Table S1: Descriptive statistics of workforce variables, FTE per 10,000 patients, across all quarters with available data.

<table>
<thead>
<tr>
<th>Variable</th>
<th>Mean</th>
<th>Std.Dev.</th>
<th>Min</th>
<th>Max</th>
<th>Missing</th>
</tr>
</thead>
<tbody>
<tr>
<td>GP</td>
<td>5.46</td>
<td>2.25</td>
<td>0</td>
<td>20</td>
<td>1.48%*</td>
</tr>
<tr>
<td>Nurse</td>
<td>2.65</td>
<td>1.76</td>
<td>0</td>
<td>92.44</td>
<td>2.28%*</td>
</tr>
<tr>
<td>Total Direct Patient Care staff</td>
<td>1.88</td>
<td>2.20</td>
<td>0</td>
<td>80.50</td>
<td>4.09%*</td>
</tr>
<tr>
<td>Physician Associate</td>
<td>0.02</td>
<td>0.18</td>
<td>0</td>
<td>5.60</td>
<td>4.07%</td>
</tr>
<tr>
<td>Pharmacists</td>
<td>0.12</td>
<td>0.36</td>
<td>0</td>
<td>23.14</td>
<td>4.07%</td>
</tr>
<tr>
<td>Physiotherapist</td>
<td>&lt;0.005</td>
<td>0.06</td>
<td>0</td>
<td>3.14</td>
<td>4.07%</td>
</tr>
<tr>
<td>Occupational Therapist</td>
<td>&lt;0.001</td>
<td>0.01</td>
<td>0</td>
<td>1.82</td>
<td>4.07%</td>
</tr>
<tr>
<td>Podiatrist</td>
<td>&lt;0.001</td>
<td>0.01</td>
<td>0</td>
<td>1.75</td>
<td>4.07%</td>
</tr>
<tr>
<td>Paramedic</td>
<td>0.05</td>
<td>0.25</td>
<td>0</td>
<td>5.06</td>
<td>4.35%</td>
</tr>
<tr>
<td>Social Prescribing Link Worker</td>
<td>0.01</td>
<td>0.14</td>
<td>0</td>
<td>6.45</td>
<td>4.84%</td>
</tr>
<tr>
<td>Pharmacy Technician</td>
<td>0.01</td>
<td>0.11</td>
<td>0</td>
<td>4.20</td>
<td>4.84%</td>
</tr>
</tbody>
</table>

*Percentage of missing values in datasets before substitution, as described in the methods.
Figure S1: Quarterly graphs of mean staff per 10,000 patients by IMD decile, with regression line plotted in red.

Mean GPs per 10000 patients by IMD decile

Mean Direct Patient Care Staff per 10000 patients by IMD decile

IMD 0=Least Deprived  IMD 1=Most Deprived
Mean Nurses per 10000 patients by IMD decile

Mean Physician Associates per 10000 patients by IMD decile

IMD 0=Least Deprived    IMD 1=Most Deprived
Figure S2: Slope indices of inequality (SIIs) over time using Head Count instead of Full Time Equivalent workforce data.

* A negative SII value indicates fewer GPs employed in more deprived deciles.

* A positive SII value indicates more nurses employed in more deprived deciles; a negative SII value indicates fewer nurses employed in more deprived deciles.
Slope Index of Inequality

Practice-level SII

September 2015 - December 2020

-3 -2.5 -2 -1.5 -1 -0.5 0 0.5 1 1.5 2 2.5 3

Practice-level SII adjusted

95% CI Upper/Lower

*A negative SII value indicates fewer total DPC staff employed in more deprived deciles.

Practice-level Slope Indices of Inequality (SIIs*)

for Total Direct Patient Care (DPC) Staff

September 2015 - December 2020

Practice-level Slope Indices of Inequality (SIIs*)

for Pharmacists

September 2015 - December 2020

Practice-level Slope Indices of Inequality (SIIs*)

for Physician Associates (PAs)

September 2015 - December 2020

*A positive SII value indicates more pharmacists or PAs employed in more deprived deciles.
Practice-level Slope Indices of Inequality (SIIs*)
for Paramedics
September 2016 - December 2020

*A negative SII value indicates fewer paramedics employed in more deprived deciles.