Lewisham and Greenwich NHS Trust

Witness Name: Dr Elizabeth Aitken

Statement No.:1

Dated: 16 April 2024

UK COVID-19 INQUIRY

WITNESS STATEMENT OF DR ELIZABETH AITKEN

Former Chief Medical Officer, Lewisham and Greenwich NHS Trust

Appendix A: Statement of truth

Appendix B: List of exhibits supporting the statement (provided separately)

Appendix C: Reference table confirming responses to the rule 9 request

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Module 3 of the UK Covid-19 Public Inquiry ("the Inquiry")

Request for Evidence under Rule 9 of the Inquiry Rules 2006

Reference for Request - M3/QEH/01

Hospital: Queen Elizabeth Hospital

I, Dr Elizabeth Aitken will say as follows: -

1 Background and Context

1.1 Queen Elizabeth Hospital (QEH) is in Woolwich, London and is part of the Lewisham and Greenwich NHS Trust ('the Trust'). The hospital serves the local population of approximately 550,000 residents who live within the Royal Borough of Greenwich and the London Borough of Bexley. Both these London boroughs have ethnically diverse populations and pockets of extreme health and social deprivation.: Healthy life expectancy for both boroughs is shown in the following table:

Table 1: Healthy life expectancy:

	Men	Women
Royal Borough of Greenwich	60.11 years	67.17 years
London Borough of Bexley	66.39 years	63.94 years
Range across London boroughs	59.48 (Newham) - 70.23 years (Richmond upon Thames)	57.8 (Tower Hamlets) – 70.14 (Wandsworth

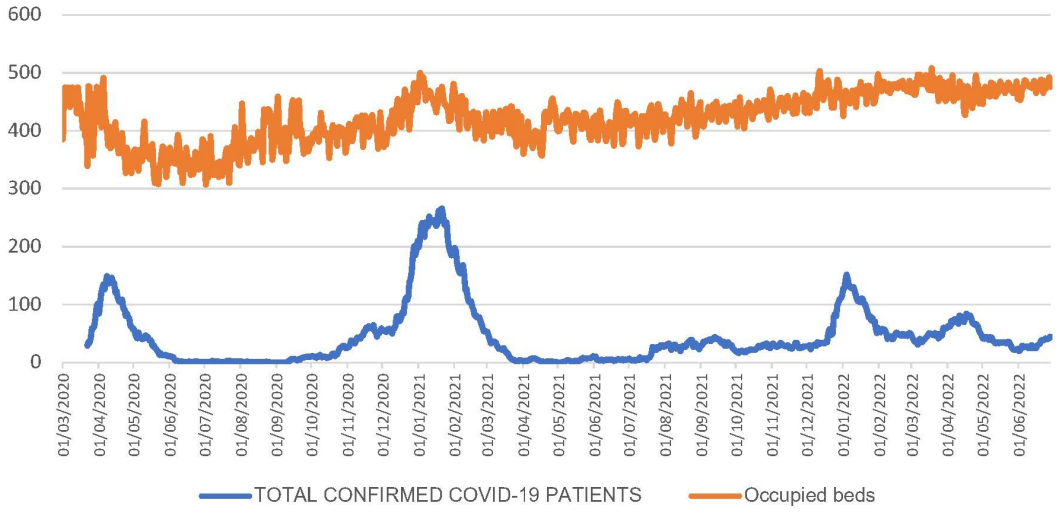
Source: London's Poverty Profile 2022

1.2 Approximately 3,000 staff are employed by the Trust to work at the QEH site, which has on average 500 beds across 23 wards. This is substantially unchanged since the period under review by the Inquiry (1 March 2020 to 28 June 2022). QEH provides a full range of health services consistent with a district general hospital - including urgent and emergency care, maternity services and a range of specialist services. The QEH emergency department is one of the busiest in London - regularly receiving more than 500 patients per day. During the pandemic I was the clinician responsible for all the inpatient wards on both sites.

1.3 The first Covid-19 patient in London was diagnosed at the Trust at the Emergency Department (ED) at Lewisham Hospital (the Trust's other hospital site) on 9/2/2020, and the Trust identified its first positive inpatient on the QEH site on 8/3/2020. From then on, numbers steadily rose, reaching an initial peak on 8/4/2020, when the Trust had 350 confirmed or suspected in-patients with Covid-19 across both sites. The following graph shows levels of covid positive patients on the QEH over the relevant period.

1.4 The Trust was amongst the first in the country to see a rapid growth in the number of covid patients, and the spread of the virus within the local catchment areas was substantially ahead of the national trend. The operational impact presented by the pandemic for services on the QEH was therefore on a scale for which there was no national planning or preparedness. Whilst throughout the pandemic I worked closely with my executive colleagues at the Trust, to ensure the organisational response was the best it could be, the volume and enormity of the daily decisions I was making as CMO to lead the site's response between March and May 2020 meant that I felt considerable pressure and exposure as a leader.

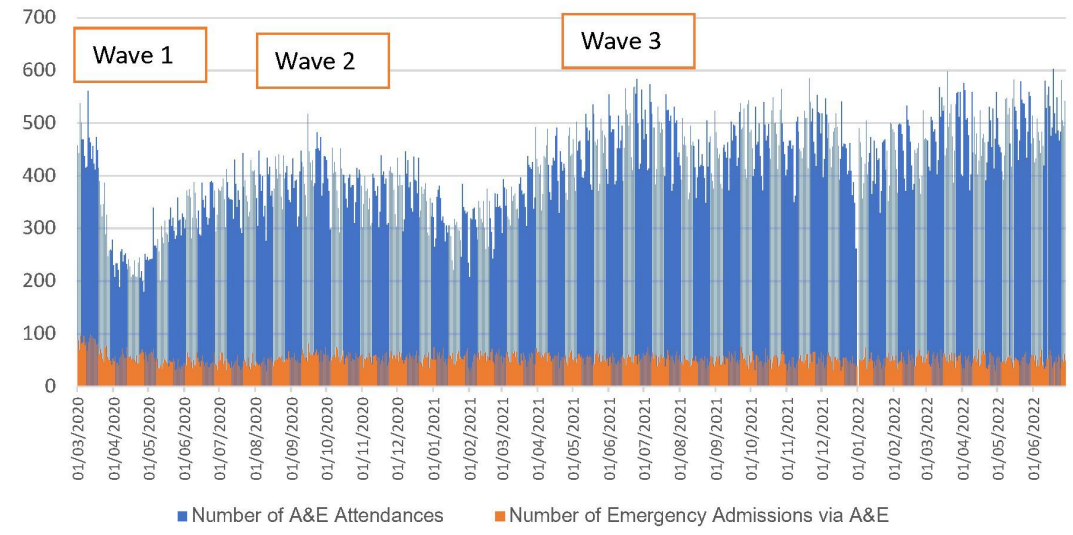
Graph 1: QEH: Confirmed Covid-19 patients



Source: Bed data submitted to the national Urgent and Emergency Care (UEC) sitrep from the data provided by the daily Clinical Site Management (CSM) reports provided by the site teams

An expanded version of the above graph is provided as an exhibit (Exhibit EA/01a- INQ000470126)

Graph 2: QEH: ED admissions and ED attendances



Source: Data submitted to the national Urgent and Emergency Care (UEC) sitrep from the data provided by the daily Clinical Site Management (CSM) reports provided by the site teams

An expanded version of the above graph is provided as an exhibit (Exhibit **EA/01b** *INQ000470127)*

1.5 Following the initial covid wave in April 2020, levels of hospital and community acquired covid started to decline over the summer of 2020 and the Trust was able to restart planned services in an incremental way, developing robust measures to keep patients and staff safe. However, in the autumn, a further surge of the virus caused staff absences and inpatient covid numbers to rise again and, at the height of the wave, in January 2021, the site was caring for 250-300 confirmed or suspected covid positive patients.

The operational response

1.6 The covid-19 pandemic has dominated activities at the Trust during significant periods throughout the relevant period and has had a substantial impact on the delivery of operational plans and performance metrics reported by the Trust during these periods.

1.7 Upon the declaration of the Covid-19 pandemic by the World Health Organisation (WHO) on the 11/3/2020 the Trust put in place 'command and control' measures to manage its response. Site-based Command Centres were rapidly resourced and run by senior onsite clinical and operational teams who were able to lead onsite operational decision making every day (seven days per week). As part of this I reviewed 'on-call' arrangements and introduced a seven-day rota for a 'Trust Clinical on-call' Director' (who would be the CMO, deputy CMO, Chief Nurse (CN) or Deputy CN) to sit alongside the Trust's designated Director on-call.

1.8 Given it was immediately clear the Trust's response to the pandemic would necessitate significant levels of immediate and significant decision taking by local leadership teams, I worked with executive colleagues to establish revised short-term governance arrangements

for the Trust, and created a governance structure that would enable effective and timely challenge of key decisions, and full Board oversight of all significant decisions made. This structure (which remained in place throughout the first wave of the pandemic, and which was adapted for subsequent waves) included:

- Weekly (private) meetings of the Trust Board
- 2x Daily (Gold) Executive Director meetings to oversee the Trust's strategic response and decision making. Throughout the pandemic the roles of Chief Operating Officer and Chief Nurse were jointly held by the Chief Nurse.
- 2x Daily (Silver) Operational leadership meetings to manage the Trust's operational response.
- Processes to log all decisions made by leadership officers and to capture changes in the Trust's policy and approach.
- The development of a 'covid risk register' which could be discussed regularly at Executive Director meetings and reported to the Trust Board.

1.9 At the organisational level, management established a single point of contact for all covid related queries through a designated 'Covid Command Inbox', and a series of agreed priority workstreams each led by different members of the Trust's Executive leadership team.

1.10 Establishment of key workstreams which included the following:

Covid workstreams		
Critical Care Unit (CCU)	• CCU ventilation requirements • Step down requirements • Staff resource for CCU	• PPE requirements for CCU • Demand / capacity • Dependencies with other divisions
Policy and Communication	• Receive, track and note all changes to regional and national guidance. • Summarise and distribute to relevant parties.	• Receive, prioritise and coordinate ad hoc central requests for information
Staff welfare	• Staff welfare • Emotional support for staff • Practical support for staff - food, accommodation, parking	• Liaison w local partners rejoined up approach for staff support • Managing and co-ordinating external offers of support
Workforce	• Redeployment / Return to practice / Working outside specialty • Absence / Attendance / Adjustments • Workforce policy	• Streamlining arrangements with other providers
Estates and Logistics	• Mortuary capacity • Oxygen • Electricity	• IT • Security
PPE	• PPE	•
End of Life Care	• Guidance re Covid EoL • Treatment escalation plans • Pathways adjustments • Discharge	• Ethics committee • Holistic care for dying and Mental / emotion staff support • Staff training
Patient pathways	• Outpatient pathways • Virtual wards • Hospital pathways	•
Recovery	• Monitoring of waiting lists • Re-establishment of elective pathways	

1.11 At the height of the pandemic, all workstreams were running seven days a week. Each workstream had a named accountable executive lead and project lead responsible for delivery. For the first few months workstreams were very much executive led, it was only in July 2020 that the daily arrangements were revised to a single daily silver and gold meeting.

1.12 During subsequent covid-19 waves, the Trust moved to a virtual Command Centre arrangement which was more efficient, less resource intensive and enabled compliance with infection, prevention and control guidance.

1.13 The Trust's daily rhythm of response also included participation in the South East London (SEL) daily calls – during which clinical and operational leaders across SEL met to facilitate access to mutual aid and ensure consistency of the way guidance was interpreted and implemented (e.g. Visiting/infection prevention and control (IPC/ testing). The SEL calls were initially phone calls, the first call at a system level being on the first day that the Trust required support with critical care capacity, and these calls continued throughout the period covered by this report. During periods of high covid levels the system calls became daily, and at times were twice daily, but at other times were scaled back to weekdays. The discussions covered a structured format, which included hospital site capacity, critical care (CC) capacity (with update from the SELCC cell), personal protective equipment (PPE), IPC, staffing, communications and as the pandemic progressed elective recovery position, vaccine, and testing. As familiarisation across teams increased, and technology arrangements developed, the calls transitioned to Microsoft Teams calls.

1.14 In anticipation of the second wave in Autumn 2020, the executive leadership team took a decision to implement 'Phase 2' of the Trust's agreed covid escalation plan which had been developed in the wake of the first wave to ensure management could put in place the measures needed to respond to any future covid waves. This decision was based on evidence of an increase in the number of covid positive patients, pressures on bed capacity, covid transmission rates in the local community and rising staff absence. The Trust's Covid-19 Escalation Plan from October 2020 is provided as an exhibit to this document (Exhibit EA/01 - INQ000428889).

2 Staffing Capacity

2.1 Maintaining appropriate staffing levels across the QEH site throughout the pandemic presented one of the most significant challenges. In February 2020, following a period of focused activity on the Trust's recruitment and retention levels, the Trust's vacancy level was reported as 10.8% (below the Trust's target of 12%).

2.2 At the outbreak of the pandemic the Trust experienced high levels of staff absence. In part this was due to a high number of staff with covid, but notably the need for groups of staff to shield and isolate (for period of up to 14 days) presented a significant challenge.

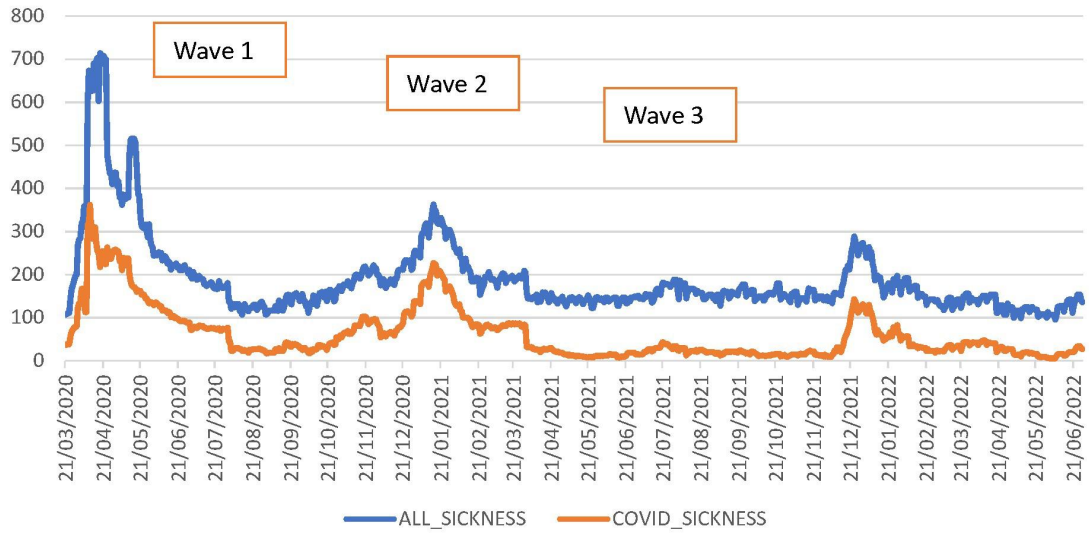
2.3 To maintain consistent and safe ratios of clinically trained staff across the Trust's sites I worked closely with the Trust's Chief Nurse to monitor all areas daily. During each wave we sought to redeploy both clinical and non-clinical staff as needed to prioritise care to patients (e.g. from surgical/ outpatient and elective pathways to acute pathway) and from corporate areas to support more urgent work or clinical activity in areas facing increased levels of demand. Where training was needed for staff working in unfamiliar areas this was provided, enabling management, over several waves, to build a register of staff that could be redeployed at short notice. In addition, when needed (and where available) the staff sought to bring in bank and agency staff on a temporary basis, although the Trust did experience some reluctance amongst temporary staff to take on shifts working within areas treating covid-19 patients.

2.4 One area that came under immediate staffing pressures at the outbreak of the pandemic was critical care. Throughout March and April 2020, the Trust admitted rising numbers of critically unwell covid-19 patients to critical care, with a proportion of these requiring onward transfer to tertiary centres, as well as extended periods in our own units. The rapid expansion of critical care beds put particular pressure on critical care nursing ratios coupled with high sickness rates and a reluctance for general nursing staff to be redeployed to critical care. In line with national guidance, and because ICU patients require such constant attention, critical-care nurses in the Trust's critical care departments would typically only caring for one or two patients at a time. However, during the peaks of the pandemic period flexibility in relation to staffing models and delivery of care was required, with sustained reliance on support of staff from other wards and departments. Following the Chief Nursing Officer (CNO) England agreement that nursing ratios for critical care patients could be increased, critical care nursing staff at the QEH site were working with an increased number of patients. On several occasions during the first few covid waves the site operated with minimal 4:1 staffing ratios. Other staff supported the trained nurses, with pharmacy staff preparing medications for administration, and medical students supporting the department by delivering shifts both on the 'proning rota' and as 'runners' for the trained nursing staff.

2.5 Sickness and covid isolation rates for all Trust staff are shown in the following graph. As can be seen from the data, the highest rates of absence were recorded at the outbreak of the

pandemic prior to the development of any vaccine, and when strict guidance was in place requiring any person who may have come into contact with the virus (at home or at work) to self-isolate for up to fourteen days. During the early days of the pandemic, whilst many staff were absent from the Trust because they experiencing symptoms associated with the virus, it is also believed that a significant proportion of those identified as absent in March 2020 were likely to have been isolating as a precaution only. As can be seen in the graph, the levels of absence reduced considerably in latter waves. This reduction is likely to reflect a number of factors including increased levels of immunity (given the number of staff who were known to have contracted the vaccine and development of the covid vaccine) and reduced need for staff to isolate as a result of the introduction of lateral flow testing.

Graph 3: Recorded sickness and covid isolation (Mar 2020 - Jun 2022)



An expanded version of the above graph is provided as an exhibit (Exhibit **EA/01c** *- INQ000470128)*

Source: Trust record of recorded sickness throughout the relevant period

Medical staff on QEH wards

2.6 Medical wards also faced considerable staffing challenges. To ensure appropriate medical staffing levels on the medical wards three junior "teams" were set up to cover a cluster of wards, as opposed to the usual ward cover which allocated staff to a single ward. This allowed the team to flex the medical workforce and maintain safe staffing levels. Extra locum staff were employed to provide additional cover, and non-clinical staff from across the organisation were used.

2.7 At an early stage (16/03/2020) I took the step of establishing parallel medical rotas to mitigate the risk of staff absence. This ensured that there were always two consultants and two registrars available to work at night and at weekends if the on-call doctor had to unexpectedly self-isolate or was unwell.

2.8 Redeployment of doctors in training was also something I considered at an early stage in March 2020. The Trust had trainees working in split roles between the community and mental health, and foundation year one doctors in surgical specialties. Discussions with the Director of Medical Education (DME) and then with Health Education England (HEE) meant that on the 20/03/2020, five foundation year 1 (FY1) trainees in psychiatry at Oxleas NHS Foundation Trust were released to support the medical rotas at the QEH. Redeployment of further junior doctors from General practice placements in training required Foundation programme training directors or the medical education team to ring the GP supervisors of the foundation trainees and ask if they can come back to the hospital. All redeployments required approval from the Dean of HEE which did, at times, cause some minor delays.

2.9 Redeployed doctors provided a valuable medical resource group supporting clinical areas across the sites. Junior doctors were instrumental in establishing and as above, delivering the proning rota of up to eight staff for patients in the intensive care unit (ICU) which operated 3-4 times each day.

2.10 Where staff were asked to take on responsibilities beyond their professional training and experience, I together with the Director of Medical Education (DME), and CNO, ensured appropriate supervision was in place. I also promoted the letter issued by Professor Stephen Powis to all Responsible offices and Medical Directors in England on the 19/3/2020, and the jointly issued letters of support from regulatory bodies (including the Nursing and Midwifery Council (NMC) and General Medical Council (GMC) issued on 11/03/2020) confirming measures to support staff in the event of a Covid-19 epidemic in the UK, particularly in the event they were asked to take on additional out of scope practice/responsibilities.

Nursing staff on QEH wards

2.11 Whilst the Trust's redeployment of nursing staff across wards was able to ensure the best possible staffing levels in the circumstances, the Trust regularly experienced periods where nursing staff levels were at an absolute minimum due to significant levels of staff contracting the virus or needing to isolate. Where possible, nursing staff were redeployed from areas with reduced activity (e.g. theatre staff, clinical nurse specialists or outpatient teams) and measures were put in place to provide appropriate training for redeployed staff working in areas not familiar to them. Non-clinical staff were also redeployed to take on roles to support ward teams. Whilst across the QEH site there was a 'can-do'/'in-this-together' spirit, I am aware that many redeployed staff found the move to unfamiliar areas, combined with the ongoing (unknown) threat placed by the virus very stressful and challenging.

2.12 The Trust remained alert to the practical effects of having high numbers of redeployed staff - including the impact on capacity; patient safety; the need to ensure suitably trained staff in all areas; staff morale and well-being; increased risk of burnout.

2.13 As noted above staffing levels were monitored closely throughout each pandemic wave. Where needed staff were redeployed to ensure resources remained aligned with the demands for care (e.g. redeployment of surgery staff into acute patient pathway). As is demonstrated in the attached papers shared with the Inquiry as exhibits, from May 2020 management undertook regular reviews of nurse staffing levels (Exhibit EA/02 - INQ000428890) and medical staffing levels (Exhibit EA/03 - INQ000428891 and EA/04 - INQ000428892) and implemented actions to try and maintain safe staffing levels in accordance with SEL agreed ratios.

2.14 Therapy staff were also key to providing further clinical support across the wards, both critical care and medical wards as many AHPs were redeployed to the wards or were part of proning rotas in critical care.

2.15 During the early waves of the pandemic in 2020 the Trust received a request to support the Nightingale unit with staff trained in critical care. Ultimately, only a handful of Trust staff (<10 staff) were released to the Nightingale centres which enabled the critical care capacity and ward staffing at the QEH site to be sustained.

2.16 Throughout the pandemic the Trust did not actively support other sites by redeploying its staff. In SEL there was a focus on the creation of networks and collaborative working to manage demand on all sites.

2.17 The Trust's data confirms that despite the high numbers of staff that have contracted the covid virus, as of January 2024, it no longer has any members of staff who remain absent from work having reported having symptoms of long covid. Updated guidance for the management and support of staff affected by long covid was shared with the Trust Board in February 2022.

2.18 The Trust received and shared letters providing regulatory cover/guidance for additional responsibilities / out of scope practice sent by the National Midwifery Council (Exhibit EA/05 - INQ000428893) and General Medical Council (Exhibit EA/06 - INQ000232031) which are provided as exhibits to this statement. In addition, the letter from Professor Stephen Powis sent to all Responsible Officers in England on the 19 March 2020 is also provided as an exhibit (Exhibit EA/07 - INQ000049694)

Supporting staff with appropriate training

2.19 Specific training arrangements were put into place for all staff working in unfamiliar areas – which included provision of additional online training, wider support measures and virtual training. A three-day critical care skills programme was delivered by the Practice Development Nurses (PDNs) for critical care for all staff redeployed to critical care from elsewhere in the Trust.

2.20 The biggest concern I had at the time was the inability to support our junior medical staff through their weekly teaching sessions – where traditionally these face-to-face meetings were

an excellent place for peer support and this key function was lost with the online training that was set up.

Covid testing for Trust staff

2.21 During the initial phase of the pandemic testing for both patients and staff was very limited. In the early days of the pandemic the Trust had a significant number of staff isolating c.500 staff were required to self-isolate each day in the first few weeks of April 2020. At times this presented significant business continuity issues. There were periods in spring 2020 when whole teams of staff (e.g. the emergency department and the cardiac unit) were required to isolate due to a positive contact. Management established tracking systems to monitor the number of staff absent from work due to a need to isolate or covid sickness. The Trust ensured that those staff isolating (due to potential contact with an individual with Covid and who remained well) remained on full pay throughout their absence, and where possible these staff were allocated tasks to undertake remotely.

2.22 The Trust was quick to respond to implement testing regimes as soon as guidance and testing supply was available as the introduction of covid testing had a significant impact on reducing levels of staff absence. From the 19/04/2020 onsite testing for all staff allowed staff to return to work if they had possible symptoms but tested negative. Availability of testing also ensured those who tested positive were isolating in accordance with guidance to stop the spread of infection. On the QE site we set up a "drive through" covid testing facility in the car park so that staff did not have to go through the national Covid testing process. However, it was acknowledged at the time that this did discriminate against staff who did not own a car as they were unable to access the Trust's testing service.

2.23 The Trust also was amongst one of the first in the country to implement staff antibody testing. Whilst anti-body testing did not have a significant impact on reducing staff absence, many staff took up the offer to be tested in order to learn if they had been exposed to the virus. Anti-body testing was made available to all staff in May 2020, although was offered on a prioritised basis to staff working in clinical high-risk areas.

2.24 From July 2020 the Trust was able to deliver onsite staff testing for all staff with covid symptoms.

2.25 In December 2020 testing kits (lateral flow tests LFT) were made available and all staff were issued with testing kits and asymptomatic staff were required to record the results of a covid test twice weekly on the Trust's testing portal. The roll out of these tests prioritised clinical staff in high-risk areas but the tests were rapidly rolled out across the organisation. Those staff testing positive were required to remain isolated and retest after 7 days. once the Trust moved to lateral flow testing there were no issues in terms of the supply of testing kits, reagents or other testing supplies.

Measures to support the Trust's workforce

2.26 Like all provider organisations, the Trust was keen to draw on the skills of those who could support patient care during those periods of most intense staffing pressures. The Trust had a very small number of staff return to work from periods of absence or retirement and they were screened by the Workforce team and added to temporary registers for doctors, nurses, midwives and pharmacists. The bigger boost to the workforce came through students. The Trust wide headcount benefitted from 62 student midwives and clinical support workers in their early years of study and a further 48 student nurses, midwives and therapists in their final year of study.

2.27 To ensure all efforts to be fully focused on the covid response, the Trust relaxed its mandatory training requirements during the pandemic. As part of this, annual medical appraisals were paused during 2020 and resumed in the late summer of 2020 using the 'appraisal 2020' documentation approved by the statutory bodies which focuses specifically on wellbeing and requires less preparation of documentation.

2.28 As noted above, staff vacancy and turnover levels at the onset of the pandemic were relatively low which enabled the Trust to retain clinical staff, but also meant recruitment was slower than may otherwise have been the case. The Trust was an active participant in schemes to make use of volunteer groups to support services. In the first wave of the pandemic, project Wingman provided furloughed staff from the airline industry an opportunity to work at the Trust in non-clinical roles, which temporarily released pressures on front line staff. It should also be noted that a number of these volunteers took the opportunity to retrain as healthcare assistants post pandemic and have been retained within the NHS. In subsequent waves the QEH site worked closely with partners at the Royal Borough of Greenwich. Project Hope was launched jointly by the Royal Borough of Greenwich and Lewisham and Greenwich NHS Trust on 10 January 2021, asking residents and local businesses to volunteer support to their local NHS trust at this crucial time. At the same time a JustGiving fund was launched by Charlton Athletic Community Trust to raise money to go towards supporting staff and patients at the QEH.

2.29 During the pandemic some military support was also made available through Military Aid to Civil Authorities (MACA). Although the Trust was able to secure some short-term support for emergency department teams at both its sites (drawing on the established military links of the QEH site), in South East London this was soon redirected to (and co-ordinated from) tertiary sites.

Staff deaths

2.30 One of the most challenging aspects of the pandemic was the ability of the Trust to respond when members of its own teams lost their lives to the virus. During the relevant period the Trust experienced the death of four staff members from Covid-19. Two of these were staff based at the QEH site:

i. Mrs D, a retired Registered General Nurse who worked as a Band 7 Ward Manager on Ward 3 at QEH until July 2019. In December 2019 she joined the Trust bank.
ii. Mrs A, 62 years old, a Healthcare Assistant, worked part time within the Day Care Unit at QEH and regular weekly bank shifts within the Delivery Suite and Birth Centre at QEH

2.31 All Trust staff who died were women within a similar age range and who came from a Black, Asian and Minority Ethnic (BAME) community. At the time of their death, their families were contacted by the Trust Chief Executive (CEO) and supported with claims and pastoral support through line management and workforce teams. Colleagues were also supported with psychological and spiritual care needs. A memorial fund was set up for the families of these staff by the Trust Charity, and staff memorials were held on the Trust sites.

Vaccination as a condition of deployment (VCOD) legislation

2.32 There were two stages to the vaccination as a condition of deployment legislation. The first, covered staff who worked within community settings, requiring all those working in care homes to be vaccinated. This legislation affected relatively few staff across the Trust, and, at this stage, the impact of the legislation was very limited as any staff not wishing to receive the vaccine could be easily redeployed.

2.33 The second stage of vaccination as a condition of deployment legislation in November 2021 confirmed a requirement for all health care professionals to be fully vaccinated. This was far more significant for the Trust in terms of its potential impact. After both Government announcements in relation to the mandated vaccine the Trust undertook an exercise to understand the extent to which the workforce was vaccinated and the likely impact of VCOD. This required an assessment of all roles to understand which roles were impacted based on the Trust's interpretation of guidance.

2.34 Management launched a series of regular staff webinar and internal communications about the VCOD policy to ensure understanding. The Trust took a clear stance that all staff had a choice about vaccine, but was open and transparent about its policy and the likely ability of employees to continue in their roles without vaccination.

2.35 In addition to this all staff (for whom the Trust did not have confirmation of a vaccination) received a letter setting out the requirements of the legislation, the likely consequences of them choosing not to receive the vaccine, and the support provided by the Trust.

2.36 In the absence of clear national policy and in conjunction with trade union colleagues, in September 2021 a local policy was developed for the Trust (Exhibit EA/10 – INQ INQ000428898), management wrote to all Trust staff affected by the proposed legislation setting out the position (Exhibit EA/08 – INQ000428896) and a series of updates were provided to the Trust Board setting out the approach taken by the Trust and the likely impact of implementing the legislation.

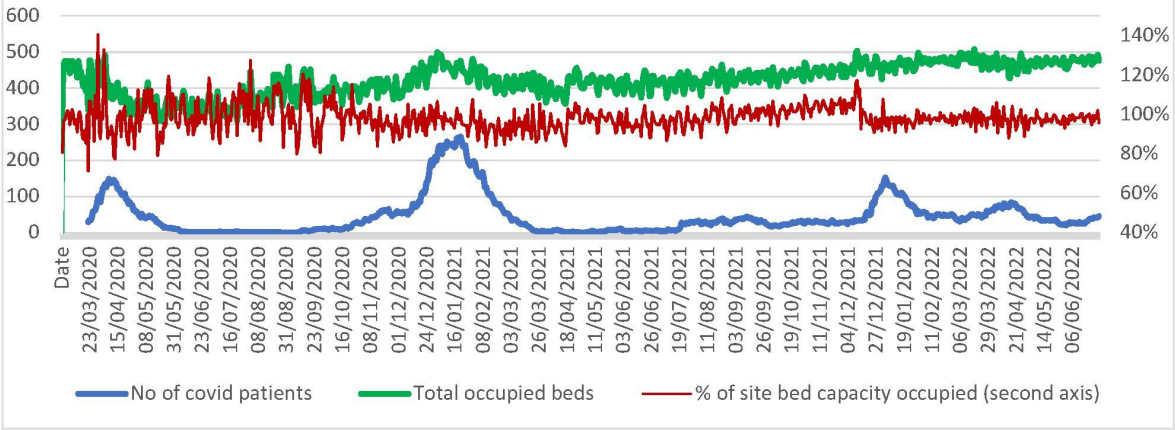
2.37 A paper to the January 2022 Trust Board confirmed 973 permanent and 282 bank staff at the Trust who were in scope for the mandated vaccine had yet to demonstrate they had received the two covid vaccines required by the mandate. At the point at which the legislation was withdrawn on 31st January 2022 the Trust was aware of 830 members of staff that had not received the vaccine and who would enter a formal process likely to result in the termination of their employment – analysis of the breakdown of this group (by ethnic background and role) is presented in the January 2022 Board report confirming the Trust's VCOD approach, position and the likely impact of implementation (Exhibit EA09 – INQ000428897). The analysis undertaken by the Trust at this time demonstrated that the lowest uptake of the vaccine was amongst the most junior roles within the organisation, i.e., all clinical support roles the vast majority of which are healthcare assistants. This was particularly worrying as all roles within these professions would be categorised as 'frontline' and therefore fall within the purview of vaccine mandate limiting opportunities for redeployment. In addition, uptake of the vaccine was poor amongst the Trust's Black and Bangladeshi communities. Black staff (who account for 29% of the Trust workforce) accounted for nearly 54% of those who were in scope and unvaccinated.

2.38 VCOD presented a decision difficult for staff who refused to have the vaccine due to the limited ability for the Trust to redeploy them. The legislation and the decisions in relation to it caused significant additional workload and stress and anger amongst all members of the Trust workforce prior to the national decision/legislative requirement being reversed. Whilst only a small amount of turnover was created by staff refusing to have the vaccine, the national decision resulted in a lot of angst and anxiety which detracted staff from their roles and would have had a significant adverse impact on workforce morale. Following the government's decision to reverse VOCD an update was provided to the Trust Board in February 2022 (Exhibit EA/11 - INQ000428899).

3 Bed Capacity

3.1 The following graph presents ICU and general and acute (G&A) bed occupancy and capacity on the QEH site throughout the relevant period. As can be seen at the height of each wave high numbers of beds were occupied across the Trust. Whilst there was some drop in the number of patients in hospital after the first wave, throughout the relevant period there have been times when the occupation of beds across the site was greater than 100%. This is due to the additional escalation capacity put in place on a temporary basis.

Graph 4: QEH: G&A beds and covid occupancy rates



Source: Bed data submitted to the national Urgent and Emergency Care (UEC) sitrep from the data provided by the daily Clinical Site Management (CSM) reports provided by the site teams

An expanded version of the above graph is provided as an exhibit (Exhibit **EA/11a** *INQ000470129)*

3.2 Prior to March 2020 the Trust put in place its standard arrangements to maximise bed capacity over the busy winter period. At this stage, no specific measures were put in place to create bed capacity in anticipation of a pandemic. In early March 2020, the inevitability of a surge in patient demand due to Covid-19 was becoming apparent. Management on the QEH site took steps to implement NHS England/Improvement's (NHSEI) discharge policy intended to free up bed capacity in anticipation of the surge of demand expected due to the pandemic.

3.3 On 17/03/2020 the Trust had 409 of its 446 available G&A beds occupied compared to 446 of 446 available beds the week earlier (10/03/2020). On both dates the sites ICU capacity remained full - with all beds occupied. Data for the site shows implementation of the nationally directed discharge policy had some short-term impact in creating G&A capacity which reduced site occupancy of beds to about 80% throughout April, but that the QEH site remained consistently busy.

Table 2: Average weekly occupancy of G&A beds at QEH

Week ending	Average COVID-19 Patients	**Average Occupied Beds**	Average Available Beds	**% occupied**
07/03/2020		455	474	96%
14/03/2020		458	469	98%
21/03/2020		423	453	93%
28/03/2020	62	415	427	97%
04/04/2020	127	438	417	105%
11/04/2020	144	413	428	96%
18/04/2020	108	383	427	90%
25/04/2020	84	366	385	95%
02/05/2020	52	351	365	96%
09/05/2020	42	356	351	101%
16/05/2020	38	370	353	105%
23/05/2020	13	330	373	89%
30/05/2020	11	353	335	105%
06/06/2020	3	352	352	100%
13/06/2020	1	353	352	100%
20/06/2020	1	345	353	98%
27/06/2020	1	340	346	98%
04/07/2020	1	345	340	101%
11/07/2020	2	340	347	98%
18/07/2020	1	334	339	99%
25/07/2020	2	353	332	106%
01/08/2020	2	368	352	105%
08/08/2020	1	378	364	104%
15/08/2020	1	378	379	100%
22/08/2020	0	389	377	103%
29/08/2020	0	408	383	107%
05/09/2020	0	410	415	99%
12/09/2020	3	379	410	92%
19/09/2020	4	425	374	113%
26/09/2020	10	391	420	93%
03/10/2020	10	381	398	96%
10/10/2020	9	403	381	106%
17/10/2020	10	390	401	97%
24/10/2020	19	398	392	102%
31/10/2020	25	390	396	99%
07/11/2020	33	398	401	99%
14/11/2020	47	411	432	95%
21/11/2020	59	405	421	96%
28/11/2020	51	400	427	94%
05/12/2020	57	393	425	92%
12/12/2020	63	410	426	96%
19/12/2020	85	434	448	97%
26/12/2020	156	437	458	95%
02/01/2021	213	474	468	101%
09/01/2021	235	478	490	98%
16/01/2021	236	452	471	96%
23/01/2021	238	459	469	98%
30/01/2021	188	435	459	95%
06/02/2021	154	448	466	96%
13/02/2021	105	431	470	92%
20/02/2021	78	417	453	92%
27/02/2021	54	403	439	92%
06/03/2021	36	413	441	94%
13/03/2021	23	411	440	93%
20/03/2021	9	420	447	94%
27/03/2021	1	414	440	94%
03/04/2021	3	394	426	92%
10/04/2021	8	389	412	94%
17/04/2021	2	381	420	91%
24/04/2021	2	420	424	99%
01/05/2021	0	428	427	100%
08/05/2021	4	418	423	99%
15/05/2021	3	414	429	97%
22/05/2021	8	420	424	99%
29/05/2021	8	410	427	96%
05/06/2021	4	406	422	96%
12/06/2021	5	405	427	95%
19/06/2021	4	400	424	94%
26/06/2021	4	416	436	95%
03/07/2021	4	420	435	97%
10/07/2021	9	409	433	94%
17/07/2021	8	416	431	96%
24/07/2021	22	418	434	96%
31/07/2021	27	423	434	98%
07/08/2021	24	410	430	95%
14/08/2021	20	424	429	99%
21/08/2021	35	435	429	101%
28/08/2021	29	426	429	99%
04/09/2021	35	425	429	99%
11/09/2021	40	431	429	101%
18/09/2021	34	433	429	101%
25/09/2021	31	434	429	101%
02/10/2021	18	434	429	101%
09/10/2021	17	429	429	100%
16/10/2021	22	438	429	102%
23/10/2021	27	438	429	102%
30/10/2021	25	443	429	103%
06/11/2021	28	442	429	103%
13/11/2021	29	448	429	105%
20/11/2021	29	445	429	104%
27/11/2021	26	450	429	105%
04/12/2021	23	447	429	104%
11/12/2021	33	458	429	107%
18/12/2021	35	477	456	105%
25/12/2021	84	459	476	96%
01/01/2022	128	461	486	95%
08/01/2022	129	460	472	98%
15/01/2022	106	465	482	96%
22/01/2022	86	467	485	96%
29/01/2022	60	463	483	96%
05/02/2022	57	483	487	99%
12/02/2022	40	472	485	97%
19/02/2022	47	479	488	98%
26/02/2022	49	476	489	97%
05/03/2022	35	473	484	98%
12/03/2022	40	490	497	99%
19/03/2022	48	485	494	98%
26/03/2022	50	475	482	99%
02/04/2022	64	467	477	98%
09/04/2022	70	468	480	97%
16/04/2022	76	462	483	96%
23/04/2022	67	459	470	98%
30/04/2022	47	473	489	97%
07/05/2022	44	464	482	96%
14/05/2022	35	472	483	98%
21/05/2022	33	475	487	97%
28/05/2022	22	473	487	97%
04/06/2022	29	466	482	97%
11/06/2022	25	480	489	98%
18/06/2022	31	476	483	99%
25/06/2022	41	479	489	98%

Source: Bed data submitted to the national UEC sitrep from the data provided by the daily CSM reports provided by the site teams

3.4 In terms of critical care capacity, the QEH site has an established Intensive Care Unit with 18 beds. However, at an early stage in the pandemic it was realised that this would be insufficient to meet demand on the site. In late March 2020, the Trust converted 12 beds in ward 12 (a general surgery ward adjacent to ICU, which remained available until the end of the 2021 year) and expanded ITU by a further eight beds in its theatre recovery space. In total this created a revised ICU capacity of 31 beds by mid-April 2020. There were plans in place to increase this capacity further (to a maximum of 55 beds) by using an additional 13 beds in theatres and eight ventilated beds in ward 4 (coronary care unit). Fortunately, this 'in extremis' plan was not required.

3.5 To support treatment of covid patients the Trust also converted new capacity in wards 22/23 (opened late in 2019) to be used for Continuous Positive Airway Pressure pathway (CPAP) patients. Ward 23 subsequently became the Aerosol Generating Procedures (AGP) area for management of covid 19 and ward 22 was used by patients with Covid 19 and respiratory symptoms needing a lower level of support.

3.6 It should be noted that the demand for bed capacity at the start of the pandemic, placed the site under significant pressure. Unlike larger/ tertiary provider sites the ability of the QEH to flex the number of beds was limited both by infrastructure and staffing constraints. At a very early stage in the pandemic, I started to engage in conversations with both tertiary providers in SEL about mutual aid given the rising likelihood that the ICU unit on the QEH (and UHL site) managed by the Trust could be overwhelmed. These early conversations with my opposite numbers at other South East London trusts ensured the Trust had the ability to contact partners and transfer patients to other acute sites in South East London should it find the ICU capacity on its own sites experienced greater demand for beds than it could safely manage.

3.7 In accordance with guidance set out in its Critical Care expansion protocol (Exhibit EA/12 – INQ000428900), the QEH site flexed its ICU bed capacity during covid waves in line with the demand of patients within the SEL system. As a member of the SEL Critical Care Network (SELCCN) the Trust was able to share critical care capacity with Guy's and St Thomas' NHS Foundation Trust (GSTT) and King's College Hospital NHS Foundation Trust (KCH).

3.8 Given the inevitability of a surge in ICU demand, in March 2020 the network set up the Specialist Retrieval and Intensive Care Transfer Service (SPRINT) to transfer patients between ICU provider units across South East London (SEL) to ensure that no single site was overwhelmed. Over the 2020-21 period around 1,500 patients were transferred using this service using specially equipped ambulances and highly trained staff to transfer patients between hospitals.

3.9 The SPRINT service ensured that no individual site was overwhelmed in terms of its activity at any stage in the pandemic, however given the continued heightened demand for services and the relentless, uncertain and unpredictable nature of the virus, concerns were regularly

raised by clinicians in relation to the pressure being placed upon the Trust's services and, during the initial waves of the pandemic, their fear that there may come a time when the demand for services exceeded local resources.

3.10 Daily critical care calls between the provider trusts in SEL ensured regular review of the position of all sites and system consistency for staffing ratios (nursing and medical staff), equipment and acuity of patients. As these were clinical calls it also allowed the opportunity for the clinicians to discuss appropriate patients for transfer and patients potentially requiring higher levels of care.

3.11 An analysis of the 249 patients transferred from QEH to an intensive care unit (ICU) of a different hospital during the relevant period is presented to the Inquiry as an exhibit (Exhibit EA/13 – INQ000428901). Of these patients 123 patients transferred to GSTT, 41 to KCH, 63 to University Hospital Lewisham and 22 to a site beyond SEL.

3.12 An analysis of the 33 patients transferred to the ICU at QEH from a different hospital during the relevant period is also included within the exhibit referenced above (Exhibit EA/13 – INQ000428901). Of these patients 17 patients transferred from GSTT, 5 from KCH, 3 from University Hospital Lewisham, 1 from the BMI Blackheath hospital and 7 from a site beyond SEL.

3.13 Whilst the majority of patients transferred to and from the ICU at QEH during the relevant period were transferred to and from other SEL acute trusts, at times of extremis and to suit geographical preferences there were a small number of transfers to other areas during the relevant period.

Procurement arrangements (non-PPE)

3.14 Throughout the pandemic the Trust benefitted from its membership in the collaborative procurement arrangement led by GSTT. Where additional items of equipment were sourced, these were generally procured in a reasonable timeframe to meet the demand for services.

3.15 In the early days of the pandemic the 'London Covid response supply chain cell' for equipment was established to manage distribution of products that were in short supply because of the pandemic. At this time there were a number of everyday items that were in short supply (including cleaning wipes, gloves, aprons, hand gel), and for which difficulty in procuring presented operational challenges for Trust staff who were required to adapt to using unfamiliar and sub-optimal substitute products when the supply chain failed. Examples of this included the use of science safety goggles for eye protection from local schools (as we could not get visors), and the purchase of 28 day FFPs masks from local DIY stores for staff who could not be FIT tested or failed FIT Testing. In addition, some staff used aprons to cover their arms and hair. Whilst the impact of this did not significantly impact patient experience or safety, the situation presented high levels of anxiety for staff and the need to adapt to using unfamiliar

products. The Trust followed a detailed process requiring daily submissions to monitor equipment usage levels.

3.16 In the early days of the pandemic when there was a national demand for ventilators, the Trust did not have as many machines as it needed and made use of available anaesthetic machines in some areas. Fortunately, just prior to covid19, the Trust had placed an order for 40 new Drager ventilators as capital replacement. These new ventilators were delivered at the end of February 2020, and so, given the timing, we chose not to immediately de-commission our existing 48 ventilators (including transport ventilators), creating a good supply.

3.17 In the early days of the pandemic, the Trust found use of continuous positive airway pressure (CPAP) beneficial for the treatment of some patients with acute respiratory failure, and in some cases found this reduced the need for invasive mechanical ventilation. However, the Trust was also aware it didn't have sufficient CPAP machines across the two hospital sites to satisfy the potential future CPAP demand. To address this the Trust was able to obtain 35 units from the UCL-Mercedes-Formula One Initiative. These machines were sourced through an informal contact of one of our intensivists, with sufficient disposables to care for an additional 120 patients per site.

3.18 Renal replacement therapy (RRT) was limited to a maximum of six patients at any one time at QEH (and four at UHL). We adopted a strategy of not providing this for periods longer than 24 hours for any patient, and rotating the machines around between patients so we could give dialysis to multiple patients in any given week.

3.19 Maintaining an assured and continuous supply of oxygen presented one of the Trust's most significant challenges throughout the pandemic and given the numbers of patients requiring oxygen, its usage at the QEH site remained very high over extended periods. Oxygen audits were undertaken on a regular basis (several times daily) and the Trust made extensive use of portable oxygen cannisters and concentrators at peak times, particularly late December 2020 and January 2021. Concerns in relation to oxygen reached a peak on the QEH site over the 2020 Christmas period. This issue was more permanently addressed with the installation of a manifold which provided a separate oxygen supply for wards 22/23 in January 2021. This issue is further expanded in the section below titled 'Trust Internal Incident 27 December 2020'.

3.20 Where shortages were experienced in the availability of drugs, these were managed effectively by drawing on the Trust's protocols for mutual aid already in place with other SEL trusts or by working closely with pharmacology colleagues to ensure a suitable effective alternative regime We had issues with drug supplies in the early stages, as we ran out of regular stocks of opiates, propofol and muscle relaxants. However, this was corrected within the first few days of a problem arising (and we temporarily switched to other drugs like ketamine, midazolam, diazepam, etc.).

3.21 Like many London trusts the Trust did experience a shortage in mortuary capacity. Once the capacity at the QEH site became full, this resulted in an urgent need for the Trust to source its own temporary cooling capacity. Very limited regional or national support appeared to be in place to facilitate this capacity being made available.

3.22 The Trust made very limited use of the Government's agreement with the private healthcare sector to provide services for NHS patients during the pandemic, although in early 2020 a number of cancer patients were transferred for treatment at London Bridge Hospital and other designated cancer treatment centres. There were also proposals to use the BMI Blackheath Hospital for step down and palliative care. However, this required medical cover from the Trust's consultant body which could not be provided due to ongoing covid pressures.

4 Infection prevention and control (IPC)

4.1 IPC arrangements remained a priority area of focus throughout the pandemic given challenges to ensure patient safety in all care settings. At the pandemic outbreak, a series of daily IPC meetings was established to monitor and respond to confirmed case numbers and identified virus outbreaks.

4.2 The physical infrastructure of the QEH site presented a significant challenge in terms of managing the IPC implications of the increased demand on services experienced at the start of the pandemic. As an old military hospital, the QEH site had:

- Very limited space between beds on wards,
- Few side rooms; Across the QEH site there are very limited number of side rooms, and very few of the rooms are ensuite. This meant, throughout the pandemic as numbers of patients with Covid rapidly increased, or when numbers started to decrease, in order to protect patients, complete isolation to protect patients was impossible as patients had to come of the room to use the bathrooms. The side rooms in wards 22 and 23 that the Trust did have were prioritised for patients initially in the pandemic for those without Covid, as patients with Covid were initially cohorted on other wards (3 and 4).
- Limited doors dividing the space between areas within clinical spaces. In April 2020, none of the bays at QEH had doors on them so the patients could not be effectively isolated until doors were retrospectively fitted. In addition, the single rooms only had one door, so further estates work was required to create an area to allow for putting on and removing PPE ('donning and doffing'). These adaptations were done rapidly by the estate teams with the daily Execs group signing off proposed changes.
- A dependency on natural ventilation across the site. For the majority of areas (excluding critical care) the only ventilation in place was natural ventilation, which was maximised (despite the extreme outside temperatures). This presented further pressures on how best to configure the site to minimise the risk of airborne spread of covid.
- Limitations in terms of the areas across the site where oxygen could be supplied to high volumes of patients. The QEH footprint and its issues in terms of oxygen availability did not lend itself to the creation of clear pathways for covid patients. This presented operational challenges when, due to oxygen supply issues, covid wards were redesignated necessitating the move of up to 80 patients in one day. Throughout the early stages of the pandemic there were frequent (and significant) changes to site configuration to balance demands for the supply of oxygen and minimise areas of cross-contamination between patients with confirmed/suspected Covid-19 and those without.

Given this, even in a 'usual' operating environment, it is challenging for the site to consistently maintain desirable standards of IPC compliance.

4.3 Throughout the pandemic the Trust sought to implement national guidance in relation to its IPC arrangements. When new guidance was issued this was reviewed and agreed at (daily) meetings of the Trust's executive directors, and then cascaded throughout the Trust using a variety of communication methods. These methods included: email updates, an intranet site of all the latest guidance, information cascades at key meetings and shift handovers, floor walkers and daily operational briefings via MS teams. Posters demonstrating the PPE required for different areas were also updated as guidance changed cand were widely displayed.

4.4 Like all provider organisations the Trust experienced some challenges in implementing new guidance and ensuring the ability of services to comply with new guidance on a timely basis. The time taken to implement new guidance was always kept to a minimum, but where guidance required changes in working practice, new supplies to be purchased or required estate changes to be enacted there were inevitably some delays during the period in which changes were agreed, approved, implemented, and communicated to staff and patients.

4.5 National PHE and trust-level PPE guidance changed frequently with sometimes daily changes reported in early April 2020. Inconsistent guidance led to confusion, distrust and a lack of confidence in the messaging. This was particularly challenging when guidance varied between the WHO, Public Health England and guidance presented by professional bodies such as the Royal Colleges. In the early stages of the pandemic many staff expressed concerns that the government's stance (for example guidance in place on aerosol-generating procedures, the use of FFP3 facemasks or the need for PPE in community healthcare settings) was not always consistent with international standards, was unclear and inconsistent. Many professional medical societies (e.g. the Resuscitation Council, RCS, GMC) mobilised quickly to provide IPC advice to their members (e.g. around PPE or ventilation), but at times this conflicted with advice from PHE/NHSE, and was on occasion inconsistent between different specialist bodies. The differences and frequent changes in guidance caused significant anxiety among staff that was challenging to manage.

4.6 A further challenge for the Trust was the practicalities of maintaining a continued supply of PPE, areas with AGP and Covid patients were prioritised. For a period PPE was allocated and issued to trusts on the basis of the number of confirmed covid patients, but there were cases of patients who were clinically positive but tested negative. In the early days of the pandemic the Trust established revised PPE order and distribution arrangements for PPE (redeploying several of its non-clinical workforce within its PPE workstream) so that deliveries could be made across all areas of the hospital site seven days a week.

4.7 At the outset of the pandemic, when the number of covid patients started to rise, every service developed hot and cold pathways. Given the lack of isolation spaces across the QEH site this proved challenging in many areas, and notably the space within the Emergency Department (ED). Significant adaptations, requiring input from the Trust's estates team were required to

the design of the ED to create 'hot' and 'cold' pathways within the department and maximise segregation of covid and non-covid patients. An example of the work to remodel the ED department on the ED flows for 30/3/2020 is provided to the inquiry (Exhibit EA/14 - INQ000428902).

4.8 As noted above, the pandemic resulted in multiple patients moves – each of which presented significant risk of further outbreaks (particularly in March -April 2020 when testing ability was very limited). On each occasion changes to the site configuration were made, a summary of these site configuration changes made was circulated to all those working across the site. An example of this from March 2020 is provided as an exhibit to the Inquiry (Exhibit EA/15 – INQ000428903).

4.9 One-way systems were put in place across the site and new signage was put in place to clarify routes for both staff and patients from early April 2020.

4.10 Due to the high volumes of patients with covid and limited capacity to separate covid and non-covid patients, it became necessary, at times, to breach single sex accommodation. Whilst staff made every effort to ensure single sex bays it was not always possible.

4.11 During the pandemic the Trust established its IPC Board Assurance Framework which was regularly reviewed by the Trust's Quality and Performance Committee. Examples of this Board Assurance Framework from June 2020 (Exhibit EA/16 – INQ000428904) and December 2020 (Exhibit EA/17 – INQ000428905) are provided as exhibits to the Inquiry.

Covid testing for patients

4.12 At the end of March/ early April 2020 the Trust was able to introduce polymerase chain reaction (PCR) testing, but these tests were processed offsite and had a turnaround time of 2-3 days and were limited in numbers and so were prioritised for patients requiring ventilation or CPAP in order the site teams could cohort these patients into Covid and non-Covid areas. Testing was initially limited to 50 tests daily, rising to 100 a day.

4.13 It was only from May 2020 that the Trust introduced onsite testing which could confirm positive cases of covid within hours. This was a significant step for the Trust in managing patients and flows, which had been very difficult prior to onsite testing.

4.14 Inevitably the delay to test results being available to clinical teams presented a significant risk in terms of outbreaks on medical ward as patient moves of asymptomatic patients could take place several days before test results confirmed a positive result. Whilst the Trust had measures in place to manage beds and isolate bays on wards, these processes could not prevent the outbreaks seen across the QEH site.

4.15 In the early days of the pandemic, the QEH site experienced nosocomial outbreaks of Covid-19 infection affecting both patients and staff. The Trust found that patients with covid did not always present with typical symptoms and therefore at times patients with the virus were placed on non-covid wards. Similarly a number of staff became symptomatic whilst at work.

4.16 The initial lack of testing, followed by limited provision for patient testing, and then the lack of point of care testing also delayed identification of those patients with the virus at the start of the pandemic and contributed to the spread of the virus within the hospital.

4.17 The Trust's Infection Control Team established a clear daily rhythm to manage these outbreaks in line with national guidance. The root cause of the outbreaks was often patients who had been admitted to non-covid areas of the site without indication that they may have the virus -subsequently confirmed by the presence of symptoms or a (delayed) positive covid test result. Measures put in place by the Trust included, daily track and trace meetings (which included provision to test/ isolate known contacts), meetings dedicated to individual outbreaks on the site. A process to undertake root cause analysis and any learning following each outbreak put in place and this was monitored by a 'covid panel' set up by the Trust that provided updates to the Quality Governance Committee. The Trust put in place a formal track and trace meeting from 7 July 2020. Initially we used our own investigation template, before adopting the situation, background, assessment, recommendation (SBAR) templates that were provided much later.

5 Personal Protective Equipment (PPE) and Respiratory Protective Equipment (RPE)

5.1 PPE was a designated priority workstream at the Trust from the outset of the pandemic and this ensured the continued supply of PPE to all Trust sites in line with the latest PHE guidance. Management and procurement focus on this area ensured that there was a continued reliable supply of key PPE items (including masks, gloves, aprons, wipes and sanitiser). In addition, where specialist equipment was needed, this could be sourced.

5.2 At the outbreak of the pandemic the Trust sourced pre agreed PPE lines from NHS Supply Chain (NHSSC) but did move towards to a direct approach to contracted suppliers when stock was no longer available. Through the shared service arrangement in place the Trust supported local trusts within the SEL network for any shortages where it could. The QEH site also had the benefit of direct support and stock transfers from GSTT when local stocks ran low. GSTT was used as the main option for any PPE stock shortages.

5.3 The continued supply of PPE was in part, facilitated by the strong relationships in place between the Trust and acute provider partners across South East London. Lewisham and Greenwich Trust's procurement and supply chain function operate as part of a shared service which is hosted by GSTT. For the first two years of the pandemic the PPE deliveries from the government were received in the GSTT supply chain hub in Dartford and were delivered to each site as required. Within the supply chain hub a decontamination room for equipment was created to ensure that medical/ equipment and devices could be cleaned and returned to circulation at the Trust as soon as possible.

5.4 The Trust accepted donations where these were offered from non-NHS suppliers and were confirmed as appropriate with infection control and health and safety teams. The Trust also ordered, and received donations, from non-standard suppliers (e.g. B&Q and Screwfix) for some PPE.

5.5 As medical staff and other ANHP staff who usually did not wear uniform, began to use scrubs to reduce the risk of infection spread, supplies of scrubs were initially challenging and we had donations of home-made scrubs from local residents.

5.6 The procurement team made requests from centralised NHSEI/Department of Health and Social Care (DHSC) supplies via the PPE portal. The Trust used SEL PPE allocation and push stock, and made use of the government escalation process on a couple of occasions (gowns and Visors) at the start of the pandemic.

5.7 The time it took from making a request for PPE/RPE, to the PPE/RPE being delivered to the hospital, varied but on most occasions was a four-day lead time. Under government supply we had no issues on lead times as we had pre agreed delivery dates. However, in some cases the quality of PPE did become substandard, for example poor body bags which had no zip to secure the body inside. We did have also FFP3 masks that arrived expired or with new dates

added on the box, these were confirmed to be safe by a DH letter communication supporting their use.

5.8 On a couple of occasions, the national system was used to order visors and gowns. On some deliveries the Trust did not receive the full requested quantity.

5.9 At the start of the outbreak the Trust's Health and Safety team confirmed details of those staff who had been fit tested and scheduled fit testing sessions for all staff onsite. Visits by the team were made to key areas (those with AGP) to ensure all staff had the opportunity to be fit tested. These sessions were held on an ongoing basis throughout the pandemic.

5.10 Whilst there was significant anxiety around staff exposure to the virus and the safety/wellbeing of clinical staff exposure during the pandemic the Trust did not experience shortages of recommended PPE or RPE. Staff were regularly assured by management and through staff updates that the Trust was able to maintain sufficient stocks of PPE to meet the national IPC guidelines, and to ensure local PPE supplies could be accessed by all teams and areas as needed. However, it cannot be underestimated just how fearful our staff were that firstly there would be insufficient supplies of PPE and secondly that the guidance was not adequate. Continual media reports of PPE shortages, and the unknown nature of the virus contributed to this fear, as well as the differing PPE/IPC guidance in place for different teams across the QEH site (for example in areas without aerosol generating procedures taking place). I saw on frequent occasions staff on wards, both with and without covid, staff 'double masking' – wearing surgical masks under FFP3 masks, wearing bin bags, placing aprons on arms and legs, wearing full length gowns and using hair and shoe coverings to almost completely cover themselves. In some 'green areas' or non AGP areas staff wanting to wear FFP3 masks at all times – despite the guidance that they didn't need them. There were also occasions where agency or non-clinical staff were reluctant to enter areas in which covid patients were being treated.

Visiting restrictions

5.11 Throughout the pandemic the Trust complied with nationally issued guidance in relation to visiting restrictions and put plans in place to adopt all national guidance as it was issued.

5.12 Upon receipt of new guidance plans were agreed by the Chief Nurse (in collaboration with South East London colleagues) and communicated to staff and patients. At times the restrictions on visitors required by the national guidance were challenging for the Trust to implement and had a significant impact on the experience of patients and the families, they were however generally recognised by clinical colleagues as outlining the measures that were necessary to try and limit the spread of the virus, and protect both staff and patients.

5.13 In implementing the guidance, the Trust tried to ensure that patients and their families were treated in the most compassionate way possible. Wherever possible, arrangements were put

in place for patients with communication difficulties, cognitive impairment, or with limited English to be accompanied by someone who could facilitate communication between the patient and hospital staff.

5.14 Throughout the pandemic there were regular updates to the policy to ensure alignment with national guidance.

5.15 Between January and March 2021, Corporate teams were assigned to support a programme of 'virtual visiting', facilitating telephone and/or video calls between patients and their next-of-kin or families. The team would work with ward staff to identify daily which patients would like support to facilitate a call, and the corporate team would assign staff members to visit the ward and contact the families at a pre-arranged time to facilitate the call.

5.16 The video calls allowed patients to stay in touch with their families, and enabled families to visualise their loved ones and report back to the ward any concerns on their condition.

5.17 Whilst recognising the significant challenges presented by the restrictions put in place for visitors and staff throughout periods of the pandemic and the impact of the restrictions for patients, my view is that the rapid and unpredictable transmission of the virus meant that it was necessary to take measures to minimise the rate of spread. At all times we tried to facilitate individual patients needs whilst balancing the risk of transmission of the virus. However, it is one of the lasting legacies of the pandemic that so many patients died without their relatives with them and all staff working on the wards found this particularly difficult in managing the end-of-life care for patients.

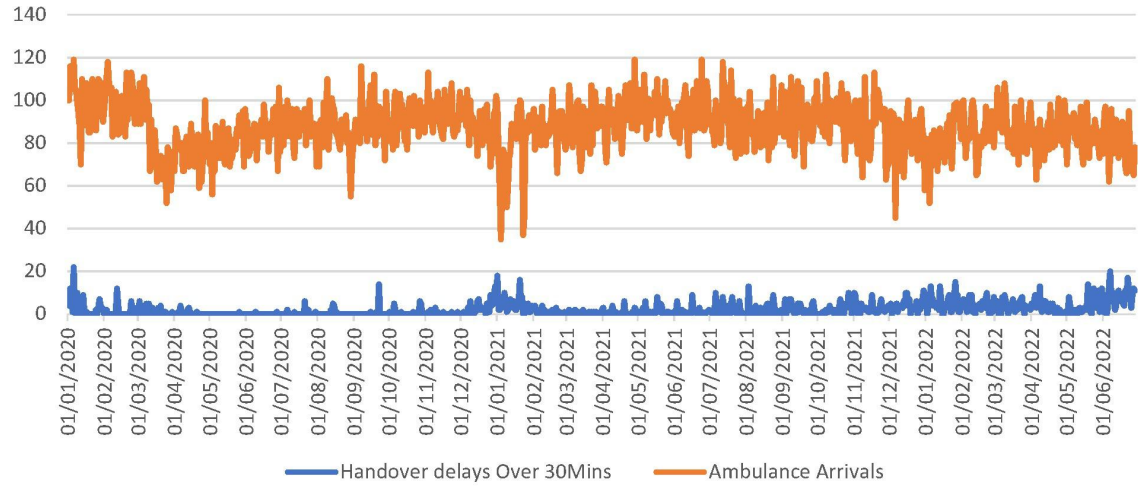
6 Patient treatment and care: covid patients

Ambulance handover times

6.1 In the early weeks of the pandemic the Trust experienced high volumes of ambulances and significant levels of ambulance handover delays. At this point in the pandemic the ambulance service and the Trust had limited ability to separate covid and non-covid patients.

6.2 The following graph shows activity at the QEH Emergency department throughout the relevant period. As can be seen in the early stages of the pandemic the number of patients presenting in person at ED reduced significantly during the initial months of the pandemic, although the number of blue light arrivals remained relatively constant. During the peak waves of the pandemic the Trust has noticed a high number of acutely unwell patients arriving at the QEH ED by means of their own transport, rather than arriving by ambulance.

Graph 5: Ambulance delays and Ambulance arrivals throughout the relevant period



Source: Ambulance handover data submitted to the national UEC sitrep from the data provided by the daily trust monitoring reports

An expanded version of the above graph is provided as an exhibit (Exhibit **EA/17a** *INQ000470130)*

6.3 The pandemic required the Trust to implement many different protocols at pace and with support from staff across the Trust and within the wider SEL ICS.

6.4 Like most acute providers, in March/April 2020 the Trust, following consultation with partners across SEL, suspended elective surgery to focus on emergency and cancer surgery. As noted above, a small number of patients requiring cancer and urgent elective surgery were transferred to private sector providers and other (specialist) London trusts. Most of this activity remained suspended for most of 2020, with orthopaedic lists only resuming in Autumm 2020. Given the specific challenges faced on the QEH site to enable 'covid free' elective surgery, a Trust decision was taken to transfer most elective surgery undertaken by the Trust to the Trust's UHL site.

6.5 During 2020 the QEH site experienced multiple challenges in continuing to provide care and treatment for conditions other than Covid-19. These included:

- The fact that visitors were unable to visit their loved ones at the hospital at times when they were critically ill.
- Standing down the QEH 'Same Day Emergency Care' care model in the Emergency department in April 2020, and not re-establishing this until mid-August 2020.
- Maintaining isolation areas for non-covid patients and protecting non-covid patients by separating pathways
- Maintaining paediatric emergency flows alongside multiple site moves and changes.
- Managing increasing demands for patients experiencing mental health challenges
- Ensuring oxygen supply areas for non-covid patients, with oxygen supplies prioritised for covid patients.
- Developing systems and processes to enable recommencing of surgery including patient testing procedures ahead of surgery.
- Developing pathways for endoscopy patients to have both covid and non-covid pathways to allow for the elective outpatient lists but also urgent inpatients to have endoscopy in a timely manner.
- Ensuring patients who were immunocompromised and requiring ongoing outpatient treatment were kept safe.
- Ensuring the oncology wards and chemotherapy units remained covid free

6.6 During the pandemic the Trust introduced a number of local innovations to enable non-covid care and treatment to be maintained. These included:

- ***New technology***: The Trust made efforts to introduce new technology to improve patient care. These included the development of patient order forms on its I-Care EPR system and the largescale roll out of portable devices. Throughout the pandemic the Trust also actively participated in seven research trials.
- ***Mobile cancer service***: In July 2020 the Trust launched a mobile cancer service using St John Ambulance community response (Exhibit EA/18 – INQ000428906). This enabled cancer patients at the Trust to get essential blood tests and other procedures outside the hospital building before starting chemotherapy, minimising their contact with other patients. The mobile cancer service was an innovative collaboration between St John Ambulance and our Chemotherapy Day Unit and Phlebotomy Department.
- ***Moving the infusion suite*** in main outpatients to the education centre, an area physically separated from the rest of the hospital.
- ***Use of virtual outpatient clinics / Virtual follow-up clinics***: As the pandemic evolved the Trust, like many others, sought to maximise the number of appointments that could be converted to a virtual format. Gastroenterology on the Lewisham site was one of the earliest adopters of the technology and shared their learning with other specialties. The most successful virtual clinic at the QE site was the sexual health clinic who managed nearly all their patients virtually and ensured that these patients vulnerable to the virus,

continued with their treatment plan without exposure to the acute hospital site. This service continues to manage a large proportion of the patients virtually, with very positive patient feedback.

- In December 2020, the Trust launched a Covid-19 virtual follow up clinic in its emergency departments. Any patient who came to ED with suspected Covid-19 went through a risk assessment. If they were felt to be at risk of deterioration but did not have an oxygen requirement, they were assessed by a senior clinician and, if they met the criteria, were sent home with a pulse oximeter and detailed instructions on how to use it.
- ***Post-Covid / Long-Covid clinics***: The Trust was among the first in the country to set up a holistic post-Covid assessment clinic and drew on support from GSTT to develop this service.
- ***Emergency care improvements (New ED appointment scheme)***: The Trust launched the new enhanced "NHS 111 First" service in October 2020 as part of an NHS initiative to reduce waiting times and overcrowding in emergency departments. Under the new system, local people are asked to contact NHS 111 by phone or online before attending the ED if they have an urgent – but not serious or life-threatening medical need.

Changes to maternity pathways

6.7 During the relevant time the Trust made extensive changes to the provision of maternity services. Key pathway changes are set out below:

Antenatal Pathways:

6.8 During the pandemic community hubs were established due to GP concerns regarding pregnant women being seen in their surgeries. With the provision of other services being reduced, community space for maternity care was readily available. Careful consideration was needed to ensure that the venues identified were accessible to women both driving (parking) and using public transport and distributed across the boroughs.

6.9 It was necessary to reduce as far as was safe the numbers of face-to-face contacts for both women and staff. The following pathway was implemented: -

- 10 weeks – telephone booking appointment with a midwife (full history taken and risk assessment carried out) additional questions were added to ensure women had phone/computer access to be able to join a virtual/telephone appointment. Information was also shared around safe travel etc.
- 12-week combined screening – face to face appointment (ultrasound scan), Height, weight, blood pressure and initial blood tests carried out
- 16 week – telephone appointment with a midwife
- 20 weeks anomaly USS and midwifery appointment (face to face)
- 25-week visit omitted, except for women expecting their first baby
- 28 week – Midwifery face to face appointment within community hub
- 32 week – Midwifery face to face appointment within community hub
- 34-week visit omitted, except for women expecting their first baby

- 36 – 41-week pathway remained unchanged from Pre-Covid pathway

6.10 Obstetric appointments were risk assessed for the need to see women in person or carry out the appointment over the phone.

6.11 Remote midwifery blood pressure monitoring clinics were established in collaboration with a lead obstetrician for antenatal and postnatal women with an automated blood pressure device supplied to women.

6.12 Carbon monoxide screening was suspended.

6.13 Suspension of the 36-week ultrasound scan for a period of time due to challenges with staffing

Postnatal Pathway –

6.14 Prior to all home visits the family were contacted to ask if anyone in the family had symptoms of Covid

6.15 Home visits to postnatal women were reduced to minimise face to face contacts for women, their families, and staff.

6.16 Women were seen at home on the first day home postnatally following a caesarean section also first-time mums who were breast feeding. All other women received a telephone call on their first day home from a midwife who performed a risk assessment to determine if a visit was required.

6.17 Women were seen on day 5 in the community hub when the Newborn Blood Spot was taken (there was a national agreement that this could be delayed if the woman had symptoms of Covid)

Support for women and babies

6.18 The following support was put in place for women and their babies:

- Ongoing breast-feeding support provided face to face within the maternity hubs
- Facebook live was used to deliver interactive sessions to support infant feeding.
- Parent Education was provided online.
- Tours of the maternity unit were replaced by virtual tours.
- Discharge and safe sleeping information was available online

Visiting arrangements

6.19 Visiting arrangements changed several times during this period depending on the national recommendations and practices across other London maternity units. Women were able to have one person with them during labour and for a period of time post-delivery (until transferred to the postnatal ward). During lockdown a support person was only able to be present once women were in active labour. It was appreciated that women found it difficult not to have support when having their labour induced. There was a reallocation of space and women requiring induction of labour were allocated single rooms which enabled them to have a support person with them.

6.20 There were exceptions to the above when women had additional needs, such as teenagers, visual or hearing difficulties, anxiety etc. These women met with a senior midwife and additional support planned.

6.21 Due to the pressures in theatres at certain times, with high numbers of covid positive patients being cared for, partners were not able to accompany women to theatre for operative births, once capacity improved and testing was available partners with a negative covid test were welcomed into theatre for operative births.

6.22 No children were able to visit during this time except in exceptional circumstances such as following a stillbirth or baby born unwell. A compassionate visiting policy was written to ensure consistency.

6.23 For a period of time women were asked to attend alone for their ultrasound scan however once perspex screens were installed within the scanning rooms women could be accompanied by one other person.

6.24 Once testing was available this was either carried out on admission or women would provide evidence of a test on admission. Women were asked to undertake a Covid test twice a week and prior to coming for appointments.

6.25 Neonatal services continued to enable parents to visit their baby together however did restrict the visiting of children.

Birth Choices

6.26 The homebirth service was suspended for a short period of time due to staffing challenges and community midwives needing to support the hospital service. Continuity teams were also suspended, and the midwifery workforce were reallocated to ensure safe staffing in the acute areas of the service. One community midwifery team (POPPIE) continued to provide continuity of carer to vulnerable women and provided the homebirth service.

6.27 At times the birth centre was closed due to staffing challenges and the need to centralise staff.

Communication and Woman's experiences

6.28 The maternity service worked in partnership with the Maternity Voices Partnership to communicate with women the changes to service provision. It was evident that women and their families did find the restriction on visiting challenging during the pandemic. In a survey carried out 87.5% of women reported the restriction on visiting to have had a negative impact on their experience.

Innovations in maternity

6.29 Innovative changes put in place in response to the pandemic included:

- Virtual follow up of antenatal and postnatal Covid positive women – This telephone clinic was run by a midwife and maternal medicine physician and enabled women to remain at home or be discharge earlier due to this provision.
- Introduction of Kaiser Permanente sepsis risk calculator – This calculator is a tool that generates a risk score based on 5 maternal risk factors present at birth and evolving clinical presentation of the baby. The calculator-led protocol was associated with a marked

reduction in antibiotic use to new born babies and a reduction in the length of inpatient stay for mum and baby.

- Sector wide Covid huddles – These were led by the Chief Midwife for London and gave all maternity services the opportunity to share any learning and to seek support.
- Maternal Medicine Huddles – These were sector wide multi-disciplinary virtual huddles with presentations of Covid maternity cases for discussion, education and support.
- In March 2020, the maternity team at the Trust created a document 'Operational planning in maternity for Covid-19 pandemic' this was, and remains a working document that aims to collate the different sources of information and share the links to these.

Trust Internal Incident declared 27 December 2020

6.30 The Trust experienced significant operational pressures and noticed concerns in relation to the oxygen capacity on 26/12/2020, when the site oxygen demand rose to a point at which it was likely it may exceed the maximum that the reserve vacuum insulated evaporator (VIE) could supply. The risk was that if oxygen usage increased any further, the oxygen pressure would reduce and may reduce the efficiency of the ventilators.

6.31 On the 27/12/2020 the oxygen usage was still increasing which was reported to the emergency medical gas group. At this stage the Trust declared (with the support of SEL CCG) an 'Internal Critical Incident', not a 'Major incident' as was reported widely in the media at the time. The following statement was made on the Trust's website on 28/12/2020.

> *Internal incident at Queen Elizabeth Hospital*
>
> *As you may have heard in the media, we declared an internal incident at Queen Elizabeth Hospital (QEH) on Sunday 27 December as a precautionary step due to the high number of Covid-positive patients we are seeing at the hospital. We have been following our plan to cope with a second wave of Covid-19 and are working closely with hospital and healthcare partners in south east London.*
>
> *All our patients have received the treatment they need, including intensive care treatment for Covid-19 and oxygen therapy as required. We are continuing to monitor the situation to ensure that this remains the case.*
>
> *Posted on 28 Dec 2020 at 19:51*

6.32 On the 27/12/2020 the clinical teams at QEH took delivery of 44 oxygen concentrators which were delivered by estates/clinical teams, me and the Chief Nurse to the appropriate patients requiring 5 l/m or less of oxygen. These patients were removed from the piped oxygen system and oxygen was supplied by the concentrators instead. This helped to slightly reduce the output from the VIE. In the days that followed further oxygen concentrators were distributed to patients across the QEH site with c.100 oxygen concentrators in place at the end of the first week in January 2021. In addition, the high use of oxygen for patients on ventilators was reviewed and the use of high flow oxygen was limited where clinically appropriate as these two methods of oxygenation used high concentrations.

6.33 The following PAGEONE notifications were issued at the time of the 27/12/2020 incident which indicate ambulance diverts were in place. No inpatients were transferred from the QEH site during the incident because of concerns regarding insufficient oxygen availability.

- 27 Dec 2020 13:04 – Page one declaration from QE *"FULL MAJOR INCIDENT DECLARED AT QUEEN ELIZABETH HOSP SITE – ALL DEPARTMENTS PLS REFER TO YOUR MAJOR INCIDENT PLAN"*
- 27 Dec 2020 14:20 – Page one message from LAS BOW *"GREEN: NO RESPIRATORY PATS TO QUEEN ELIZABETH HOSP SITE. REDIRECT ST TOM AND KINGS UNTIL 16:15. WILL ACCEPT PAEDS AND CARDIAC ARREST: SR BOW"*
- 27 Dec 2020 20:46 – Page one message from EOC LAS *"GREEN: QUEEN ELIZABETH HOSP SITE – BLUE LIGHT REDIRECT EXCLUDING PAEDS AND CARDIAC ARREST UNTIL 22:00 EOC SOUTH HM"*

6.34 As indicated in the above messages, ambulance diverts were put in place so that ambulance traffic could be redirected across other SEL trusts. This is the standard approach taken by the London Ambulance Service and the SEL system when any individual site comes under pressure. Patients with respiratory symptoms were not transferred by ambulance to the QE site from 27/12/2020 at 14:20 for the duration of the divert.

6.35 Throughout the incident, there was no loss of care provision to any patients. Management ensured continuous monitoring of the oxygen demand across the QEH site and senior onsite presence from the Trust's leadership team. Members of operational teams (including the QEH Medicine Divisional Director of Operations, the QEH Site Director and Deputy Chief Nurse) were joined by the Chief Nurse, Chief Strategy Officer and me to ensure that all decision taking was taken by experienced and accountable leaders.

6.36 At the time of the incident, a full daily ward by ward Oxygen/patient audit was reinstated (as had been in place at the start of the pandemic) enabling clinical teams to prevent overloading of areas. In addition, the estates team stepped up hourly monitoring of oxygen levels (on a 24/7 basis).

6.37 In the days that followed, the Trust participated in internal, SEL system and regional calls, during which management was able to provide assurance on the site's response. The QEH was one of several sites in London where there were significant concerns regarding oxygen capacity, as such the site was prioritised for delivery of oxygen concentrators and implementation of a manifold solution to provide a more permanent solution to securing a reliable oxygen supply.

6.38 From the 4/1/20, as teams returned to sites in the new year, the Trust worked with colleagues at GSTT to reduce demand on the QEH site by opening a ward (25 beds) at St Thomas' Hospital. This was for lower acuity covid positive patients using available General and Acute (G&A) capacity. Transfers of patients from QEH were agreed on a daily call between clinical and operational teams for a period of about 3 weeks.

6.39 On 5/01/2021 a request for provision of an additional oxygen manifold room (on both Trust sites) was presented to Execs for approval.

6.40 On 7/01/2021 I agreed and implemented a SOP for discharging patients with a low oxygen requirement that could be managed by the community teams in Greenwich and Bexley (Exhibit EA EA/20 – INQ000428908).

6.41 The debrief report in relation to the internal incident declared by the Trust on 27/12/2020 is provided as an exhibit to the Inquiry (Exhibit EA/19 – INQ000428907).

6.42 The Trust was fortunate throughout this incident, and indeed throughout the pandemic, that demand for its services never reached a point where decisions were necessary to ration or withdraw care from any patient. As noted, the Trust worked closely with partner trusts across SE London and ensured that patients were transferred where appropriate to ensure that all sites could meet demand for services and maintain consistent ratios of medical and nursing staff. Despite this, there were times, particularly at the start of the pandemic, when concerns were raised by all staff regarding the potential future scenarios that could arise. Given the unprecedented nature of a global pandemic, the unknowns in terms of the way the virus would evolve, and the instances of rationed care that had occurred across the globe, there was a very real sense of anxiety and fear felt by all hospital staff.

6.43 At all times the Trust maintained consistent criteria in terms of its approach to decisions to escalate care. Decisions continued to be made based on clinical judgement led by me and senior consultants across the QEH site.

Discussions regarding the rationing of care / Ethics Committee

6.44 Following some initial meetings with clinicians in March 2020, in April 2020 I worked with colleagues to review and develop arrangements for an Ethics Committee which would support clinical decision taking if demand for Trust services exceeded available resources, or in the event challenging and ethical decisions needed to be made in terms of the best interest of patients. At this point an informal WhatsApp group was set up for clinicians to discuss difficult cases virtually – this transitioned to a more formal rota and group (Clinical Review Board) that was established were a clinician needing to discuss a difficult case. This was in response to the very real fear that the medical staff had that we would need to ration care, particularly intensive care treatment to patients. This reconstituted group met on 17/04/2020 to agree it's terms of reference. Ensuring arrangements were in place for an effective Ethics Committee was a step taken in direct response to the real and potential ethical issues posed by the pandemic globally.

6.45 The Terms of Reference for both the Ethics Committee (Exhibit EA/21 – INQ000428909) and the supporting Clinical Review Board (Exhibit EA/22 – INQ000428910) were approved by the Trust Board at its meeting on 21/04/2020. To support the operation of the Committee and decision making across the Trust, I also ensured an updated Clinical Decision-making aid and operational policy was in place (Exhibit EA/23 – INQ INQ000428911), along with clear clinical guidelines for the control of symptoms for covid patients receiving end of life care (Exhibit EA/24 – INQ000428912). This tool was intended to assist with clinical decision making, ensuring that patient autonomy was respected, and at the same time supporting clinicians in

challenging and ethical decision making which may include escalation to critical care. The tool used the best evidence available at the time including from the Royal College of Physicians and NICE and was adapted by a clinician with an interest in ethics and an academic ethicist from Kings College, London. Had there been a national tool this would have been useful to provide further guidance. These documents are provided to the Inquiry.

6.46 Throughout the relevant period criteria for providing oxygen therapy (including low or high flow oxygen, CPAP, NIV and/or mechanical ventilation) remained constant and all patients were eligible for this unless they declined it, or were receiving end of life care.

6.47 Despite initial concerns regarding rationing of care, which prompted steps such as ensuring robust arrangements for an Ethics Committee, arrangements in place to work with colleagues across the SELCCN ensured that there was no rationing of care was necessary at any stage during the pandemic period.

CQC Audit / Use of ReSPECT forms / CQC review of DNACPR forms

6.48 The Trust did not use ReSPECT forms during the relevant period, but instead used Treatment Escalation Plan (TEP) and Do Not Attempt Cardiopulmonary Resuscitation (DNACPR) forms for inpatients. TEP forms record and communicate the personalised and realistic goals of treatment, and note the values and preferences of patients receiving care in the event their condition should deteriorate. DNACPR forms confirm an agreed decision for patients for whom CPR should not be attempted.

6.49 Following a request from the Department of Health and Social Care, the Care Quality Commission (CQC) undertook a national review of how DNACPR forms were used during the first wave of the Covid-19 pandemic.

6.50 The CQC focussed on seven CCG areas across England and Greenwich was selected as one of the seven areas. QEH was chosen to provide a sample, and this took place on 25/11/20 with eight patient records reviewed. This review identified some gaps in practice that culminated in a letter to the Trust dated 4/12/2020 requesting assurance and further information on its processes around DNACPR and associated governance. The letter identified the following three areas:

- A lack of recorded discussions with patients about the decision for a DNACPR order.
- Decisions to initiate a DNACPR made by doctors in training with no evidence of oversight/countersigning by a consultant.
- Lack of a clear rationale for some of the DNACPR decisions made for some patients.

6.51 The Trust responded on the same day providing evidence for each of the identified areas of concern, an action plan and made the following statements:

- *Discussions with patients were taking place, were being documented and this documentation was retained. However, due to the Trust's introduction of a new electronic records system this information was not always consistently held in the same part of the medical notes.*

- *Senior clinicians were involved in DNACPR decisions and provided oversight to doctors in training however due to the transition from paper records to the iCare system, there had been a difficulty to complete this electronically and would require a manual audit of records.*
- *There was information provided within the body of medical records that provided clear rationale for DNACPR orders and the most recent Trust wide documentation audit showed that DNACPR rationale was recorded. The results of the audit were provided as part of the evidence submission to CQC.*
- The CQC undertook an unannounced inspection on 7/12/2020 at QEH to review 31 DNACPR orders. On the 8/12/2020 the inspection team interviewed me and three members of the QEH senior management team; furthermore, they examined trust documentation which included the Trust's policy on DNACPR, Treatment Escalation Plans (TEP), risk papers, audit reports and training summaries. This was sent to CQC as part of their information request following the inspection.
- The main issue identified by the CQC inspection was the recording of conversations regarding TEP decisions were documented in the body of the patient's medical record and not on the TEP form where it was easily accessible.

6.52 'Community DNACPR' was recorded in TEP forms where a decision to put a DNACPR order in place had previously been taken in a primary/ community care setting (e.g. by the GP) and had been reviewed after the patient had been admitted to the Trust.

6.53 The 7/12/2020 audit identified three instances at the Trust where the TEP form in place for three records noted 'Community DNACPR' as the reason for the new DNACPR order without confirmation in the form that this decision had been reviewed after the patient had been admitted. The admitting doctors noted the patient had a community DNACPR in place and decided to continue with the order during the patient's admission to hospital. The plan to continue was correct, although the Trust acknowledged that the documentation could be more robust to confirm that the existing decision had been reviewed upon admission and the decision to continue it was based on further clinical assessment.

6.54 The Trust presented the CQC findings (Exhibit EA/26 – INQ 000428914) at the Trust Quality Committees and a Task and Finish Group was established to take forward the identified actions which were all linked to the update of the Trust policy to incorporate the move to an electronic patient record, and documentation procedures rather than clinical practice.

6.55 In response to the Inquiry's specific questions in relation to DNACPR notices:

- TEP forms and DNACPR notices issued by clinicians at the Trust form part of the patient's electronic record on iCare.
- DNACPR notices issued by the Trust at the time of the pandemic were being issued on iCare, the Trusts Electronic Patient Record (EPR). Where the EPR was being implemented, this was in place or on paper DNACPR forms during the transition to iCare, which had been ongoing for 12 months at the time of the inspection.

- No concerns were raised or shared with the Trust that DNACPR notices appeared to be issued (whether by hospital or external clinicians such as GPs) disproportionately to patients with protected characteristics.
- No concerns were raised or shared with the Trust that that patients arriving at the hospital had DNACPR notices which did not appear to be clinically appropriate,

6.56 It is also important to note that in their verbal feedback to me, the Chief Nurse and CEO of the Trust on the 8/12/2020, the CQC stated that the original concerns raised which brought about the focussed inspections were unfounded. It should also be noted that the there were no concerns raised that DNACPR notices appeared to be issued (whether by hospital or external clinicians such as GPs) disproportionately to patients with protected characteristics, such as patients from ethnic minority backgrounds, patients of a particular age or disabled patients.

6.57 In addition, there were no concerns that patients arriving at the hospital had DNACPR notices which did not appear to be clinically appropriate, and no concerns that during the pandemic the Trust had seen any increase in the number of patients arriving at the hospital with a DNACPR notice on their notes.

6.58 As noted above, the Trust put in place a DNACPR task and finish group to:

- Review and update of the Trust DNACPR policy.
- Review and update of the Trust TEP policy and ensure it reflects practice and changes to the iCare system.
- Provide oversight of the changes made to iCare to support and streamline effective recording of DNACPR information and relative discussions on the electronic record system; and
- Provide oversight of the Trust wide DNACPR audit and ensure effective implementation of the recommendations that ensure updated training on TEP and DNACPR discussions for all junior doctors.

6.59 The update presented to the Trust Board in January 2021 following the audit is provided as an exhibit to the Inquiry (EA/25 – INQ000428913).

Impact of the pandemic on different patient groups

6.60 The pandemic highlighted inequalities between population groups within the local community in terms of their access and outcomes to healthcare.

6.61 Throughout the waves of the pandemic the Trust considered the varying impact of Covid on different groups within local populations and has provided updates to the Quality Governance Committee on any emerging trends seen in data at both a national and local level.

6.62 At a local level, an analysis of patients presenting to the QEH ICU was undertaken by the QEH Critical Care Command Centre Lead to review data on patients collected between 1/3/2020 and 29/4/2020 (Exhibit EA/27 – INQ000428915). This review considered factors including the age, gender, BMI and ethnicity of patients. This review identified that patients with obesity,

diabetes and hypertension tended to have poorer outcomes following a critical care admission. the ethnicity data for these patients did not show any significant difference in outcome once admitted to critical care.

6.63 Throughout the pandemic I, with the support of other clinical staff undertook a number of reviews of outcomes of the patients at LGT. The first paper in November 2020 was one on nosocomial transmission and mortality outcomes during the first wave of the pandemic (Exhibit EA/28 – INQ000428916). This paper demonstrated patients dying with nosocomial infection all had significant comorbidities and frailty -58% had dementia and 58% had been in hospital for longer than 28 days before diagnosis of covid. Lessons learnt from this review reflected the emerging national guidance and learning implemented. The rates of nosocomial infection and mortality at LGT reflect the limited data that had been published nationally.

6.64 In 2020 I collaborated with colleagues across SE London to provide data for a paper titled 'A case-control and cohort study to determine the relationship between ethnic background and severe COVID-19' (Exhibit EA/29 – INQ000428917). This paper's conclusions were that for black and mixed ethnicity are independently associated with greater admission risk with COVID-19 and may be risk factors for development of severe disease, but do not affect in-hospital mortality risk. Comorbidities and socioeconomic factors only partly account for this and additional ethnicity-related factors may play a large role. The impact of COVID-19 may be different in Asians.

6.65 In April 2021 a comparison of outcomes for patients with covid through the two waves demonstrated mortality was significantly lower during the second wave, compared to the first i.e. 18.5% vs 29.5% (Exhibit EA/30 – INQ000428918). This demonstrated a 39% reduction in mortality during the second wave. This reduction was observed across all ages, gender, all ethnic subgroups, and both legacy sites:

- There were no major differences in mortality between males and females.
- Advancing age was associated with significant mortality at all times with no differences between the two waves. 64% of all deaths occurred in patient>60. There were fewer deaths among those <50 during the second wave compared to the first
- The reduction in mortality during the second wave was noted across all ethnic sub-groups
- Only Black African ethnicity was independently associated with lesser mortality during the second wave when compared to the first, controlling for age, gender and ethnicity

6.66 Following the fourth wave, I worked with my deputy to consider the demographic and clinical presentation of hospitalised patients with SARS-COV-2 during the First Omicron Wave. This piece of research is published in the European Medical Journal

6.67 A further paper produced during this time was on socio-demographic associations of COVID antibody in multi-ethnic healthcare workers was published in 2021 (Exhibit EA/31 – INQ000428919). .

6.68 Throughout the pandemic the Trust has taken these papers to the Board highlighting the inequalities experienced by the pandemic for particular groups. This work has proved a catalyst for wider work on inequalities at the Trust in recent years in terms of healthcare access and healthcare outcomes as well as a significant agenda of work focused on understanding population health. I have personally taken forward this agenda in recent years by leading the development of a more co-ordinated approach to population health management across Lewisham, that uses Population Health management to improve physical and mental health outcomes, promote wellbeing and reduce health and social inequalities for patients on elective waiting lists.

7 Impact on hospital staff

7.1 From the outset the pandemic had a significant impact on staff morale and on their physical health and mental wellbeing. The first wave of the pandemic engendered positive change, and positive staff attitudes persisted in the face of uncertainty surrounding a second wave due to support, appreciation, and co-worker camaraderie and fellowship. Throughout this period the morale of teams remained high.

7.2 During the early weeks of the pandemic, medical staff worked well together to cover colleagues who were sick or self-isolating, sharing knowledge of emerging insights into the virus both through education sessions and through WhatsApp groups and supporting each other. At the same time, however the level of stress, fear and anxiety experienced by staff should not be underestimated. Many staff were redeployed to work in roles in which they were unfamiliar at a stressful time. The pandemic also posed an immediate and largely unknown threat to the physical health of staff. Those working on the frontline were vulnerable to the COVID-19 infection, and in the months that followed many staff contracted the virus, and a proportion of these staff experienced severe and long-term symptoms. From the early stages of the pandemic, staff were open about their fears and anxieties. There were a number of colleagues who were reluctant to expose themselves to the unknown impact of the virus and who indicated reluctance to work in areas occupied by covid patients. There were also staff who made personal sacrifices to protect their loved ones, for example, I can recall one instance of an ICU nurse who avoided direct contact with her own baby for a number of months to be sure of not transmitting the virus.

7.3 Despite the many and significant concerns raised in relation to the unknown nature of the virus, what was clear to me from feedback I received, there was a theme of resilience and mutual support that was shared by both front-line staff and senior leaders.

7.4 As the pandemic progressed, the Trust noted an increase in staff anxiety and the number of staff reaching out for psychological and spiritual support. This demand for support was sustained and increased throughout the relevant period. Low staff morale and exhaustion are long-reported problems across the health service and have certainly been an issue for staff at the QEH site. In the latter waves of the pandemic, it is clear to me that the impact on staff mental health has worsened – with staff feeling drained by the ongoing and enduring effects of the pandemic.

7.5 To support staff, a number of practical steps were taken by the Trust. These included, but were not limited to:

- Psychological support
- Risk assessments, Provision of PPE and appropriate fit testing
- Staff antibody testing and Covid testing
- Shielding arrangements for vulnerable staff groups
- Open access dermatology clinics weekly run for staff due to pressure areas from mask working or other skin conditions as a result of PPE and handwashing

- Agile working guidance – IT support with LGT anywhere, MS Teams etc
- Staff guides with frequently asked questions (FAQs) for all staff, redeployed staff and specific staff groups.
- Access to psychological support, chaplaincy support and welfare calls to staff who were absent
- Hotel accommodation and staff relaxation areas
- Wellbeing trolley rounds to all clinical areas
- Donations of scrubs, masks and grocery essentials.
- Discounted and donated meals
- Parking
- Staff recognition – including a wellbeing day; and thank you voucher for £50 provided to all staff in June 2020
- The Trust implemented its own risk assessment tool for staff working during the pandemic in May 2020.
- As Chief Medical Officer, I wrote in person to each consultant in the Trust in June 2020, thanking them for their support and hard work throughout the first wave of the pandemic.

7.6 In putting together provision for staff wellbeing measures, the Trust took examples from across the NHS and across a variety of industries. NHSEI initiatives (such as "wellbeing Wednesdays" and the mental health hotlines) were helpful in that they provided a prompt and ideas for measures that the Trust could adopt or develop inhouse.

Staff risk assessment for the impact of covid

7.7 Concerns about the disproportionate impact of Covid-19 on minority communities as well as heightened levels of staff anxiety in May 2020 resulted in the Trust's development of a risk assessment tool in line with national guidance (Exhibit EA/32 - INQ000428920). This risk assessment was created in partnership with the Trust staff-side and staff network representatives and enabled staff and their managers to have discussions that allowed individual anxieties to be considered as well as sufficient mitigations to be put in place to keep staff safe. The tool, which remains in place, was completed for all permanent and temporary Trust staff, although revisions were made to guidance during the pandemic in line with the latest guidance. A copy of the current version of the Trust's risk assessment is provided.

7.8 The risk assessment form was for all staff and its completion was designed into processes for all new starters (Trust and Bank). Progress to implement the Risk Assessment process for all staff was regularly reported to the People and Place Committee and Trust Board.

7.9 A paper was presented to the May 2020 Board setting out the impact of the pandemic on BAME staff and patients (Exhibit EA/33 – INQ000452499). A copy of this is provided. Throughout the pandemic the Trust was keen to understand, and be sympathetic to any unequal impact of measures adopted by the hospital in response to the Covid-19 pandemic

on hospital staff. For PPE, efforts were made to respect religious preferences and ensure all staff could be fit tested for an appropriate and effective PPE that met their requirements as well as the national guidance in place. However, in practice, this was not always possible to achieve due to limited supplies (e.g. Hooded respirators would have allowed men with beards to have appropriate protection without the need for a face mask but it took the Trust months to source these due to a national shortage).

Communication with staff groups

7.10 Throughout the pandemic the Trust used different approaches to communicate with staff and sought to ensure its approach to communication was as effective as possible. At the start of the pandemic, the briefings led by the Chief Executive were important, as was senior members of the leadership team being visible across the Trust sites. Local handover briefings, confirming updates in guidance and Trust processes, were also put in place for staff at all shift changes on wards across the QEH site.

7.11 I began to write regular briefings to all the medical staff in the Trust outlining the very rapid changes in protocols, site reconfigurations, clinical guidance and always ensured to thank staff for all their hard work. As the pandemic progressed these briefings were less frequent but continued throughout my time as Chief Medical Officer (CMO) on a fortnightly basis and were well received by staff. As the Trust began to use MS Teams technology more, I also had regular MS Teams meetings open to all senior medical staff both to update on issues but to give staff an opportunity to ask questions and make suggestions.

7.12 As the pandemic evolved the developments in the Trust's IT infrastructure enabled increasing opportunities to communicate with the wider workforce and patients on virtual basis. The Trust increasingly made use of virtual technology (such as MS teams) for meetings and developed its approach to using 'WhatsApp' groups.

7.13 In the early months of the pandemic the Trust introduced weekly Board meetings to ensure robust oversight in relation to the many decisions being taken by management on a daily basis. Summaries of these meetings were made available on the Trust's intranet and website, alongside a range of guidance (both Trust guidance and guidance from a range of regulatory bodies and reliable sources) for both staff and patients.

7.14 Given the widespread uncertainty at a national level at the start of the pandemic, the relationship between national decision makers was challenged. Whilst national guidance appeared to be formulated with some awareness of the feasibility and realities of implementation, often updates provided to the Trust (e.g. PPE, visiting arrangements or changes to the requirements to isolate staff) were sent for immediate implementation at the same time as being communicated to the public. This made implementation/ and expectation management difficult. Whilst the Trust did seek to use national escalation channels (for example sourcing PPE), its pandemic response was largely delivered through collaboration with partners across the SEL system. Similarly, support for hospital staff was, perhaps necessarily, felt very much devolved to the local level. Whilst the Trust sought to adopt the

vast amounts of guidance from national bodies or decision-makers such as the DHSC, NHS England, the medical Royal Colleges and Public Health England. Greater alignment between these bodies could have been beneficial for front line trusts seeking to respond to the operational and clinical challenges posed by the pandemic.

8 Recommendations

8.1 As demonstrated by this statement, and as will no doubt be demonstrated in many of the statements collated by the Inquiry, the pandemic presented challenges on a scale never previously witnessed. Alongside these challenges however, the collective determination, dedication and innovation demonstrated by staff at my organisation, and which I believe will have been replicated up and down the country, was also on a scale which has never previously been seen, and which I doubt will be seen again for many years to come. During this short period, in the wake of many challenges, significant long-term innovations, improvements and efficiencies were made.

8.2 Despite this, it is important that the Inquiry finds a way to capture good practice and the learning from the pandemic in order that this can be rapidly implemented should a future pandemic occur.

8.3 At the local level hospital sites need to devote time and attention to the detail of their business continuity planning. For example, this may include maintaining up to date registers for workforce redeployment, being clear in terms of the site reconfiguration that may be required in the event of initiating future escalation plans, confirming formalised protocols and procedures for mutual aid and reviewing arrangements for supply chain distribution.

8.4 Effort is also required at a national level to ensure that all sites are provided with necessary investment to confirm they have appropriate infrastructure and equipment to manage short-medium term increases in the scale of services they provide. Alongside this, clearer arrangements should be put in place to ensure effective (national) messaging on plans and decisions taken at a central level.

8.5 The pandemic has brought into sharp focus the need to review current gaps in the NHS workforce, ensuring that there is a clear plan to bridge and address these at a national level. A consistent characteristic of those organisations that managed the challenges posed by the pandemic most effectively appears to be the importance placed by leadership teams on supporting staff in both a personal and professional capacity. This recognition of NHS staff feeling supported in their duties by national, regulatory and leadership bodies is essential if the health service is to successfully navigate current challenges it faces in terms of NHS staff morale and industrial action.

Appendix A: Statement of Truth

I believe that the facts stated in this witness statement are true. I understand that proceedings may be brought against anyone who makes, or causes to be made, a false statement in a document verified by a statement of truth without an honest belief of its truth.

Signed: Personal Data

Dated: 16 April 2024