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Announcement of Methodological Changes to General Practice Workforce Statistics

Contents

Introduction

The General Practice Workforce series of Official Statistics presents a snapshot[1] of the workforce at the point that the data is collected. We present full-time equivalent[2] (FTE) and headcount figures by four staff groups, (GPs, Nurses, Direct Patient Care (DPC) and administrative staff), with breakdowns of individual job roles, within these high-level groups.

We collect record-level data on all staff directly from general practices using a real-time online collection tool. Each staff member's record is live and current in the collection tool, and practices are asked to make amendments as changes occur, for example when staff leave or join the practice or when someone changes their working hours. This means that if there are no changes to a practice's workforce during a reporting period, the data that we extract from the tool for that practice will be identical to the previous snapshot.

The snapshot that we publish provides details of all individuals contracted to work at the practice (including any temporary staff on long-term placements) on the extract date, and the resultant figures account for all but a tiny minority of the practice workforce; the remaining figures relate to ad-hoc locum provision.

This notice describes changes agreed for the General Practice Workforce series of Official Statistics following consultation with stakeholder groups and a formal publication review.

Ad-hoc locums

Background

In addition to details of permanent GP practice personnel, we also collect information about the ad-hoc locum GP cohort[3] (formerly described as *infrequent locums*). Ad-hoc locums are locum or sessional GPs who typically work briefly at practices to cover for short-term or unexpected absences. Depending upon the practice's needs, these GPs may work as little as a single one-off session in the entire period covered by the data collection or may be employed several times to cover multiple sessions. In some cases, practices will employ the same ad-hoc locum GP whenever they need temporary cover for sessions, while in other situations, the ad-hoc locum may work at a given practice only once.

We introduced this ad-hoc locum category in the autumn of 2017 and published the first figures for this group in the December 2017 release. Until the introduction of this category, we were able to capture information on these ad-hoc locum GPs and their working hours

[1] A snapshot statistic relates to the situation at a specific date. For these workforce statistics, it applies to the date upon which the workforce data was collected, which is the last day of each quarter, i.e., 31 March, 30 June, 30 September and 31 December. After June 2020, we will be extracting and publishing data on the General Practice Workforce on a monthly basis and each snapshot will therefore apply to the last calendar day of the month.

[2] Full-time equivalent is a standardised measure of the workload of an employed person. An FTE of 1.0 means that the hours a person works is equivalent to a full-time worker; an FTE of 0.5 signals that the worker is half-time.
For the purposes of NHS workforce statistics, we define full-time working hours as 37.5 hours per week. Using FTE, we can convert part-time and additional working hours into an equivalent number of full-time staff. We calculate FTE by dividing the total number of weekly hours worked by individuals in a specific staff group by 37.5.

[3] Note that the concept of an ad-hoc locum is an artificial construct implemented for data collection and publication purposes. GPs do not consider themselves to be "ad-hoc locums" per se, but the nomenclature can help to understand how these sessional GPs interact with practices.

only if they were employed by the practice at the time of the snapshot, (i.e., on the date of the data extract). This means that we were not able to reflect the entire contribution of this subset of the GP workforce, because GPs working on other days in the month, and the hours worked that they worked, could not be captured. This was exacerbated for months when the snapshot date was at the weekend or on a public holiday as many practices are closed on these days and their usage of ad-hoc locums was minimal.

To allow us to better understand the ad-hoc locum workforce and its contribution to the general practice workforce, we changed the data collection and issued new guidance to practices. Instead of providing information for a snapshot of the ad-hoc locum workforce, since December 2017 practices have used a separate part of the collection to tell us the ad-hoc locum's name, GMC number (General Medical Council professional registration number) and the total number of hours that each ad-hoc locum worked during the reporting period. As this is a subset of the data that we collect for the permanent practice staff, we know less about this cohort than we do about the main practice workforce. Nonetheless, it has greatly enhanced our understanding of the sessional GP workforce. The time series for the figures relating to ad-hoc locums begins in December 2017 when we first collected this data.

The fact that the ad-hoc locum figures are calculated differently means that the measures are not directly comparable with the snapshot of the main workforce.

Some ad-hoc locums work exclusively as sessional GPs providing short-term, short-notice or other temporary cover as described. However, some hold other roles within the general practice workforce in addition to acting as ad-hoc locums. For example, they may work in long-term locum placements in another practice, on fixed term contracts or as salaried or other GPs.

We publish FTE and headcount figures for ad-hoc locums in Annex B of the bulletin table. This Annex includes headcount figures (counts of individuals) that we can identify as also working in other roles within the general practice workforce. Care should be taken when interpreting the ad-hoc locums and associated roles headcount figures as the same individual may be counted multiple times. For example, an ad-hoc locum included in the figures for salaried GPs who worked some ad-hoc locum sessions may also be included in the counts of longer-term locums.

Monthly reporting

In addition, from June 2021, we will be extracting data and publishing the General Practice Workforce statistics every month rather than each quarter, which means that headcount figures produced for the ad-hoc locum GPs for July 2021 onwards will not be comparable to the quarterly totals previously published as the definition of the metric will change from the number (headcount) of ad-hoc locums used in a quarter to the number of ad-hoc locums used in a month. This means that when we begin publishing monthly figures we will introduce an unavoidable break in the ad-hoc locum headcount time series in Annex B. As the ad-hoc locum FTE figures are calculated measures, the change to the frequency of the publication has no implications for the FTE time series and no break is required.

Timeliness and reliability

Feedback from General Practices has identified difficulties in being able to provide data on their usage of ad-hoc locums to the required deadline. In particular, concerns have been

raised that there can be a delay of a month or longer between the sessions worked and the data being available.

As one of the uses of the GP Workforce Official Statistics is to understand variations in seasonal demand, data accuracy is important.

Therefore, we will extract and report information on the ad-hoc locums to slightly different timescales and allow practices to submit this information a month in arrears. This means that when we begin publishing monthly figures, FTE and headcount information on ad-hoc locums will not yet be available and there will be a slight lag in the availability of figures in Annex B. Therefore, while the snapshot of the rest of the workforce will be published approximately five weeks after month-end, information about the ad-hoc locums for the same period will be available slightly later. The length of the delay is not yet confirmed, but we expect that ad-hoc locum FTE and headcount figures for July 2021 will be included in Annex B of the bulletin tables for the September data extract if not sooner.

We will continue to work with General Practices to better understand their ad-hoc locum usage and the delay in data availability, and to ascertain what – if anything – can be done to enable them to supply the data any sooner.

Interpretation of ad-hoc locum figures

When interpreting the ad-hoc locum headcount figures, it is important to note that most ad-hoc locum GPs work only a few sessions during a reporting period, and many of these GPs have no other role in the primary care workforce i.e., they do not appear elsewhere, for example as salaried GPs.

For example, between July and September 2020, 1,765 distinct individuals were identified as working as an ad-hoc locum GP. However, of these GPs, 1,213 worked in no other roles in the general practice workforce and most worked very few hours during the quarter. As a group, they therefore contributed 1,213 to the headcount figures, but accounted for only 45 of the total FTE. This means that the inclusion of ad-hoc locums in the GP headcount totals risks distorting the figures and could provide a misleading picture of the workforce.

It is also important to bear in mind the ad-hoc locums are not necessarily providing additional resource for the general practice workforce as they tend to work in practices to provide temporary, short-term cover for short periods of sickness or other absence. (GP absences of longer duration, such as for maternity or paternity leave, or long-term sickness are likely to be covered in a different fashion, such as with a GP on a fixed-term contract.)

While it is important to understand and quantify the scale of the contribution of ad-hoc locums to the general practice workforce, nonetheless, there is a risk that including them in the main workforce totals artificially inflates our understanding of the figures, as in most cases they are not increasing capacity within the workforce. For example, a GP working 37.5 hours per week who is absent due to sickness for a week is still a member of the practice's workforce and is counted in the statistics with an FTE and headcount of one. At the same time, an ad-hoc locum providing cover would also contribute one to the headcount figures and a pro-rata'd amount to the FTE total. This means that two people would be counted for the week in question, but with only one available to work, thus distorting the figures.

Changes to ad-hoc locum reporting from June 2021, revision of time series and historical CSVs

Because the ad-hoc locum counts are calculated differently and are not comparable to the snapshot of the main practice workforce figures, and due to the imminent transition to monthly publications, the unavoidable lag in availability of the ad-hoc locum data, and complications with interpretation of the ad-hoc locum figures we will remove FTE and headcount figures for ad-hoc locums from the entire time series in all the main publication tables and will publish information about ad-hoc locums only in Annex B.

This means that counts of ad-hoc locums will no longer be reflected in any of the GP or practice staff FTE and headcount figures but will be included only in the separate Annex B tables.

We will also remove ad-hoc locum data from all historical practice-level and individual-level CSVs.

For the reasons outlined, since monthly ad-hoc locum figures will not be available to the same timescales as the main practice workforce figures, there will be a one to two-month delay in the availability of the ad-hoc locum FTE and headcount figures.

To provide a more complete picture of the primary care medical workforce, we plan to introduce a new series of high-level summary Official Statistics that will calculate quarterly Primary Care Workforce statistics across general practice, Primary Care Networks, and other provision, and will include the ad-hoc locum measures in the FTE and headcount totals. We hope to launch this new series from autumn 2021.

Impact of removing ad-hoc locums from the bulletin figures

Removing the ad-hoc locum FTE and headcount figures from the main bulletin figures will lower the GP counts from December 2017 onwards. However, these figures will still be available in Annex B, and we will provide guidance on how to interpret the data.

Removing ad-hoc locums from the bulletin figures will affect some of the rates per 100,000 patients included in Table 5 of the Excel Bulletin but as this cohort is a small part of the total GP workforce (around 5%), the impact on these rates is low.

Estimated figures

Background

We first collected information on the general practice workforce directly from practices in September 2015; prior to this point, the statistics were based upon annual census figures taken from the National Health Authority Information System (NHAIS), and statistics based upon that collection are not comparable with figures in this series.

The completeness and coverage of the data that we collect from practices has been improving since the first collection in September 2015 when we received workforce information from 88.1% of practices, whereas 99.6% of practices provided workforce data for the extract in June 2021. It is also important to note that the completeness and coverage of the data varies according to the staff group and more information is available in Annex A in the Excel Bulletin.

To mitigate for poor-quality, incomplete, or missing data, until June 2021 two estimation methodologies have been used: partial estimates for incomplete records and full estimates for missing data.

Partial estimates for incomplete, or poor-quality data

We calculate partial estimates where the GP practice provides a record for an identifiable individual but does not include information about their contracted or working hours. As we have data about the individual, their job role, contractual arrangements, gender and so on, but are missing only details of their working patterns, we calculate an estimate of their working hours based upon the national average for their job role. We use these estimates when we calculate FTE figures for these roles. We will continue to calculate these estimated working hours and FTE figures.

The scale of these partial estimates varies by staff group and the percentage of records with estimated working hours and FTE figures are included in Annex A of the Excel Bulletin.

Full estimates for missing or incomplete data

In some cases, practices provide no information or incomplete/invalid data for one or more of the staff groups (GPs, nurses, DPC and administrative staff) and in these cases, we have historically calculated CCG-level FTE and headcount estimates for every job role within the staff group based upon national staffing levels and the registered patient count for the practices affected. We produced these fully estimated records at CCG-level only, not for individual practices and did not produce estimates by age, gender, or other personal characteristics.

In a very few cases, we calculated these estimates for all four staff groups at a practice, but this was the exception, and in most cases, practices submitted valid data for at least one of the staff groups.

The FTE and headcount estimates were calculated according to perceived levels of local need for each job role and were based upon the national staffing patterns. However, it seems improbable that all practices and CCGs have an equal need for staff in every staff group or job role, as each practice has its own unique set of patients which will have differing needs. Furthermore, the creation of Primary Care Networks (PCNs) in 2019 has introduced significant changes to the national primary care workforce. PCNs work collaboratively with general practices and other health and social care providers and share staff – primarily in the DPC group – across the network. This means that it is increasingly likely that PCNs will employ DPC staff and that fully estimated records will inflate figures for this particular staff group.

When we created FTE and headcount estimates as described, in addition to including the estimates in CCG, STP and England-level totals, we also created “synthetic records” for the estimated job roles and included them in the Individual CSVs that accompany each publication. The Individual CSV provides an anonymised row per staff record for every job role held and is produced at CCG level only, to ensure that no individual can be identified within the data. This Individual CSV can be interrogated by users to better understand the workforce, as users can group and analyse the data according to their specific needs. The Practice-level CSV includes summary counts by job role but did not include any fully estimated records as these estimates were calculated at CCG-level only.

In the spring of 2021, we undertook a comprehensive review of the principles and methodology for producing fully estimated records and consulted our stakeholders. As a result of these activities, **we will no longer produce estimates for missing data, we have revised the entire time series to remove these estimates from historical figures and we have withdrawn all fully estimated synthetic records from the Individual-CSVs and reissued all of these files.**

Exceptions

There are two minor exceptions to the withdrawal of fully estimated records:

- Locums records September 2015 to December 2016
  Following the introduction of revised guidance early in 2017, there was a large increase in locum FTE and headcount figures in March 2017 which we believe is primarily due to improvements in how the data was recorded rather than being indicative of a sudden rise in locum usage. In consultation with stakeholders, we calculated estimated FTE figures for the earlier reporting periods and these estimates have been retained.
  It was not possible to calculate estimated headcount figures so there is an unavoidable break in the headcount time series at March 2017.

- In June 2018, Health Education England's (HEE) Trainee Information System (TIS) became the primary source of data for GP registrars (GPs in training grades). This is a more detailed and complete data set than our previous source and made it evident that we were under-reporting GP registrar counts in earlier collections. In consultation with our stakeholders, we therefore calculated England-level GP registrar FTE and headcount figures for September 2015 to March 2018 and these have been retained.

Impact of removing fully estimated records from the bulletin figures

The completeness and coverage of the data provided by practices has improved since the first collection in September 2015 when only 88.1% of practices submitted data. We have therefore created fewer fully estimated records as the data quality has improved.

The completeness and coverage of the collection also varied by staff groups, so the impact of withdrawing the fully estimated figures will be different for each staff group.

Table 1 details the percentage of fully estimated records for each staff group since September 2015.

Table 1 Percentage of fully estimated records by staff group

Reporting period	GPs	Nurses	Direct Patient Care staff	Admin/Non-clinical staff
September 2015	5.9%	8.8%	29.6%	9.8%
March 2016	3.4%	6.6%	26.3%	5.4%
September 2016	3.1%	5.9%	25.1%	4.4%
December 2016	2.6%	..	..	..
March 2017	2.5%	5.4%	23.9%	3.7%
June 2017	2.0%	..	..	..
September 2017	1.7%	4.6%	23.1%	2.6%
December 2017	1.7%	4.7%	23.0%	2.6%
March 2018	1.7%	4.7%	21.7%	2.5%
June 2018	1.6%	4.9%	21.5%	2.5%
September 2018	2.4%	3.8%	20.5%	1.9%
December 2018	1.8%	3.2%	20.4%	2.0%
March 2019	1.8%	3.4%	19.8%	1.8%
June 2019	1.9%	3.8%	19.1%	1.9%
September 2019	1.5%	3.4%	18.5%	1.4%
December 2019	1.4%	3.6%	17.7%	1.3%
March 2020	1.5%	3.7%	17.3%	1.3%
June 2020	1.1%	3.7%	16.6%	1.2%
September 2020	1.1%	3.5%	16.5%	1.2%
December 2020	1.1%	3.7%	16.1%	1.1%
March 2021	1.1%	3.5%	15.6%	1.0%

.. denotes not available as we collected only GP data for these reporting periods.

In all cases, withdrawing the fully estimated records will lower the FTE and headcount figures.

Zero hours contracts

Background

We collect details of the contractual arrangements of GP practice staff, which includes zero hours contracts and partner (zero hours). The processing of data for staff on these two types of contracts was inconsistent and varied by staff group.

We expect practices to submit zero for contracted working hours for these staff and provide details of their average weekly working hours as applicable. However, average weekly working hours for these staff can vary from one reporting period to another and sometimes an individual will work no hours during a particular period. If no information on average working hours was provided, we created estimated FTE figures based upon national averages for the affected job role.

Conversely, if contracted or average working hours information was provided for staff on partner (zero hours) contracts, the hours figures were set to zero and did not contribute to overall FTE totals.

Although the number of staff on zero hours contracts is low and few staff records were affected, nonetheless from June 2021, we have taken the opportunity to revise the historical time series and processed all data relating to all zero hours contract staff as follows:

- If no average working or contracted hours are recorded for the reporting period, the individual is excluded from the headcount figures and contributes zero to the staff group's FTE
- If average working or contracted hours are recorded for the reporting period, the individual is included in headcount figures and their working hours are included in FTE calculations
- We do not calculate any estimated working hours or FTE figures for staff on zero hours contracts

Impact of changing processing of records for staff on zero hours contracts

Relatively few staff are employed on zero hours contracts and the effect of this change is minimal.

GPs in Training Grade

Until June 2021, GPs in training were referred to as "registrars" in the main publication with some additional information about their placement grades included in the CSVs. This category included trainees on foundation placements although we have been advised that they should not be classified as GP registrars. As a result, we have renamed the group to be "GPs in Training Grade."

To enable users to better understand the GPs in training workforce, we have provided more granular detail about their placement grades in the published CSVs by assigning them to one of the following detailed staff roles:

- GPs in Training Grade F1/2
- GPs in Training Grade ST1
- GPs in Training Grade ST2
- GPs in Training Grade ST3
- GPs in Training Grade ST4
- GPs in Training Grade Other

We have been using data from Health Education England's (HEE) Trainee Information System (TIS) for information on GPs in Training Grades since June 2018. Figures for these GPs prior to June 2018 include some estimated figures which we allocated to placement grades (ST1-4, F1/2 or other) in line with the ratios in the June 2018 TIS data. More

information is available in the Methodological Change Notice that accompanied the General Practice Workforce publication for December 2018 and the Data Quality Statement released for September 2019.

This change has no impact upon the FTE and headcount totals, but simply provides greater detail for users.

CCG structure

In April, at the beginning of the financial year, it is common for some restructuring of CCGs to take place. Some CCGs close, others may merge to form new organisations, and practices may change CCG membership. When we publish CCG-level figures in the Excel Bulletin table, we always reflect the current CCG structure and associated practice membership.

Every year, we reprocess the practice-level and individual-level CSVs to reflect the latest CCG structure. We usually release these revised files with the publication of March's data, but this was delayed while we implemented the other revisions and methodological changes described.

This change has no impact upon the FTE and headcount totals.

Summary of changes

- Removal of ad-hoc locum FTE and headcount figures from the main time series and publishing separately in Annex B and revision of timeseries back to December 2017
- Removal of fully estimated records for the main GP workforce
    - Revise the entire time series at England and sub-national levels
    - Remove all synthetic estimated records from the Individual CSVs and publish replacement files
    - Update Annex A to show the percentage of practices for which no workforce data has been provided and retain percentages of partially estimated records for the four staff groups
- Revision of FTE and headcount figures for staff on zero hours contracts and partner (zero hours) contracts
- Provision of more detail on GPs in Training Grade groups in the CSVs
- Remapping to new CCG structure for historical Practice-level and Individual-level CSVs

Impact of methodological changes

Because of the large number of methodological changes, we have revised the entire time series of these Official Statistics back to September 2015.

Figures in the publication of data for June 2021 are not comparable with any earlier releases which should not be used.

For the publication of June 2021 data, we have issued new Practice-level and Individual-level CSVs mapped to the CCG structure as of 1 April and withdrawn fully estimated records from the Individual CSV; previous versions of these files should no longer be used.

The withdrawal of estimates back to September 2015 could mean that for publications where the completeness and coverage were lower than they are now – particularly in the earlier years – early figures could be under-representing the true size of the workforce. Conversely, more recently, it is possible that these estimates, particularly for DPC staff, resulted in our over-representing the size of the workforce as PCNs began to offer much of this provision to local populations. Therefore, withdrawing the estimates could be correcting this double-counting.

Similarly, reporting the ad-hoc locum contribution separately in Annex B enables us to retain this valuable information about this cohort but reduces the risk of distorting the picture of capacity within general practice.

The quality of the data is of paramount importance when deciding how confident we can be in the resultant figures. We and our partners are committed to improving the quality and timeliness of the data and will continue to work closely with and support practices to provide high-quality, reliable data. As the data completeness and coverage improves, users will be able to have greater confidence that increases in workforce counts are real and represent true growth in capacity. We will continue to provide contextual information in Annex A about the percentage of practices submitting data to us and the percentage of records in each staff group that include estimated working hours.

Timing

These changes have been implemented in the General Practice Workforce publication on 5 August 2021. All England-level figures in the time series have been recalculated. We have revised all figures in the practice-level and individual-level CSVs but will not recalculate the sub-national figures

Further information

If you have any comments or questions about these changes, please contact NHS Digital on 0300 303 5678 or email PrimaryCareWorkforce@nhs.net.