground	20.6

Specialist	35.8
Total	16.2
Non Commissioned Aircrew	5.1

Source: Defence Statistics (Air) Publications, 1st April 2013.

Table 10 Royal Air Force, percentage of women in each Trade Group, Other Ranks, trained, 2004-2013

Trade Group	2004	2009	2013
1 Aircraft maintenance mechanic	3.1	3.6	3.8
2	2.8	n/a	n/a
3	2.8	n/a	n/a
4 Information and communication technician	n/a	10.4	8.6
5 General technician	1.8	1.9	2.7
6 Logistics driver	9.4	11.9	10.6
8 RAF Regiment	4.1	4.3	5.2
9 Flight operations assistant	25.4	26.8	24.7
10 Physical training instructor	6.8	12.0	13.3
11 Intelligence analyst	26.4	21.3	20.8
12 Aerospace systems operator	14.3	16.1	15.6
13 Survival equipment fitter	9.9	10.7	10.3
14 Photographer	15.2	20.8	20.0
15 Medical	60.4	61.6	60.1
16 Dental	81.2	81.2	85.7
17 Personnel support	37.5	42.5	47.9
18 Logistics mover and supplier	14.1	14.5	13.2
19 Logistics catering and chef	30.9	31.5	33.3
21 Musician	23.6	37.5	35.2

Total	11.8	13.2	13.4
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Source: Defence Statistics (Tri Service) for 2004, DASA (AIR) Publications DASA Stat 143; 18th June 2009; Defence Statistics (Air) Publications, 1st April 2013. Note that the categories 'TG2' and 'TG3' are used for 2004 only.

Table 11 Royal Air Force, percentage of women by rank, 2004 - 2013

	2004	2009	2013
OF5 Group Captain	2.7	6.0	6.6
OF4 Wing Commander	5.4	6.7	7.7
OF3 Squadron Leader	8.5	12.8	17.6
OF2 Flight Lieutenant	15.0	18.3	18.5
OF1 Flying Officer	28.0	31.4	21.7
OF (D) PO / APO	25	33.3	50.0
<i>Total officers</i>	<i>11.9</i>	<i>14.8</i>	<i>16.2</i>
OR9 WO1	2.1	3.3	5.1
OR7 Flight Sergeant	5.3	5.8	8.9
OR7 Chief Technician	0.5	1.6	2.0
OR6 Sergeant	7.16	10.9	13.8
OR4 Corporal	11.8	15.5	16.8
OR3 Senior Aircraftman (T) / junior technician (2013)	6.6	6.2	5.3
OR2 Senior Aircraftman	16.7	15.5	18.9
OR2 LAC/AC	20.7	13.4	6.8
<i>Total Other Ranks</i>	<i>11.3</i>	<i>13.0</i>	<i>13.4</i>

Source: Defence Statistics (Tri Service) for 2004, DASA (AIR) Publications DASA Stat 143; 18th June 2009; Defence Statistics (Air) Publications, 1st April 2013.

Table 12: Naval Service, percentage of women Officers by branch, 2003 - 2013

	2003 (trained and untrained)	2010 (trained)	2010 (untrained)	2013 (trained)	2013 (untrained)
Warfare	6.1	7	13	8	10
Engineer	4.7	7	8	8	8
Logistics	21.3	29	24	24	35
Medical	15.7	17	36	20	30
Medical services	ND	12	-	10	-
Dental	30.7	40	67	44	50
QARNNS	68.7	67	-	64	-

Source: 2003: Defence Statistics (Tri Service) 1st April 2003. 2010: Royal Naval Gender Personnel Situation Report, Defence Analytical Services and Advice, 1st September 2010. 2013: Naval Service Quarterly Gender Personnel Situation Report, Defence Statistics (Navy), 1st April 2013. Figures for 2003 calculated from combined data, trained and untrained, reflecting the original data source. Percentages calculated by sum of men and women rather than given figure in original data set which reflects rounding.

Table 13 Naval Service, percentage of women Ratings by branch, 2003 - 2013

	2003 (trained and untrained)	2010 (trained)	2010 (untrained)	2013 (trained)	2013 (untrained)
Warfare XR	13	15	13	13	8
Warfare AV	5.1	9	Included above	8	11
Engineer General	2.9	5	8	4	4
Engineer Aviation	5.1	6	Included above	6	5
Logistics	28.0	27	24	27	22
Medical	40.5	45	36	45	49
QARNNS	80.9	Included above	nd	Included above	Included above
RM Band	nd	21	-	23	32
Total	nd	10	13	9	7

Source: 2003: Defence Statistics (Tri Service) 1st April 2003. 2010: Royal Naval Gender Personnel Situation Report, Defence Analytical Services and Advice, 1st September 2010. 2013: Naval Service Quarterly Gender Personnel Situation Report, Defence Statistics (Navy), 1st April 2013.

Table 14 Naval Service, percentage of women by rank, 2009 - 2013

	2009	2010	2011	2012	2013	2013 MR
OF5 Captain	0.7	1.0	1.0	1.0	1.1	-
OF4 Commander	3.1	2.6	3.0	3.2	4.2	10.8
OF3 Lieutenant Commander	8.3	8.5	8.7	9.1	9.3	16.3
OF2 Lieutenant	13.5	14.0	13.9	13.6	13.7	18.7
OF1 Sub-Lieutenant	9.8	6.7	10.6	9.5	4.8	-
Total Officers	9.0	9.2	9.3	9.4	9.6	nd
OR9 WO1	3.1	3.8	3.9	4.2	3.9	-
OR8 WO2	0.1	0.3	0.5	0.5	0.4	-
OR7 Chief Petty Officer	4.1	4.5	4.9	5.2	5.4	8.1
OR6 Petty Officer	7.6	7.6	7.6	7.5	7.5	14.6
OR4 Leading Rate	11.1	11.3	11.7	12.0	12.0	21.2
OR2 Able Rating	12.9	12.7	11.7	10.9	10.5	15.6
Total Ratings	9.5	9.6	9.4	9.1	9.0	nd

Source: 2003: Defence Statistics (Tri Service) 1st April 2003. 2010: Royal Naval Gender Personnel Situation Report, Defence Analytical Services and Advice, 1st September 2010. 2013: Naval Service Quarterly Gender Personnel Situation Report, Defence Statistics (Navy), 1st April 2013.