

# Neonatology - Workforce

## GIRFT Programme National Specialty Report

by **Eleri Adams** GIRFT Clinical Lead for Neonatology

**Kelly Harvey** GIRFT Nursing Advisor for Neonatology

**Michelle Sweeting** GIRFT Allied Health Professional Advisor for Neonatology

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# Foreword by Professor Tim Briggs

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I am delighted to recommend this Getting It Right First Time review of neonatology workforce led by Eleri Adams, with nursing advisor Kelly Harvey and allied health professional advisor Michelle Sweeting.

The neonatal workforce is crucial to operating safe and effective services for neonates and their families, and the GIRFT deep-dive visits offered great insight into workforce issues and the transformation needed. These extensive findings on workforce have been set out in this neonatal workforce report and should be read alongside the main GIRFT neonatology specialty report.

Eleri has applied the GIRFT approach to neonatal care. Getting it right at the very start of life obviously improves survival and outcomes for infants, but also has further benefits to outcomes and health in later life. Several landmark inquiries and reports have focused on neonatal and maternity care, and this report on workforce is aligned with these reports. It provides the benchmarking to build on the implementation of existing recommendations, such as those set out in the Neonatal Critical Care Transformation Review.

Recommendations in the neonatology workforce report focus on embedding sustainable workforce plans that reduce the reliance on doctors in training and develop the nursing and allied health professional teams, along with pharmacy and psychology services, to deliver better multidisciplinary working and career structures.

I am encouraged to hear that Eleri found so many examples of excellence in the trusts she visited, some of which are highlighted in this report as case studies. Like other GIRFT clinical leads, Eleri has been impressed by the commitment of all who work in neonatal care and encouraged by their engagement with the GIRFT programme and dedication to improving care.

This support is vital to the GIRFT programme, which can only succeed with the backing of clinicians, managers and everyone involved in delivering care.

My greatest hope is that this report will provide further impetus, encouragement and support to all those working in neonatal care to work shoulder to shoulder, with parents, to improve experiences and outcomes for infants and families in the NHS.



## **Professor Tim Briggs CBE**

*GIRFT programme Chair and National Director of Clinical Improvement for the NHS*

*Professor Tim Briggs is consultant orthopaedic surgeon at the Royal National Orthopaedic Hospital NHS Trust, where he is also Director of Strategy and External Affairs. He led the first review of orthopaedic surgery that became the pilot for the GIRFT programme, which he now chairs. Professor Briggs is also National Director of Clinical Improvement for the NHS.*

## Foreword by Neil Marlow

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The neonatal workforce is unique in bridging the divide between a highly specialised intensive care discipline and child health. Neonatal nurses too are different from children's nurses and midwives, with their own unique skill set. Because of the intensity and emotional concentration of the work, their importance in promoting long term health for newborn babies is often under recognised. Neonatology is a challenging discipline to work in and the newborn baby is not simply a small child. Understanding how to support the transition from intrauterine to extrauterine life and to foster the early growth of the family are key roles that this important group of professionals must master alongside their clinical practice. Similarly for the important allied health professionals – neonatal care brings its very specific challenges and demands a different skill set.

This report covers all health professional groups and identifies the challenges at trust level in staffing the neonatology service and ensuring life-long learning and career development are supported. Much of the report identifies issues that we are well aware of, but within the Long Term Plan there is funding to support an expansion of staffing, primarily for Nursing and Allied Professionals. This should help to kick start a refresh of the professions, particularly now that there are published standards set by professional bodies and for the first time there is a commitment to get the career structure right.

One of the problems highlighted in the accompanying GIRFT neonatology specialty report is the challenge of running neonatal services at all hospitals. Clearly where there are high rates of transfer out this is suboptimal and NHS trusts and neonatal teams must either staff their units properly or look carefully at their population and decide to transfer before birth.

I commend this plan to all involved – it is a well thought through strategy to ensure we have a workforce fit to deliver care into the next decade. Congratulations to Dr Adams and the GIRFT team, working with the RCPCH, for putting this together. All involved in delivering neonatal care should take note and strive to deliver better staffing levels and better educational opportunities for their staff.



**Neil Marlow**

*Chair, NHS England Neonatal Critical Care Transformation Review (2015-19)  
Emeritus Professor of Neonatal Medicine, University College London*

# Introduction

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Improving the morbidity and mortality for newborn infants has been a key national ambition since 2015, alongside reductions in maternal mortality and stillbirth. The neonatal workforce is fundamental to the safety and effectiveness of care offered to neonates and their families and ultimately improving outcomes in neonatal care. Significant gaps in the neonatal workforce provision were identified by the NHS England Neonatal Critical Care Transformation Review (NCCR) published in December 2019. In response to this the NHS Long Term Plan prioritises funding for additional nursing and allied health professional support within neonatology, which commenced in April 2021.

This GIRFT neonatology workforce report focuses on providing detailed benchmarking of the current provision within neonatology for medical and nurse staffing as well as allied health professionals, pharmacy and psychology input as part of the multidisciplinary team. In addition, GIRFT deep-dive visits to both neonatal Operational Delivery Networks (ODNs) and individual trusts offered greater insight into the workforce issues faced in neonatal care which supported the GIRFT team in understanding local and regional experiences.

Workforce transformation is required. This report brings together data to support the direction of this transformation alongside examples of innovation and good practice, with recommendations and actions focused on training and development for the entire multidisciplinary team.

For more information on other key findings and recommendations for improvement across neonatology please see the GIRFT neonatology specialty report.



## Dr Eleri Adams

### *GIRFT Clinical Lead for Neonatology*

*Dr Adams is President Elect of the British Association of Perinatal Medicine (BAPM), and takes over as President in October 2022. She has been a consultant neonatologist at the Oxford University Hospitals NHS Foundation Trust since 2002 and was clinical director of the service for ten years. She has a keen interest in developing networked services, and led the Thames Valley Neonatal Network for 16 years. She is the vice-chair of the Neonatal Clinical Reference Group for NHS England where she led Quality Improvement and CQUIN development for several years. She is currently the pricing lead for the National Neonatal Transformation Review and also chairs the Neonatal Critical Care Expert Working Group for the National Casemix Office.*



## Kelly Harvey

### *GIRFT Nursing Advisor for Neonatology*

*Kelly has been a neonatal nurse since 2002 and has worked in a variety of clinical roles as well as education and management, latterly working as an Advanced Neonatal Nurse Practitioner. Her current role as a Quality Improvement Lead Nurse for the North West Neonatal Network allows her to fulfill her passion for ensuring standards of neonatal care for babies and families are of the highest standard. She is part of the BAPM Quality Collaborative where she was involved in the development of the quality improvement toolkits for preterm optimisation. She is an executive committee member of the National Neonatal Nursing Association through which she is keen to ensure the nursing voice is heard.*



## Michelle Sweeting

### *GIRFT Allied Health Professional Advisor for Neonatology*

*Michelle is a neonatal specialist Speech and Language Therapist (SLT) at Broomfield Hospital (Mid and South Essex NHS Foundation Trust) in Chelmsford where she has established a new service provision. Previously, Michelle was the Paediatric and Neonatal SLT lead at Barts Health NHS Trust. She has a range of experience of working in NICUs, LNUs and SCUs, over the past 18 years. Michelle has a keen interest in quality improvement and developing neonatal services which have allied health professionals embedded as part of multidisciplinary team.*

*Michelle is the deputy chair of the Royal College of Speech and Language Therapists Clinical Excellence Network and is an SLT representative for the Allied Health Professionals neonatal conference committee.*

# Statements of support

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## British Association of Perinatal Medicine

The British Association of Perinatal Medicine (BAPM) is delighted that the GIRFT Programme has provided such a comprehensive report on the current neonatology workforce, and we acknowledge with thanks the enormous amount of work that has gone into the preparation of this report. Sadly, the report confirms what neonatal practitioners have long known, that the neonatal service in England and Wales is chronically underfunded and that workforce transformation is urgently required. The snapshot surveys conducted as part of this report indicate that similar problems also exist in the devolved nations.

Some of the figures are truly concerning; only 15% of neonatal units meet nursing staffing standards with almost 2000 WTE vacancies, less than half of neonatal units meet medical staffing standards and almost two thirds of neonatal units have no psychology input. The fact that staffing standards are less able to be met in lower activity neonatal units cannot be ignored and strengthens further the case for change in how neonatal care is provided in the UK.

As stated so eloquently in the report, the neonatal workforce is fundamental to the safety and effectiveness of care offered to neonates and their families. We are facing unprecedented challenges due to a combination of factors including an aging nursing workforce, lack of funding for allied healthcare professionals, changes in medical training and, just as importantly, societal demands for improved work-life balance. The GIRFT report acknowledges all of these issues and offers practical solutions for improvement.

If we are to continue to provide world class neonatal care, with the untold benefits that this brings for babies, their families and the wider society, it is time for action.

### Helen Mactier

*President, British Association of Perinatal Medicine*

## NHS England Clinical Reference Group

I welcome the publication of the GIRFT review of the neonatal workforce. The neonatal workforce has been under pressure for many years with a deficit in all aspects of neonatal staffing ranging from significant shortages in nurse staffing, a lack of investment in allied health professionals and a medical workforce that has not evolved to keep up with the demand for neonatal care. There is a national commitment to transform neonatal services, however this ambition will not be realised without the required workforce to support the changes. This GIRFT review led by Eleri Adams is an important step in the right direction towards resolving the current staffing challenges. The report also highlights many areas of innovation and good practise. I fully support its findings and recommendations, which should be referred to when developing plans to improve the neonatal workforce.

### Ngozi Edi-Osagie

*Chair, NHS England Clinical Reference Group for Neonatal Critical Care*

## The Neonatal Nurses Association

The Neonatal Nurses Association (NNA) welcomes the GIRFT neonatal report to further develop the workforce plans recently implemented by NHSE in response to the Neonatal Care Critical Care (NCCR) review. The results clearly demonstrate the paucity of clinical nurses including Qualified in Specialty (QIS), especially on neonatal intensive care units, and the challenges facing managers in recruiting and retaining nursing staff.

The NNA is pleased that the GIRFT programme has engaged with our trustees to identify quality enhancing roles which should be integral in all units to support safe sustainable care for babies, families and staff. The Nursing Career Framework within the GIRFT report is clear and will be an excellent tool for nurse managers and hospital trusts to use when establishing the nursing workforce. The development of a staffing calculator for neonatal nurse quality roles will also inform commissioning and workforce managers in hospital trusts when budgeting for safe neonatal nurse staffing.

The NNA agrees with GIRFT that '*Nurturing staff is the only way to improve staffing levels and in turn improve quality and safety*'.

### Róisín McKeon-Carter

*Chair, Neonatal Nurses Association*

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## Chief Allied Health Professions Office, NHS England & NHS Improvement

I welcome the publication of the GIRFT neonatal workforce review which further highlights and recognises the vital role allied health professionals (AHPs) play in the multidisciplinary team in neonatal care, and the difference they make in improving outcomes and quality of experiences for neonates and their families.

This report demonstrates that nationally there is significant inequity of service provision, a lack of funding and a need for a recognised career pathway for the AHP workforce. Many families are not receiving the specialist service provision they require whilst on neonatal units.

Whilst I welcome the creation of the Allied Health Professional Network roles as a positive initial step in developing the AHP workforce strategy, substantial change will be required to meet the published staffing standards and embed AHPs into the heart of neonatal care.

### **Dr Joanne Fillingham**

*Deputy Chief Allied Health Professions (AHPs) Officer  
The Office of the Chief Allied Health Professions Officer,  
NHS England and NHS Improvement*

## Health Education England

Health Education England (HEE) is pleased to see the attention that this GIRFT report gives to the nursing, midwifery and allied health professional workforce issues as well as medicine across neonatology. Transformation is essential to effectively train the future workforce to provide the highest standards of care for the neonate and their family units.

At the same time, it is vital to support the current workforce to enable the transformation and enable the future workforce into the specialist practice area of neonatal care. HEE is engaged with this process and look forward to the collaborative working with all our colleagues to meet the challenges that lie ahead.

### **James McLean**

*Deputy Chief Nurse, Health Education England*

# Executive summary

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The neonatal workforce is fundamental to providing a high-quality service to babies and their families, with evidence that morbidity and mortality are reduced, and neurodevelopmental outcomes improved with better staffing. This report demonstrates there is significant pressure on the neonatal workforce with shortages in medical and nurse staffing, as well as allied health professional (AHP) and psychology input across neonatal services in England. The current workforce is not fit for purpose and major workforce transformation is required, with consideration of new roles, recruitment strategies and a focus on improving education, training and career development across all staff groups. Additional funding, particularly for neonatal nurse staffing in the NHS Long Term Plan will result in significant improvements and is warmly welcomed as is funding for AHPs and psychology support at a regional level, although funding at a local level for these services remains challenging.

## Staffing standards

There are very significant shortfalls in staffing against national standards for both medical and nurse staffing. Overall, less than half of neonatal units meet BAPM medical standards, with much higher achievement of standards in units that meet recommended activity levels than those that do not. For nursing, only 15% of units meet the standard with no neonatal intensive care units (NICUs) achieving this and there is significant regional variation. Multi-professional team services are very patchy with less than half of neonatal services having regular dietetics, physiotherapy and speech and language input and less than a quarter with regular psychology and occupational therapy input. Recommendations focus on development of risk mitigation strategies and action plans for improvement, working in collaboration with neonatal operational delivery networks (ODNs), with regular benchmarking against national standards. In addition, development of a national standard for psychological support in neonatal units is now underway.

## Quality-enhancing roles

GIRFT data demonstrates wide variation in provision of recognised quality-enhancing roles such as nurse educators, bereavement leads and breastfeeding advisers. Many services have no dedicated provision; for example, there is no dedicated time for bereavement support in the majority of NICUs. Many of these roles contribute to supporting parent partnership in care and facilitate earlier discharge home and therefore resource allocated for this purpose is likely to be both more cost-effective and of higher quality. It is recommended that national guidance is produced and endorsed by national bodies, to support providers to benchmark and develop appropriate protected time for nurse specialised quality-enhancing roles.

## Multi-professional input to networks

Multi-professional input into networks is improving, and NHS Long Term Plan money from April 2021 is helping to support network-level AHP and psychology provision. It is essential that AHPs and psychology have a voice at neonatal ODN board as well as providing leadership for neonatal AHP and psychology working across the region, focusing on peer support and reviewing local service provision. Of note, currently no provision is made for network pharmacy leads and there is a strong case for a senior network pharmacy lead to support the significant drug safety agenda in neonatology (see GIRFT Neonatology National Specialty report for further information on drug safety).

## Workforce transformation, education and training

Development of transformational workforce plans are essential at both neonatal ODN and trust level. These must reduce reliance on doctors in training and develop the nursing, allied health professional and wider multidisciplinary team. Skills and competencies for newer roles should be agreed at ODN level to ensure a standardised approach for transferability and governance. In addition, improved education and training for all staff is required with a key action to identify and prioritising workforce development monies and CPD funding to support access to neonatal Qualified in Specialty (QIS), a role essential qualification. Currently, there is significant regional variation in access to funding. Development of career pathways and training standards for nursing and AHP staff are essential and these are currently in progress with HEE. A suggested career framework for neonatal nurses, developed in conjunction with the Neonatal Nursing Association is included in this report.



# Recommendations

Throughout this report, we make a series of recommendations and actions, based on the conclusions from our data analysis. The table below sets out the proposed recommendations and actions required to support and develop the neonatal workforce, based on our conclusions from the data analysis and deep-dive visits. Each action lists the owner and proposed timescale for progress to be made on implementation. These should be considered alongside the wider recommendations we have made to support improvements in neonatal care which are outlined in GIRFT's accompanying Neonatology National Specialty Report.

Actions shaded in   blue are key and a priority for implementation. Other actions are developmental.

Recommendation	Actions	Owners	Timescale from date of publication
1. Neonatal units should adhere to national staffing standards for nursing and medical staff including additional protected time for medical and nursing quality-enhancing roles.	a Review staffing requirement against BAPM medical and nursing standards (utilising 2020 Neonatal Nursing Workforce Calculator). Where staffing standards are not met, a risk assessment should be undertaken detailing mitigation strategies and a timely action plan to meet the set standard agreed by the provider trust. This should be shared with the ODN and reviewed biannually. The action plan should align with network requirements for the service as part of network capacity review (see also recommendation 4c and 4d in GIRFT's Neonatology National Specialty report regarding changes to gestational thresholds for in-utero transfer where medical standards are not met).	Neonatal ODNs and trusts	1 – 2 years  1 – 2 years
	b Develop national guidance, endorsed by national bodies, to support providers in benchmarking the appropriate protected time for nurse specialised quality-enhancing roles	NNA in collaboration with the National Lead Nurse group with BAPM and CRG endorsement	1 – 2 years
	c Review nursing quality roles against GIRFT benchmarking information and medical and AHP non-clinical/quality roles against current national standards. Gaps in provision should have an action plan signed off at trust board level and agreed by the ODN.	Trusts with input from neonatal ODNs	1 – 2 years

Recommendation	Actions	Owners	Timescale from date of publication
<p><b>2.</b> Embed allied health professionals, pharmacy and psychology services into neonatal units and networks, in line with professional standards to improve outcomes for babies.</p>	<p><b>a</b> Match AHP, pharmacy and psychology workforce action plans against professional staffing standards, using GIRFT data where appropriate. Identify gaps and develop business cases to improve resourcing.</p>	Trusts and network AHP leads	1 – 2 years
	<p><b>b</b> Write specific staffing recommendations for psychology services for NICUs, LNUs and SCUs, to enable calculations for staffing based on activity and levels of care.</p>	BPS & neonatal psychologist stakeholders, BAPM	1 – 2 years
	<p><b>c</b> Develop a network business case for senior network pharmacy lead to support the drug safety agenda (see also drug safety recommendation 12, GIRFT Neonatology National Specialty Report).</p>	Neonatal ODNs, regional specialised commissioning teams and ICS	12 months
	<p><b>d</b> Ensure neurodevelopmental follow up clinics have appropriate AHP staffing and resourcing as recommended in the NICE guideline NG72.</p>	Trusts	12 months
	<p><b>e</b> Increase AHP, psychology and pharmacy representation at network boards to support planning and service delivery. A minimum of one Board member representative should stand for the AHP / pharmacy / psychology specialities and have strong network links with their lead colleagues through national and network professional groups.</p>	Neonatal ODNs, network AHP and psychology leads	12 months
	<p><b>f</b> Establish AHP, pharmacy and psychology network groups in each ODN to enable peer support, research and development, standardise care pathways and support or lead on QI projects.</p>	Neonatal ODNs, trusts, network AHP and psychology leads	12 months
<p><b>3.</b> Develop transformational workforce plans that reduce reliance on doctors in training and develop the nursing, allied health professional and wider multidisciplinary team.</p>	<p><b>a</b> Develop an overall regional workforce strategy. This should be developed by neonatal networks in conjunction with relevant regional ICS boards and Local Maternity Systems.</p>	Neonatal ODNs, ICSs and LMSs/LMNSs	2 – 5 years
	<p><b>b</b> Develop strategies to reduce the reliance on doctors in training, taking account of any changes which may be required to workforce plans as a result of Progress+ (RCPCH Paediatric Training Programme). Consider expanding and developing newer roles e.g. MTI trainees, ANNPs, ENNPs, physician associates and prescribing pharmacists. To ensure appropriate development, transferability and governance, the skills and competencies for these new roles should be agreed at ODN level.</p>	Trusts, neonatal ODNs	2 – 5 years
	<p><b>c</b> Develop strategies to support new roles within the nursing and AHP workforce, linked to a robust competency-based education programme supported by network workforce/education leads and AHP leads.</p>	Trusts, neonatal ODN workforce, education and AHP leads	2 – 5 years

Recommendation	Actions	Owners	Timescale from date of publication
<p><b>4.</b> Develop sustainable, improved experiences and education for doctors in training, trained medical staff nurses, allied health professionals and newer roles (see also recommendation 6, GIRFT Neonatology National Specialty Report).</p>	<p><b>a</b> Identify and prioritise workforce development monies as well as CPD funding to support access to sustainable QIS funding as a role essential qualification. A similar approach to funding ANNP and ENNP training should also be explored.</p>	Regional ICSs with support from neonatal ODNs	2 – 5 years
	<p><b>b</b> Review, in conjunction with overall workforce review, HEE commissioned (Deanery) medical training placements, including those completing subspecialty training in neonatal medicine, to ensure they are appropriately placed to maximise experience, training and educational opportunities.</p>	HEE and RCPCH CSAC	2 – 5 years
	<p><b>c</b> Review, in conjunction with overall workforce review, junior doctor activities to ensure workload is appropriately distributed across the multidisciplinary team. This should include: a) working with midwifery colleagues to ensure NIPE examinations for well term infants are not a routine part of the tier 1 medical rota; b) agreeing guidelines for which deliveries require neonatal attendance and regularly auditing practice to prevent unnecessary attendance; and c) review medical administrative workload and availability of administrative &amp; clerical support, particularly at weekends to ensure optimal cost-effective cover to reduce the administrative burden for medical staff.</p>	Trusts	2 – 5 years
	<p><b>d</b> Investigate the feasibility of apprenticeship models to support elements of neonatal career development.</p>	Neonatal ODN workforce and education leads in collaboration with NNA, HEE, BAPM and RCN	2 – 5 years
	<p><b>e</b> Create a national group bringing together network education/workforce leads that link to key stakeholders such as HEE, NNA and BAPM to achieve a sustainable education and training offer for neonatal nurses. to include:</p> <ul style="list-style-type: none"> <li>- Quality Assured Neonatal Preceptorship programme</li> <li>- Focus on development into senior nursing roles</li> <li>- Access to wider training such as Leadership</li> <li>- Appropriately protected CPD as discussed and agreed within local PDR/Appraisal with innovative solutions to support development of whole teams of neonatal nurses with focus on educating the educators.</li> </ul>	Neonatal ODN workforce and education leads, in collaboration with NNA, HEE, BAPM and RCN with the backing of the neonatal CRG	2 – 5 years
	<p><b>f</b> Support production of and utilise a nationally agreed education and training framework to support standardisation of competence and educational offers across the neonatal nursing workforce.</p>	Neonatal ODN workforce and education leads, with the support of HEE, NNA, BAPM and RCN.	2 – 5 years
	<p><b>g</b> Utilise the BAPM ANNP Framework to support future development in this role.</p>	Neonatal ODN workforce and education leads, in collaboration with NNA, BAPM and working with the HEE ACP academy	2 – 5 years
	<p><b>h</b> Embed the nationally agreed AHP training and education standards (expected publication April 2022), including accredited post-graduate training to expand knowledge and skills base as they progress in their chosen field of neonatology.</p>	Trusts, neonatal ODN AHP network leads	2 – 5 years

Recommendation	Actions	Owners	Timescale from date of publication
<p><b>5.</b> Neonatal nursing career structures should be recognised nationally and promoted.</p>	<p><b>a</b> Establish a nationally recognised career structure for the specialism of neonatal nursing to improve recruitment and retention and provide sustainable career development. This structure will be supported by HEE through a nationally agreed education and training framework as described in recommendation 4f.</p>	<p>NNA with support from, HEE, RCN, BAPM and ACP academy</p>	<p>2 – 5 years</p>

# Background

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Staffing has a significant impact on mortality and morbidity for babies and families requiring neonatal care. There is good quality evidence for improved outcomes where nurse<sup>1</sup>:patient staffing ratios meet national standards<sup>2</sup> and it is essential that medical staff are available onsite, without other commitments, to provide advanced neonatal resuscitation, stabilisation and ongoing care for intensive care patients.<sup>3,4</sup> Allied health professionals, pharmacy and psychology services are also key to providing a service attuned to the holistic needs of the baby and family, reducing costs and impacting longer term neurodevelopmental and other health outcomes.<sup>5,6,7,8</sup>

The NCCR highlighted concerns regarding gaps in the workforce and the need for workforce transformation and several actions have been taken to support improvements in this area:

- The NHS Long Term Plan has allocated additional funding to support improved neonatal nurse and AHP staffing which commenced in April 2021.
- The Clinical Negligence Scheme for Trusts (CNST) Maternity Incentive Scheme safety action 4 requires trusts to formulate action plans to ensure safe medical and nursing staffing levels.
- Health Education England (HEE) has commenced a review of both neonatal nursing and allied health professionals (AHPs) education and training.

This report provides more granular detail around the workforce to assist the Neonatal Implementation Board (responsible for implementing actions from the NCCR review), neonatal ODNs and HEE with their plans. It makes a number of recommendations, consistent with those already made by the NCCR, to develop the neonatal workforce.

## About our Analysis

To support our recommendations, as well as to prepare for our network and trust visits, we analysed a range of workforce data collected directly from trusts as well as collating data from existing sources. These include:

- A snapshot survey of neonatal services and workforce across the whole UK (191 services), done in conjunction with the RCPCH on a weekday and weekend day in September 2019. The goal was to provide an 'on the ground' picture of shortages and day-to-day realities for people working in neonatology. Results from this snapshot were reported back to neonatal services in January 2020 through individual benchmarking reports produced by the GIRFT team and the findings nationally were reported in a joint publication with the RCPCH in September 2020.<sup>9</sup>
- Four GIRFT questionnaires for each hospital (100% returns December 2020) covering the following areas:
  - medical staffing, clinical services, governance and research;
  - nurse staffing;
  - allied health professionals (AHPs), pharmacy and psychology; and
  - parents and families.
- BadgerNet, which is a key data source used by all units to collect data for multiple purposes.

This report should be read alongside GIRFT's Neonatology National Specialty Report, which provides a series of recommendations to support improvements in neonatal network functioning, clinical care pathways and quality and safety of care for babies and their families.

<sup>1</sup> Throughout this report, when we use the term "nurse" we are generally referring to registered nurses.

<sup>2</sup> Watson SI, Arulampalam W, Petrou S, et al. (2016) The effects of a one-to-one nurse-to-patient ratio on the mortality rate in neonatal intensive care: a retrospective, longitudinal, population-based study. *Arch Dis Child Fetal Neonatal Ed*

<sup>3</sup> BAPM (2014) *Optimal Arrangements for Neonatal Intensive Care Units in the UK (2021)*  
<https://www.bapm.org/resources/296-optimal-arrangements-for-neonatal-intensive-care-units-in-the-uk-2021>

<sup>4</sup> NHSE and DHSC (2019) *Implementing the Recommendations of the Neonatal Critical Care Transformation Review*  
<https://www.england.nhs.uk/publication/implementing-the-recommendations-of-the-neonatal-critical-care-transformation-review/>

<sup>5</sup> Earnest M, Brandt B. (2014). *Aligning practice redesign and interprofessional education to advance triple aim outcomes*, *Journal of Interprofessional Care*

<sup>6</sup> Dow, A, Ivey K, C & Shulman, B. (2018). *The Future of Pediatric Speech-Language Pathology in a More Collaborative World*, *Pediatric Clinics of North America*.

<sup>7</sup> Cherry AS, Mignogna MR, Roddenberry Vaz A, et al. (2016) *The contribution of maternal psychological functioning to infant length of stay in the Neonatal Intensive Care Unit*. *Int J Womens Health*.

<sup>8</sup> Hannan, K.E. and Bourque, S.L. (2020), *How does family integrated care in the NICU affect short-term infant and parent outcomes?* *Acta Paediatr*

<sup>9</sup> RCPCH and GIRFT, *Snapshot of neonatal services and workforce in the UK available at:*  
[www.rcpch.ac.uk/resources/snapshot-neonatal-services-workforce-uk](http://www.rcpch.ac.uk/resources/snapshot-neonatal-services-workforce-uk) (last accessed April 2021)

# Findings and recommendations

## Medical staffing

### GIRFT key findings:

- NICU compliance with weekday daytime BAPM medical standards was 70% in high-volume NICUs and 19% in low-volume NICUs. Lack of 12-hour consultant presence was the main reason for non-compliance
- LNU compliance with weekday daytime BAPM medical standards was 46% in high-volume LNUs and 3% in low volume LNUs. Lack of rota separation from general paediatrics at tier 1&2 were the main reasons for non-compliance.
- Vacancies against budgeted establishment were present in half of NICUs for tier 2 and 37% of NICUs for tier 1 and 3 rotas.
- Difficulty filling deanery training posts was the most common reason for vacancies across neonatal units.
- There is variation both in the number of medical personnel available to support neonatal care where activity levels are similar, and in the roles and responsibilities undertaken by medical staff or other staff groups across different services
- Medical staff, particularly those working in LNUs and SCUs, felt under pressure at weekends.

## Adherence to BAPM standards

Medical staffing standards are set by the British Association of Perinatal Medicine (BAPM) for neonatal intensive care units (NICUs), local neonatal units (LNUs) and special care units (SCUs). These standards are endorsed by national reports and service specifications.<sup>10</sup> Staffing is divided into three tiers: tier 1 (pre-MRCPCH doctor or advanced neonatal nurse practitioner - ANNP), tier 2 (post-MRCPCH doctor or ANNP) and tier 3 (consultant). **Table 1** summarises the adherence to staffing standards for NICUs, LNUs and SCUs and breaks this down according to whether the unit meets the recommended Neonatal Critical Care Transformation review (NCCR) activity standard (high volume unit) or not (low volume unit). (Further information on activity standards can be found on page 37 of the GIRFT Neonatology National Specialty Report.) Full details of the compliance with each part of the standard are provided in a supplementary workforce data appendix (**Appendix A**).

The proportion of units meeting all standards is highest in high-volume NICUs with standards more likely to be met on weekdays than weekends in both NICUs and LNUs (SCUs have fewer standards at weekends). The proportion of low volume NICUs and LNUs achieving the standard is very low. For NICUs the main reason for this was lack of 12-hour tier 3 (consultant) presence (25% in low-volume NICU, 83% in high-volume NICUs on weekdays). For LNUs the main reasons were lack of a rota separate from general paediatrics at tier 1 for 24 hours/day (17% in low-volume LNUs, 80% in high-volume LNUs on weekdays) and tier 2 for 12 hours/day (10% in low-volume LNUs, 74% in high-volume LNUs on weekdays). The lack of rota separation in LNUs is particularly concerning, given the medical interventions required for resuscitation, stabilisation and management of preterm infants from 27 weeks, as well as other babies expected to need short-term (one to two days) intensive care. The lower staffing levels are likely to, at least partly, explain the much higher rates of transfers for these infants from low-volume LNUs (see our discussion on care pathways for other premature infants on page 46 GIRFT Neonatology National Specialty Report). The main reason why SCUs did not meet the standard was due to the requirement for separate tier 1 or tier 2 rotas when activity levels were higher.

<sup>10</sup> BAPM (2021) *Optimal Arrangements for Neonatal Intensive Care Units in the UK*;

<https://www.bapm.org/resources/296-optimal-arrangements-for-neonatal-intensive-care-units-in-the-uk-2021>

BAPM (2018) *Optimal arrangements for local neonatal units and special care units in the UK*;

<https://www.bapm.org/resources/2-optimal-arrangements-for-local-neonatal-units-and-special-care-units-in-the-uk-2018>

NHS Commissioning (2015) *NICU Service Specification: Neonatal Critical Care*;

<https://www.england.nhs.uk/commissioning/wp-content/uploads/sites/12/2015/01/e08-serv-spec-neonatal-critical.pdf>

NHSE and DHSC (2019) *Implementing the Recommendations of the Neonatal Critical Care Transformation Review*

<https://www.england.nhs.uk/publication/implementing-the-recommendations-of-the-neonatal-critical-care-transformation-review/>

Department of Health (2009) *Toolkit for High Quality Neonatal Services* <http://www.londonneonatalnetwork.org.uk/wp-content/uploads/2015/09/Toolkit-2009.pdf>;

**Table 1: Proportion of neonatal units meeting British Association of Perinatal Medicine (BAPM) standards for medical staffing during the week and at weekends**

BAPM standards NICUs (% meeting the standard):	All NICUs	Low-volume NICUs <2000IC/year	High-volume NICUs ≥2000IC/year
Proportion meeting ALL relevant standards on WEEKDAYS	50%	19%	71%
Proportion meeting ALL relevant standards on WEEKENDS	39%	18%	45%

BAPM standards LNUs (% meeting the standard):	All LNUs	Low-volume LNUs <1000IC/HD/year	High-volume LNUs ≥1000IC/HD/year
Proportion meeting ALL relevant standards on WEEKDAYS	29%	3%	46%
Proportion meeting ALL relevant standards on WEEKENDS	27%	7%	39%

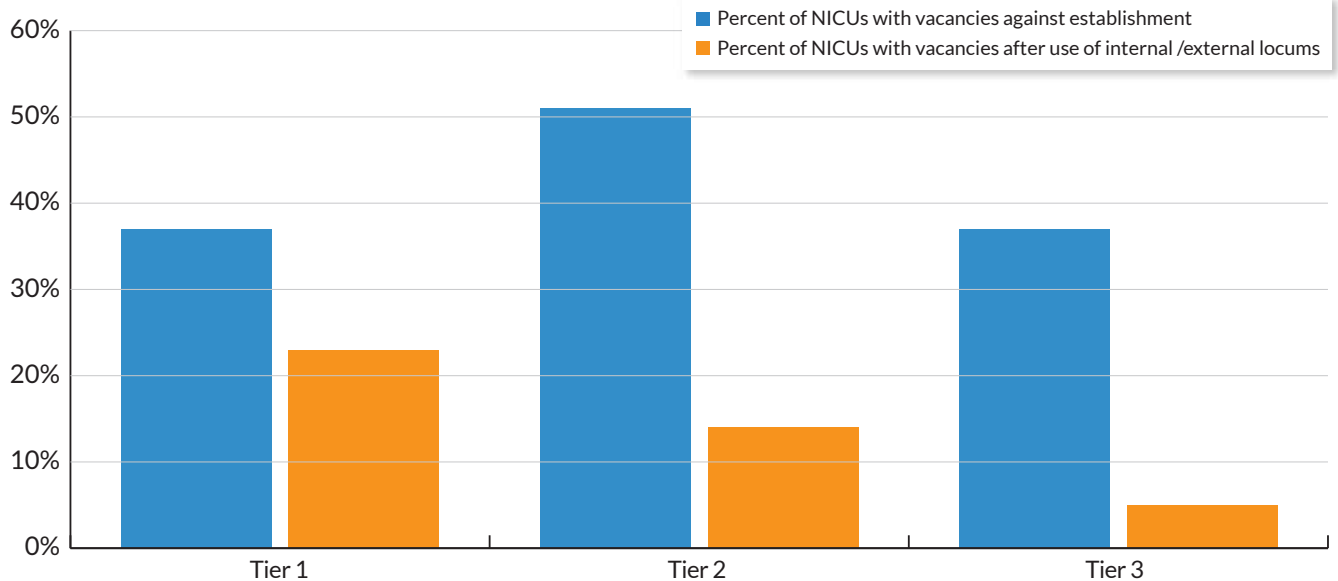
BAPM standards SCUs (% meeting the standard):	All SCUs
Proportion meeting ALL relevant standards on WEEKDAYS	45%
Proportion meeting ALL relevant standards on WEEKENDS	61%

Source: BadgerNet 2016-19, GIRFT\_RCPCH workforce snapshot survey September 2019, GIRFT Clinical Services Questionnaire December 2019

## Staffing vacancies

Staff vacancies against budgeted establishment were only available for NICUs as it was not possible to consistently separate the neonatal medical establishment from paediatrics in LNUs and SCUs. The percentage of NICUs with vacancies against budgeted establishment was very high (**Figure 1**) with a sizeable gap persisting at tier 1 and 2 following use of internal and external locums.

**Figure 1: Percentage of NICUs with vacancies in medical rotas against budgeted establishment and after use of locums, by tier of staff (2019)**



Source: GIRFT Clinical Services Questionnaire December 2019

Further data regarding how these gaps in establishment translate into cover on the ground are available from the GIRFT/RCPCCH workforce snapshot survey, which also includes information for LNUs and SCUs. The snapshot also demonstrates medical rota gaps overall were largest in South London and East Midlands and across NICUs in South London, East Midlands and the North West.<sup>11</sup>

## Recruitment and retention challenges

The snapshot survey demonstrated that currently just over three quarters of tier 1 and tier 2 staff are deanery trainees, the majority of whom are paediatric trainees, although there are high numbers of GP and foundation trainees in LNUs (25%) and SCUs (38%). Due to longstanding staffing shortfalls, other medical care models have evolved and in NICUs, advanced neonatal nurse practitioners made up 17% of tier 1 and 11% of tier 2 staffing. Clinical fellows or overseas doctors on the Medical Training Initiative scheme made up 27% of the NICU junior medical staff.

Failure to fill deanery training posts was cited as the most common reason for vacancies across all neonatal units in the November 2019 GIRFT questionnaire (25% of units for tier 1 and 36% of units for tier 2 posts). Other common reasons included delayed starts for overseas doctors due to immigration delays (15%) and maternity leave (10% of units for tier 1, 17% of units for tier 2). It is difficult for services to plan for these rota gaps as many of them occur with insufficient notice to fill vacancies. Over-recruitment is necessary, but not always permitted in advance, to allow for the high rate of attrition.

Staff vacancies cause a significant strain on both the quality of services and staff. Changes in rotas are required to maintain minimum staffing, which often increases the proportion of night-time and weekend duties, thereby reducing access to daytime training opportunities and increasing feelings of stress and overload. Given that training in neonatology is an essential part of the paediatric curriculum this makes both paediatrics and neonatology less attractive specialties for trainees to choose. For tier 3 (consultants), consideration should be given to reducing overnight and resident working patterns later in their career, acknowledging the difficulties with sustaining such working patterns in a high stress environment.

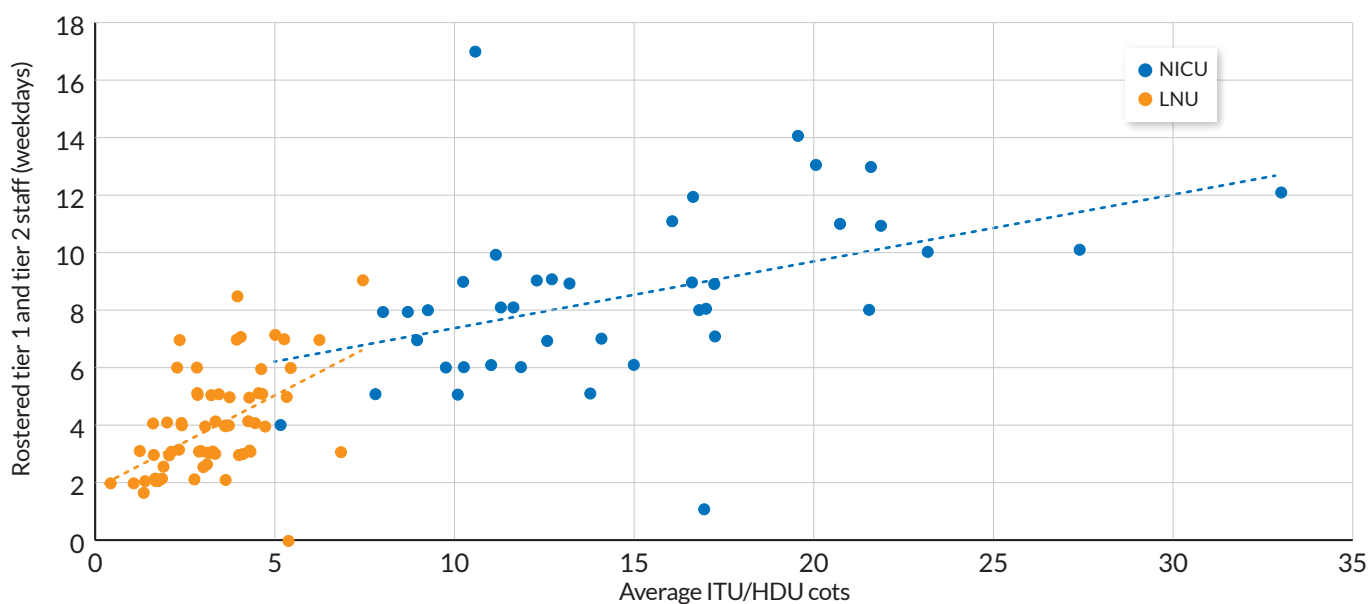
<sup>11</sup> RCPCCH (2020), A snapshot of neonatal services and workforce in the UK  
<https://www.rcpch.ac.uk/resources/snapshot-neonatal-services-workforce-uk>



## Staffing relative to activity levels

As might be expected, there is a correlation between the number of tier 1 and tier 2 staff rostered and the average intensive care/high dependency activity, but there is wide variation across services with similar activity. This is most apparent on weekday daytime shifts (**Figure 2**). Medical staffing may be influenced by other factors including delivery rate, transitional/special care requirements, specialist services such as neonatal transport, and availability of other staff groups e.g., midwives for NIPE. However, this is unlikely to explain the degree of variation seen and numbers of trainees are often based on historical allocations rather than current unit acuity.

**Figure 2: Number of tier 1 & 2 staff rostered for the weekday daytime shift compare to average occupied cots over 2018/19 in NICUs and LNUs**



Note: Where care is shared across neonatology and general paediatrics, 50% is attributed to neonatology.

Source: BadgerNet MY 2018/19 and RCPCH workforce snapshot survey September 2019

## Weekend working

The snapshot survey identified increased pressures on medical staffing at weekends, especially in LNUs and SCUs. Weekend medical staffing numbers were around two thirds of weekday levels for all medical tiers in NICUs, tier 1 and 2 in LNUs, and tier 1 for SCUs. There was also significantly less administrative and AHP support available at weekends. Qualitative data from the survey revealed that fewer medical staff felt there was sufficient clinical staff to manage safely at the weekend compared with weekdays, particularly in LNUs and SCUs. Medical staff in LNUs and SCUs reported lower levels of enjoyment, and higher levels of stress, anxiety and feeling overloaded at the weekend compared with weekdays.

## Roles and responsibilities

The neonatal snapshot survey demonstrated variation in roles and responsibilities undertaken by medical personnel. For example:

- Only 35% neonatal units reported that midwives had performed all or most of the newborn infant physical examination (NIPE) checks on well term babies (as recommended in NHS England's Better Births 2016)<sup>12</sup> and no NIPE checks were performed by midwives in 30% LNU and 40% SCUs meaning this entire workload falls to tier 1 medical staff/ANNP.
- Medical staff reported more blood tests performed by non-medical personnel in NICUs than LNU and SCUs.
- Neonatal medical staff attended 43% of all deliveries as a first responder for neonatal resuscitation which is extremely high given the admission rate to neonatal units is approximately 9%. Unnecessary attendance at deliveries is stressful for mothers and is not part of the normal birthing process. Additionally, due to the immediate requirement for attendance, these calls interrupt other work being undertaken.

<sup>12</sup> NHS England (2016). *Better births: Improving outcomes of maternity services in England*

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## **Medical staffing: summary of findings**

The current medical workforce model is unsustainable and no longer fit for purpose. High numbers of units (particularly units with lower activity) are unable to meet BAPM standards and there are significant gaps in rotas, impacting both the quality and safety of neonatal care and the experiences of doctors in training. This, combined with chronic nursing shortages, exacerbates workload and stress across the whole medical workforce, must be addressed urgently. There is variation both in the number of medical personnel available to support neonatal care, where activity levels are similar, and in the roles and responsibilities undertaken by medical staff or other staff groups across different services, particularly at weekends. As identified in the NCCR report, service transformation is needed, and this must become much less reliant on deanery trainees. Working patterns (e.g. overnight and resident working) need to be sustainable for all medical tiers. BAPM is currently developing a working group to review the quality of working life for consultants providing neonatal care.

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## Nurse staffing

### GIRFT key findings:

- 24% of units have the correct nursing establishment, and 15% of units have the correct nursing staff in post.
- The median deficit in staffing required against those in post was 20%.
- NICUs have the highest gaps in staffing and **no NICUs have the correct staff in post.**
- The total WTE nursing staff required to meet BAPM standards is **1,994 WTEs.**
- Nursing deficits are highest in North, Central and East London, South London and West Midlands.
- In five networks, more than 15% of the nursing workforce was made up of international nurses.
- In 2018/19, 90,000 neonatal shifts were covered by existing staff, with a further 11,907 shifts covered by external agency.
- Protected time for important quality-enhancing roles is absent in many neonatal units; only 42% of NICUs had dedicated time for the nurse bereavement support role.

## Adherence to BAPM standards

Nursing staffing standards are set by the British Association of Perinatal Medicine (BAPM)<sup>13</sup> and these standards are endorsed by service specifications and national reports.<sup>10</sup> Recommended minimum nurse:patient staffing ratios are 1:1 for intensive care, 1:2 for high dependency care and 1:4 for special care. Shift-by-shift cover must take account of these recommended minimum staffing levels based on an average unit occupancy of 80% (to allow for fluctuations in activity) and include a supernumerary shift coordinator and an appropriate skill mix to meet the care needs of the babies on the unit during each shift.

## Numeric standards

NHS England's CRG neonatal nurse staffing tool (Dinning) (2013) was the approved tool<sup>14</sup> for calculating the nursing establishment required for direct patient care against the most recent year's activity (not the declared cot numbers) and has been used for GIRFT benchmarking across all units. This tool has been refined and updated by the National Neonatal Lead Nurse Group in 2020 and has superseded the current tool following approval by the Neonatal Implementation Board and CRG in 2021. Comparative data across two networks suggests that the Dinning tool calculates on average 3.6% (0.75-5.5 WTE per unit) higher than the new tool, with greatest impact being on NICUs.<sup>15</sup>

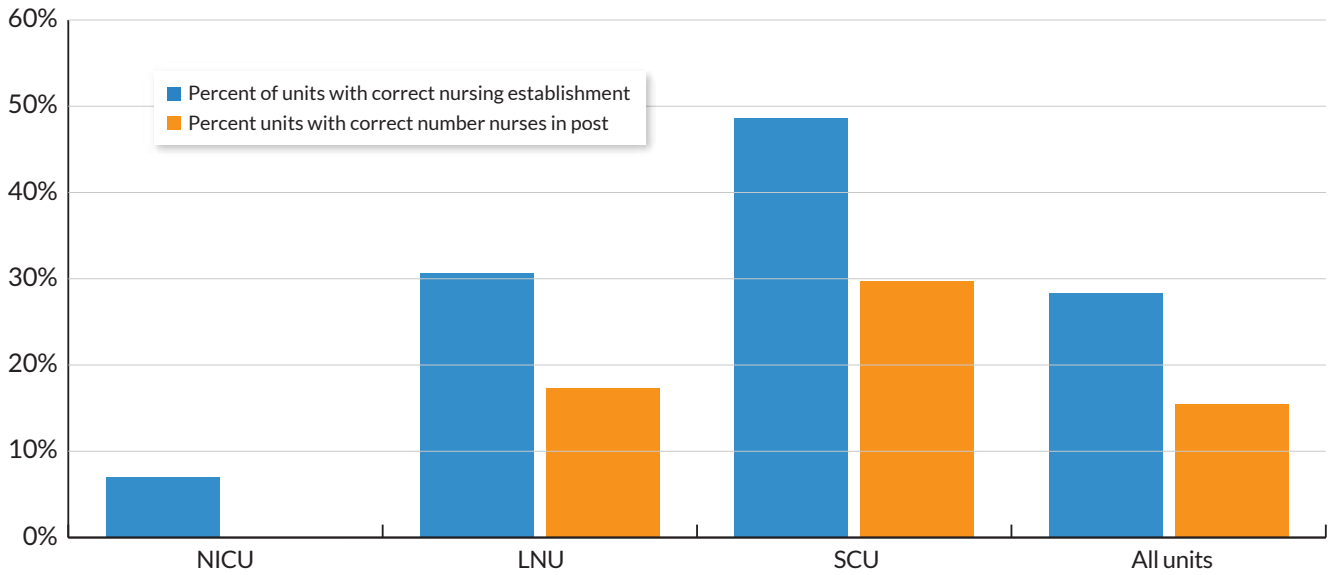
Nationally only 44 (28%) units have the correct establishment for activity according to the Dinning tool with 24 (15%) units having the appropriate staffing in post. NICUs are the worst affected. Only three units (7%) have the correct establishment for activity and no units had the correct staff in post (**Figure 3**).

<sup>13</sup> BAPM (2010) *Service Standards for Hospitals Providing Neonatal Care*  
<https://www.bapm.org/resources/32-service-standards-for-hospitals-providing-neonatal-care-3rd-edition-2010>

<sup>14</sup> NHS Improvement (2018) *Safe, sustainable and productive staffing: An improvement resource for neonatal care*

<sup>15</sup> Personal communication to GIRFT, Judith Foxon, Deputy Lead Nurse (Education & Workforce, East Midlands Neonatal ODN)

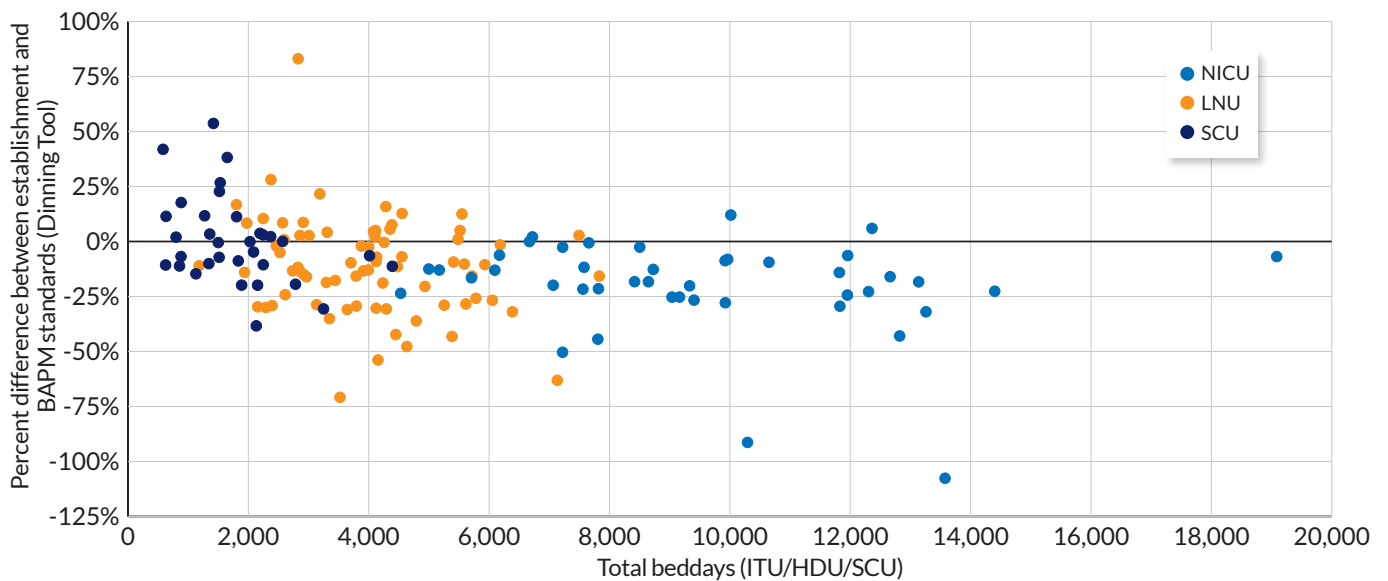
**Figure 3: Percentage of neonatal units achieving staffing standards required to meet BAPM standards calculated using CRG workforce (Dinning) tool**



Source: GIRFT Nursing and Clinical Services questionnaires December 2019

The median deficit between the required establishment to reach BAPM standards (using CRG workforce Dinning tool) and the current establishment was 11% across all units (interquartile range (IQR) of -22% to -11%). This median deficit was highest in NICUs (18%), LNUs (12%) and SCUs (0%) but there is significant variation across all units (**Figure 4**). The deficit against staff in post across all units is even higher (20% overall) due to vacancies against the existing establishment.

**Figure 4: Scatterplot demonstrating total activity against percentage difference between required establishment to reach BAPM standards (using CRG workforce Dinning tool) and current establishment**



Source: BadgerNet MY2018/19 and GIRFT Nursing Questionnaire December 2019

The National Neonatal Audit Programme (NNAP) provides an alternative way to measure adherence to numeric standards by measuring the proportion of nursing shifts numerically staffed according to BAPM standards (2010). In 2019, overall 69% of shifts met the numerical standards (NICUs 57%, LNUs 73%, SCUs 77%) which was a small improvement compared with 2018 (64%), the first year this data was collected. In addition, the report clearly demonstrates highly variable results across units of all designations and regions.<sup>16</sup>

## Skill mix standards

BAPM standards require the percentage of nurses within a neonatal service who are Qualified in Specialty (QIS) to be 70% or more. GIRFT benchmarking measured the percentage of staff *providing direct care* that were QIS. Overall, 48% of units had sufficient QIS nurses giving direct care, with the lowest results in NICUs (28%) and similar results for LNUs (56%) and SCUs (55%). This benchmark may underestimate overall QIS personnel as some of the non-direct care nursing roles, including management, education and specialist quality roles, will be highly qualified and provide senior input, training and quality support across the unit.

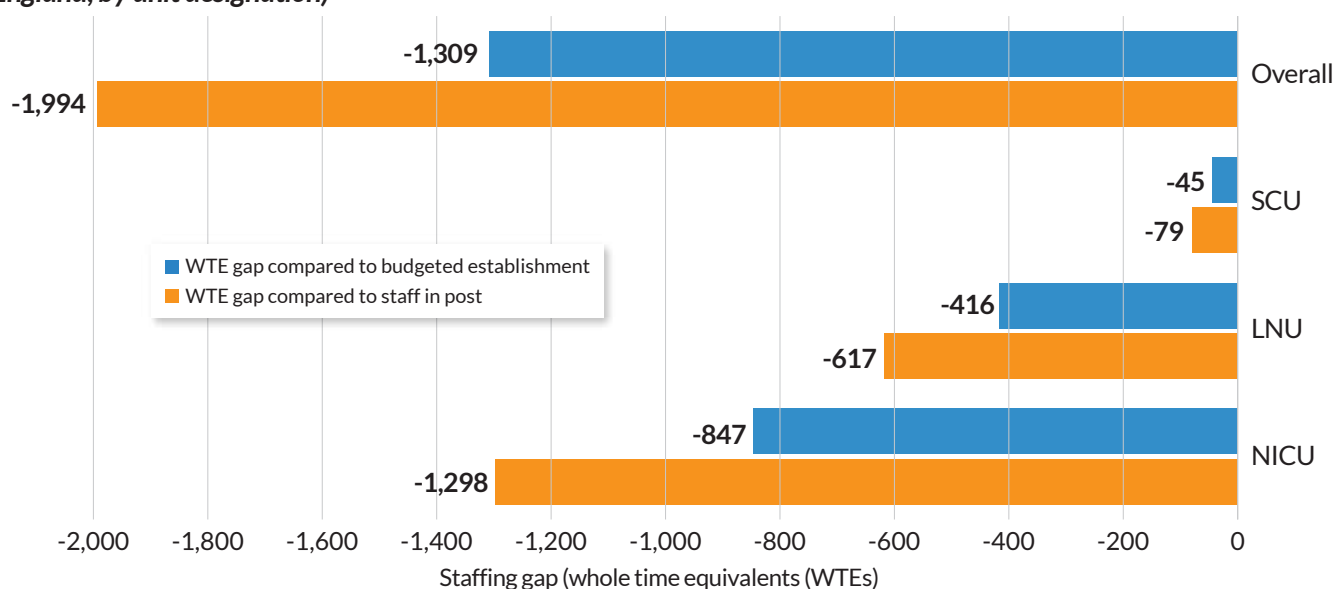
The NNAP provides an alternative measure, which again does not include non-direct care roles and measures the proportion of shifts with at least 70% of staff qualified in specialty. In 2019, 44% of shifts met the benchmark, NICUs 37%, LNUs 48% and SCUs 58%, and results were unchanged from 2018. Across both sets of benchmarks there is wide variation between units of all designations and between regions.<sup>15</sup>

## Staffing vacancies

There is a significant shortfall in nursing staff, approaching 2,000<sup>17</sup> WTE nursing posts across all units. The shortfall is particularly large in NICUs but is seen across all units (**Figure 5**).

Whilst these results are a 12% improvement compared with 2016-17 (when the gap was 2,263 WTEs, calculated using the same workforce tool),<sup>18</sup> the shortfall is significant and cannot be allowed to persist. These numbers do not include any additional requirements for management, education and other specialist and quality-enhancing time-protected roles which are vital to improve the outcomes of infants receiving neonatal care.

**Figure 5: WTE gap to meet BAPM standards compared to current budgeted establishment and staff in post (England, by unit designation)**



Source BadgerNet /GIRFT Nursing Questionnaire December 2019

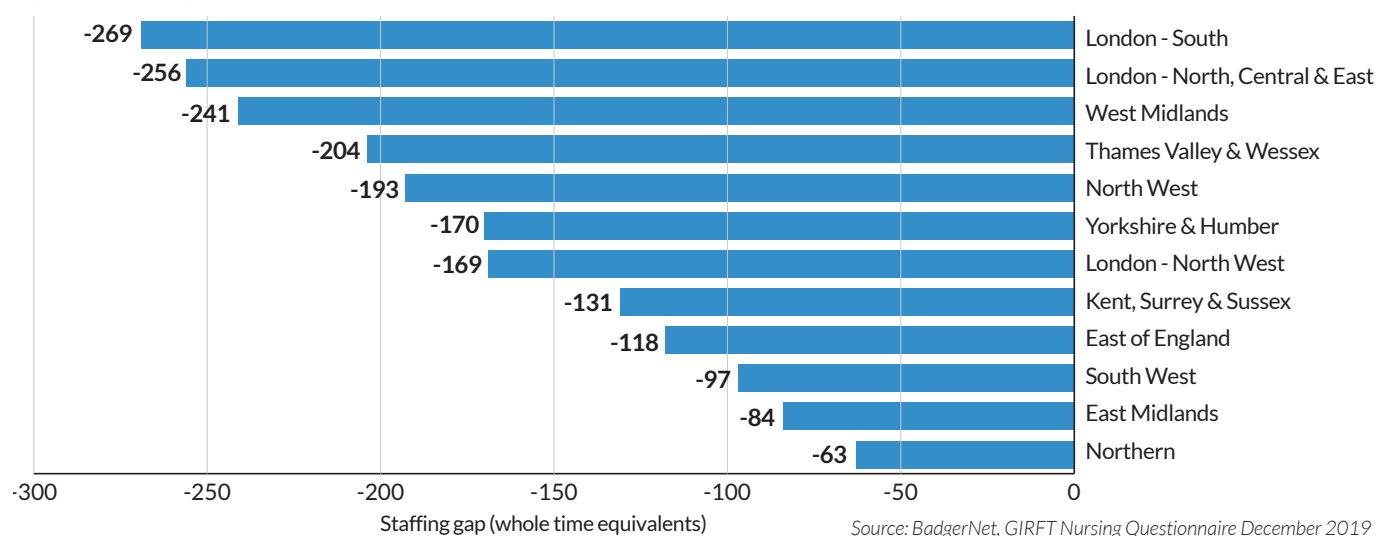
<sup>16</sup> NNAP (2020), Annual report on 2019 data, <https://www.rcpch.ac.uk/resources/national-neonatal-audit-programme-annual-report-2020-2019-data>

<sup>17</sup> These numbers may be a slight over-estimate against the new calculator but assuming the tool is over-reading by 3.6%, this still means 1,925 WTE additional nurses are needed to provide direct patient care

<sup>18</sup> L Patterson et al (2020) Neonatal nursing workforce survey – What does the landscape look like in England? Journal of Neonatal Nursing

The scale of the challenge is immense, particularly for some regions (see **Figure 6**). The total WTE gap in staffing to achieve BAPM standards is generally (but not exclusively) highest in regions with more urban areas, e.g. most particularly parts of London and the West Midlands. The WTE gap against establishment also reflects the size of the total gap against staff in post, with most units not managing to recruit and retain staff against the existing establishment, except for the Northern and South West regions (**Table 2**). Where gaps are large, it is important for trusts to understand the total WTE gap against BAPM standards, and to change the budgeted establishment to meet this in stepwise fashion as posts are filled.

**Figure 6: WTE gap to meet BAPM standards across networks**



**Table 2: Network distribution of WTE nursing vacancies against current establishment and WTE gap to meet BAPM standards**

Neonatal ODN	WTE vacancies against current establishment	WTE gap against establishment to achieve BAPM standards	WTE gap against staff in post to achieve BAPM standards
Northern	-14	-49	-63
East Midlands	-42	-42	-84
South West	-4	-92	-97
East of England	-56	-63	-118
Kent, Surrey & Sussex	-33	-98	-131
London - North West	-36	-133	-169
Yorkshire & Humber	-66	-104	-170
North West	-67	-126	-193
Thames Valley & Wessex	-48	-156	-204
West Midlands	-122	-118	-241
London - North Central & East	-93	-163	-256
London - South	-105	-164	-269

Note: Colour coding added by GIRFT for emphasis

Source: GIRFT Nursing Questionnaire December 2019

- <50 posts under establishment
- 50 to <100 posts under establishment
- 100 to <150 posts under establishment
- more than 150 posts under establishment

## Bank and agency staffing

Trusts work hard to ensure safety on each shift with extensive use of bank and agency staffing. Almost all units have formal escalation plans for when demand outstrips capacity, but neonatal nursing is very reliant on existing staff to fill the gaps in service with nearly 90,000 shifts covered in this way in 2018/19 with a further 11,907 shifts covered by external agency (Table 3)

The burden is particularly heavy for NICUs (Figure 7) where on average three shifts per 24-hour period are being worked by internal bank staff. This is a considerable burden to the existing staff, many of whom feel obligated to help their colleagues and ensure care for patients is not compromised.

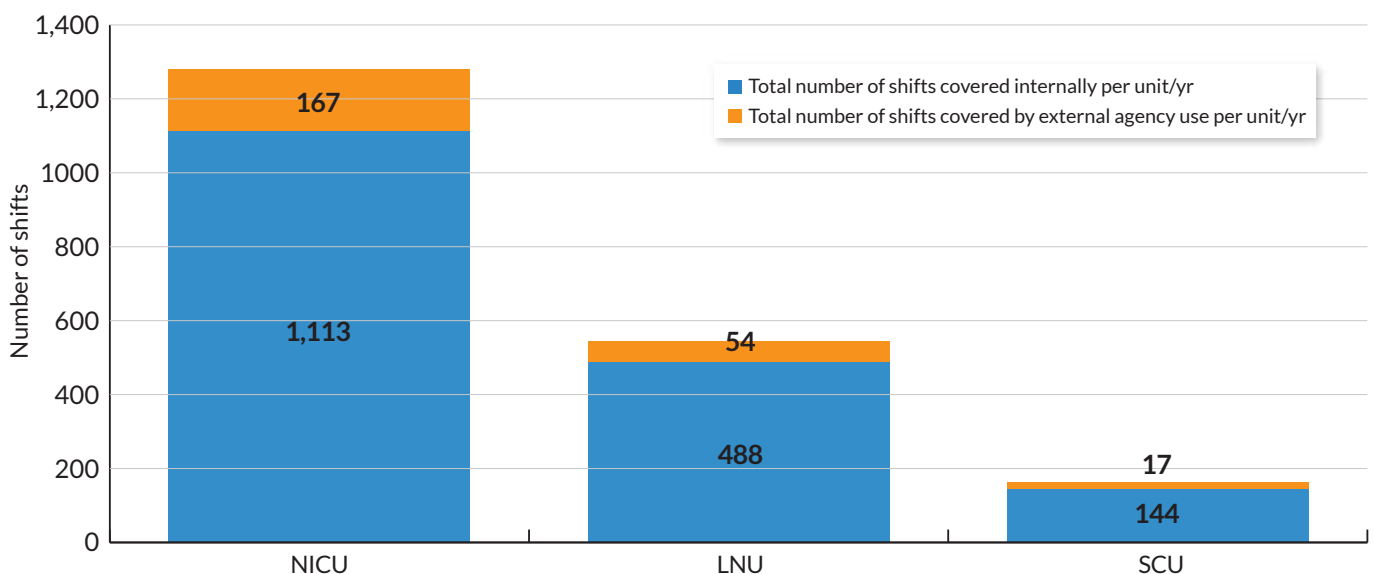
GIRFT's nursing questionnaires found that total expenditure on bank and agency staffing was nearly £26.8m in 2018/19, which is the equivalent of more than 784 Band 5 nurses (mid-point).

**Table 3: Bank and agency use, and expenditure (FY 2018-19)**

	NICU (n43)	LNU (n75)	SCU (n37)	All Units (n155)
Total shifts cover by internal bank (including NHSP) and additional hours	47,850	36,607	5,340	89,897
Total shifts covered by external agency	7,190	4,079	638	11,907
Total internal bank (Including NHSP) and additional hours expenditure	£12.7m	£7.6m	£2.0m	£22.2m
Total external agency shift expenditure	£2.8m	£1.4m	£0.4m	£4.6m

Source: GIRFT Nursing Questionnaire December 2019

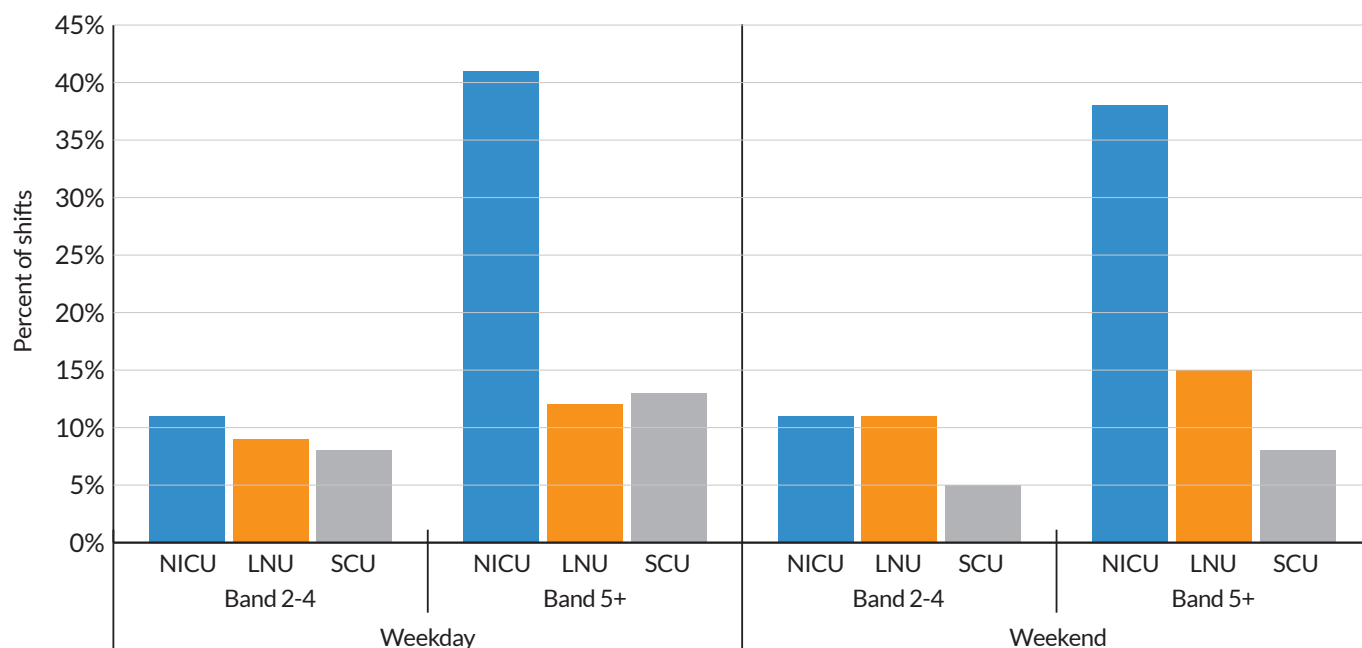
**Figure 7: Total number of shifts per unit designation per year, performed by existing staff or external agencies to cover gaps in rotas or excess workload (England, 2018/19)**



Source: GIRFT Nursing Questionnaire December 2019

Despite the heavy use of bank and agency staff, the residual day-to-day effect of low nursing numbers is seen in the GIRFT/RCPCH snapshot survey which showed that overall, 15% of neonatal units had staffing levels below rostered levels across the two days surveyed, with three times as many gaps in Band 5+ rotas in NICUs (40%), compared with LNUs (13%) and SCUs (10%) (see **Figure 8**).

**Figure 8: Percentage of shifts below rostered levels for Band 2 to 4 clinical staff and Band 5+ (including QIS) nurses in NICUs, LNUs, and SCUs on weekday and weekend shifts**



Source: GIRFT/RCPCH workforce snapshot survey, September 2019

## Quality-enhancing nurse roles

The data presented so far concentrates on nurse staffing needed for direct patient-facing care and does not take into account other important supportive roles as outlined in the Department of Health's Toolkit for High Quality Neonatal Services 2009.<sup>19</sup> GIRFT has collated data around these quality enhancing roles. It is clear that a number of services nationally have no dedicated provision at all for many of the recognised quality roles, including no dedicated time for bereavement in the majority of NICUs, to support the families of those infants who sadly die (**Table 4**). These findings are disappointing given that the need for these roles was recognised 12 years ago.

Many services may have allocated a role to a member of the team but there is no protected time to undertake the role and therefore no recognition of its value. This is likely due to the chronic staff shortages experienced by neonatal units nationally, leaving no capacity to improve the quality of the service offered. With further resource being made available in the NHS Long Term Plan, it is expected there will be a higher priority given to developing these roles, many of which contribute to supporting parent partnership in care and facilitating earlier discharge home. Resource allocated for this purpose is therefore likely to be both more cost-effective and of higher quality and should be strongly encouraged. This resource should be additional to staffing required for clinical activity. The National Neonatal Nursing Association (NNA) is encouraged to develop WTE standards for quality-enhancing roles to support this.

<sup>19</sup> Department of Health (2009) Toolkit for high quality neonatal services, available at <http://www.londonneonatalnetwork.org.uk/wp-content/uploads/2015/09/Toolkit-2009.pdf> (last accessed April 2021)



**Table 4: Percentage of services with protected time for quality-enhancing roles**

	NICU	LNU	SCU	All units
<b>Nurse education</b>	98%	87%	46%	80%
<b>Bereavement lead</b>	42%	25%	5%	25%
<b>Discharge coordinator</b>	58%	29%	5%	32%
<b>Breastfeeding support</b>	72%	43%	24%	46%
<b>Community outreach</b>	84%	56%	27%	57%
<b>Family support</b>	56%	40%	22%	40%
<b>Research nurse</b>	53%	3%	5%	17%

Source: GIRFT Nursing Questionnaire December 2019

## Recruitment and retention challenges

Substantial funding support from the NHS Long Term Plan will help to improve staffing levels in nursing establishments and if these posts are filled, staff experience will improve and burnout will reduce. However, recruiting and retaining staff will be very challenging in the current environment. The lack of opportunity for most pre-registration nurses to access a neonatal specific placement during their training limits exposure to the speciality and there is little exposure to neonatology for midwives in training. It is important for higher education institutions to recognise this and work to improve access for pre-registration nurses to the speciality of neonates.

With no clear career structure or remuneration for commitment to neonatal specialist training, neonatology may not seem an attractive option for the newly qualified nurse often from a generation with a changing focus on work-life balance.<sup>20</sup> There are also challenges in recruitment for more senior, non-clinical managerial roles where a lack of direction and clear improvement to work-life balance means staff remain committed to the reward of the clinical role.

### IN PRACTICE

## Exposure for pre-registration nurses to neonatology

### University of Hertfordshire

The University of Hertfordshire now ensures all paediatric nursing students get a neonatal placement at some point in their three years for a minimum of six weeks during pre-registration training. In addition, the university offers a new pre-registration neonatal module (Caring for the Neonate and Family), which is a 15 credit, level five, second year choice module which has been approved by the Nursing and Midwifery Council as part of the new curriculum.

Since it commenced over half the group each year have opted to take this module – at least 25 students each year at pre-registration level.

<sup>20</sup> Warren, Alison & Davies, Alison. (2015), *Mind the Gap: Exploring the needs of early career nurses and midwives in the workplace*  
[https://www.researchgate.net/publication/286443401\\_Mind\\_the\\_GapExploring\\_the\\_needs\\_of\\_early\\_career\\_nurses\\_and\\_midwives\\_in\\_the\\_workplace](https://www.researchgate.net/publication/286443401_Mind_the_GapExploring_the_needs_of_early_career_nurses_and_midwives_in_the_workplace)

## IN PRACTICE

### Local workforce strategy to increase neonatal nurses

Evelina London Children's Hospital

The Evelina London Children's Hospital has developed a workforce strategy to encourage newly qualified nurses into neonatal nursing. For two consecutive years they have recruited two cohorts of six newly qualified nurses to start together. This allows for the delivery of a bespoke in-house training package for new starters on how to deliver clinical care for babies in special care. The training is a mixture of study days and supernumerary shifts over a six-week period. This increases the nurses' knowledge and confidence before they join the clinical nursing team.

To date ten out of the 12 nurses remain within the neonatal team and all have followed some or all of the QIS training. The training has also been adapted for nurses who have previously worked in other specialities but not with neonates.

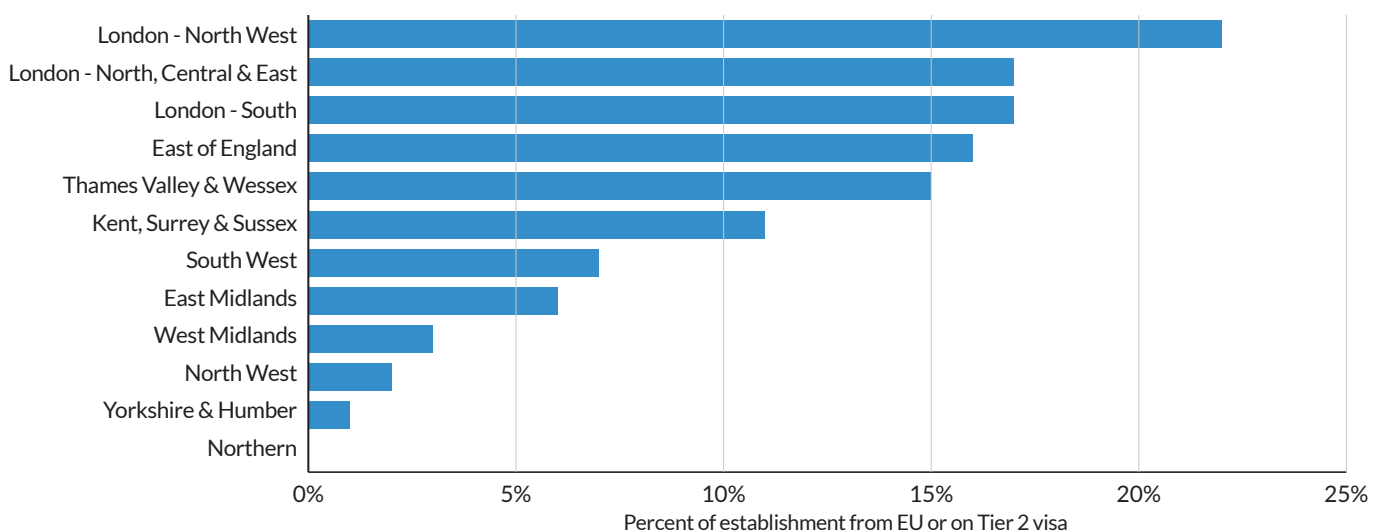
The team also engages with the paediatric nurse rotation, ring-fencing two posts purely for rotation nurses who spend eight months with the unit as part of a three-placement rotation. At the completion of their rotation these nurses often choose to work in neonatology.

## European Union (EU) and international nurses

The removal of the nursing bursary for nursing students in training in 2017 and charging of university fees for nursing courses, as well as restrictions on nurse education funding between 2010 and 2019 have made domestic recruitment more challenging meaning many NHS trusts have actively forged international relationships to support recruitment.<sup>21</sup>

EU and international nurses working within the neonatal setting make up approximately 9% of the total nursing workforce in England but there is marked regional variation with much higher levels in southern networks, particularly in London, East of England and Thames Valley and Wessex (Figure 9). Unfortunately, some of these areas also have the highest gaps in workforce and are therefore at highest risk of further losses and reduced recruitment from this pool, due to additional barriers put in place since Brexit.<sup>22</sup> Nursing shortages are recognised in the NHS Long Term Plan and there is significant funding commitment to support increases in the neonatal workforce.

Figure 9: Percentage of establishment from EU or working on Tier 2 international visas



Source: GIRFT Nursing Questionnaire December 2019

<sup>21</sup> The Health Foundation (2019), A Critical Moment: NHS Staffing Trends, Retention and Attrition <https://www.health.org.uk/publications/reports/a-critical-moment>

<sup>22</sup> RCN (2020) Brexit: Royal College of Nursing priorities update, <https://www.rcn.org.uk/professional-development/publications/pub-009168>  
<https://www.rcn.org.uk/professional-development/publications/pub-009168>

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Retention is, arguably, an even greater challenge. The current neonatal workforce is ageing, with 25% of the nursing workforce now aged over 50 years and likely to retire in the next ten years.<sup>23, 24</sup> Chronically under-staffed services place significant pressures on their workforce and reduce opportunities for education, training and development which makes attrition of staff more likely.

## **Nurse staffing: summary of findings**

The data demonstrates ongoing chronic neonatal nursing staff shortages with less than a quarter of units having staffing establishments which conform to BAPM standards and only 15% of units actually meeting these standards. The pressures are most acute in NICUs but also affect the majority of LNUUs and some SCUs. There are significant differences in the degree of staff shortages across different networks with greater shortages in more urban areas. Some of these areas (particularly London and Thames Valley & Wessex) also have high numbers of international nurses whose recruitment and retention are less certain post Brexit. There is high use of bank and agency staffing to fill gaps but these are predominantly filled by existing staff placing additional strain on an already stretched workforce. In addition, lower numbers of staff are qualified in speciality than is recommended and quality-enhancing roles are frequently not given protected time or recognition.

If nurse staffing levels in neonatal care are to improve, there needs to be long term sustainable change in the approach to recruiting and retaining staff. Local and regional action plans are currently being formulated and must include sustained education offers, recognition of specialist training within banding and a career pathway to support longevity alongside a focus on improving work-life balance and wellbeing. Nurturing staff is the only way to improve staffing levels and in turn improve quality and safety.

<sup>23</sup> Lynne Paterson, Claire O'Mara, Linda Hunn (2020), Neonatal nursing workforce survey – What does the landscape look like in England?, *Journal of Neonatal Nursing*, <https://doi.org/10.1016/j.jnn.2019.11.005>

<sup>24</sup> King's College London on behalf of NHS Improvement (2019) *Retention of Older Nurses: A Focus Group Study in UK Hospitals*

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## Multidisciplinary team staffing

### Overview

#### GIRFT key findings:

- There is a significant shortfall in allied health professional (AHP) service provision with less than half of neonatal services having regular dietetics, physiotherapy, speech and language therapy and occupational therapy services.
- **63% of units have no psychology services** (41% in NICUs).
- NICUs are more likely to have regular AHP service provision than LNUs/SCUs.
- Adherence to AHP staffing standards in those units that had a service was very low, being highest for dietetics (54%).
- AHP input across networks has improved over the last 18 months.
- Neonatal AHPs are very experienced but are frequently working in isolation and peer support, clinical supervision, cross-cover, and succession planning can be difficult.

Neonatal care relies on the support of a range of allied health professionals (AHPs) and other specialist services. In this report, we have focused on physiotherapy, speech and language therapy, dietetics, occupational therapy, as well as psychology and pharmacy as these groups are routinely involved in delivering neonatal care. We also note the important role of radiographers in providing service support to neonatology who are not included in this staffing review.

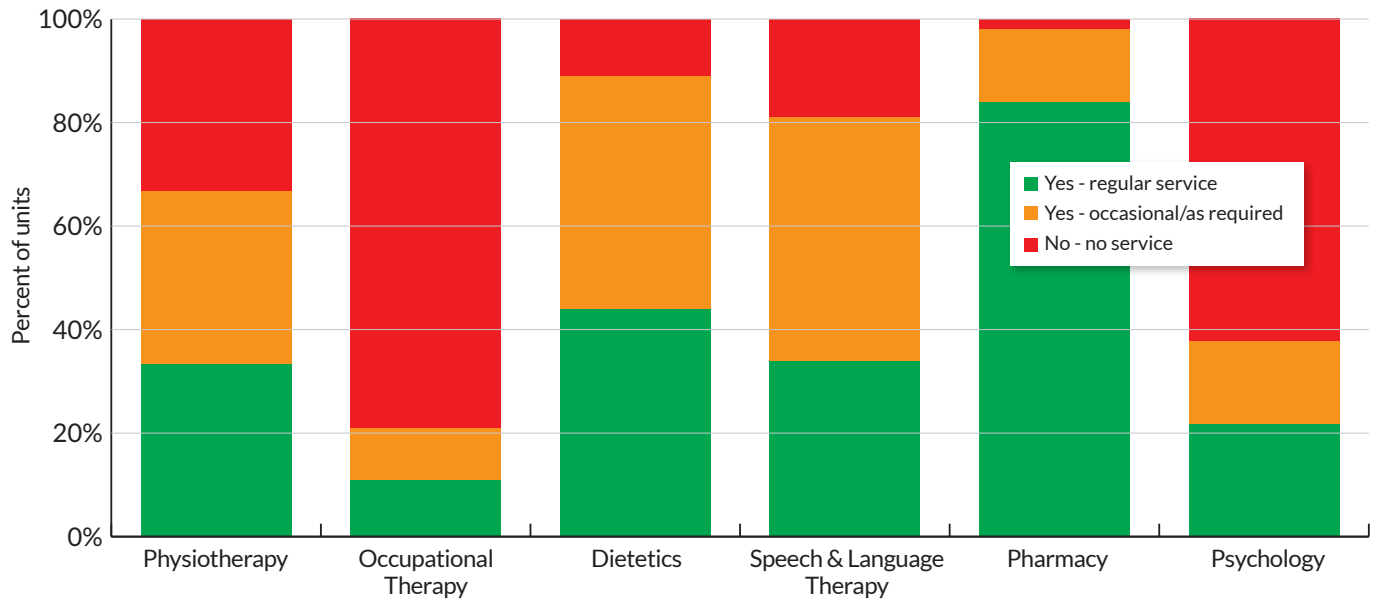
#### Service provision

In our AHP survey, we asked units about the level of provision across AHP services, pharmacy and psychology. The data shows there is a significant shortfall in regular service provision across all specialities except pharmacy (84%). Regular service provision to neonatal units was 44% for dietetics, 33% for speech and language therapy (SLT) and physiotherapy, 22% for psychology and 11% for occupational therapy (**Figure 10**). NICUs were more likely to have regular service provision than LNUs and SCUs (**Figure 11**).

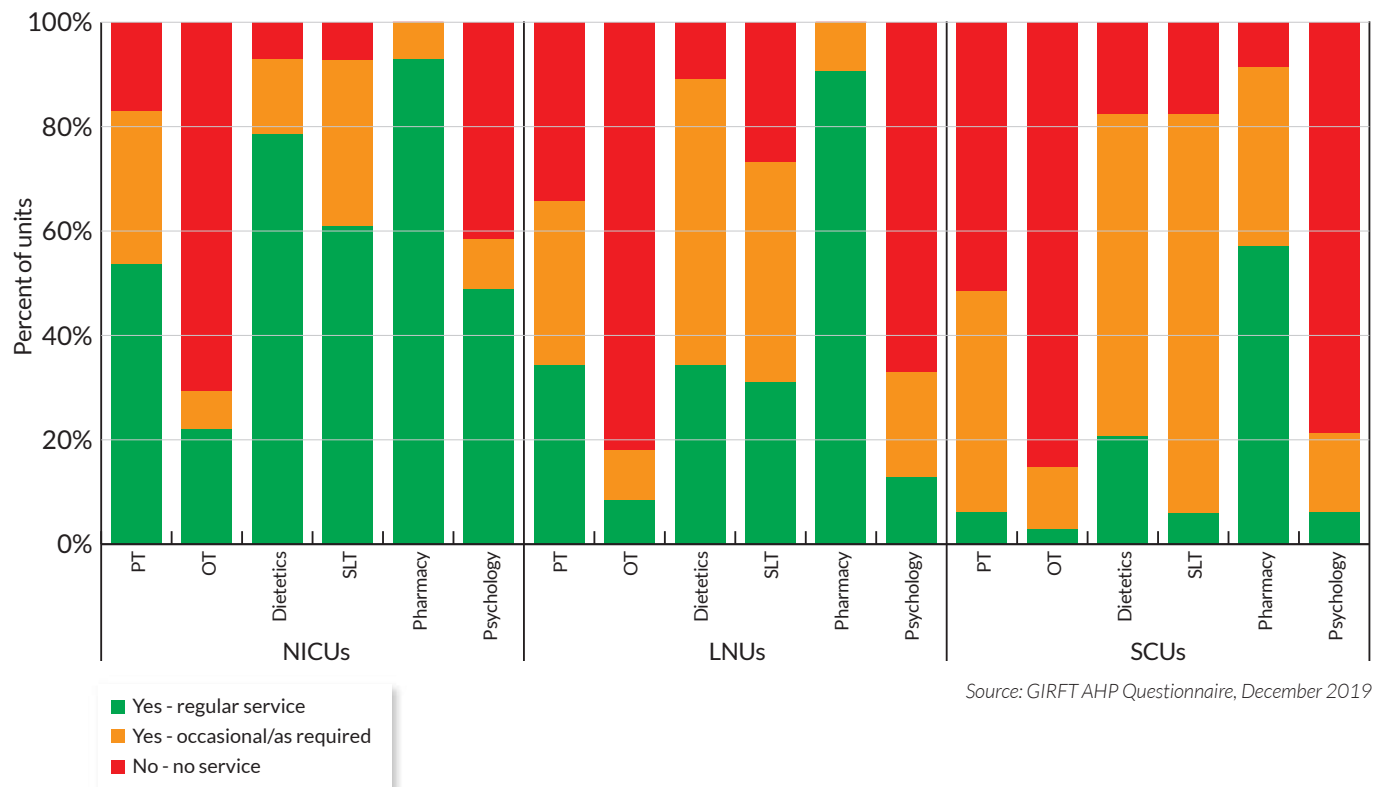
Many services have occasional provision, which limits the ability to embed practices and train staff. There was no service in most units for psychology and occupational therapy. Between 10% and 30% of units reported no other AHP services, which was almost entirely due to lack of budget, with very few vacant posts. Where there was no service, 30-40% neonatal services indicated in the GIRFT AHP questionnaire that some AHP services were not a priority (occupational therapy (OT), dietetics, SLT and psychology).

The deep-dive visits have shown that there has been progress for some units in understanding the value of these roles, with more units now trying to secure funding but some services still see this as a low priority. The current picture nationally shows inequity of access to these services with variability of provision for families. There is an urgent need to address this and relevant existing funding streams, such as the £2.3 billion investment announced as part of the NHS Mental Health Implementation Plan 2019/20-2023/24, which must include support that recognises the needs of parents with babies in neonatal units. There is a need for Local Maternity and Neonatal Systems (LMNSs) and Integrated Care Systems (ICSs) to work with units across their patch to look at innovative ways to develop and fund a sustainable resilient AHP service, equally available to all families.

**Figure 10: AHPs, pharmacy and psychology service provision for all neonatal units in England**



**Figure 11: AHPs, pharmacy and psychology service provision in a) NICUs, b) LNUs, c) SCUs in England**

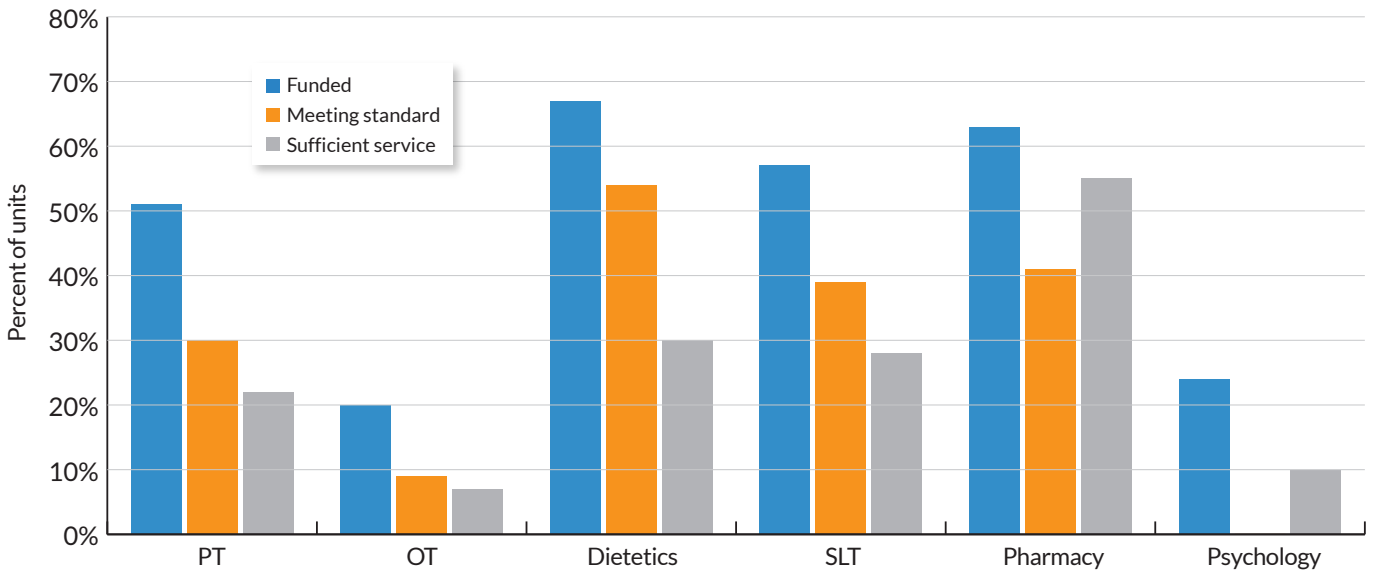


### Adherence to national standards

GIRFT assessed the suitability of AHP, pharmacy and psychology services by reviewing the funded services provided against the national staffing standards set by the relevant professional bodies. We also asked questions about sources of funding and opinions from service providers about whether the service provision was sufficient. It is important to note that the following information only applies to those neonatal units that have a relevant service.

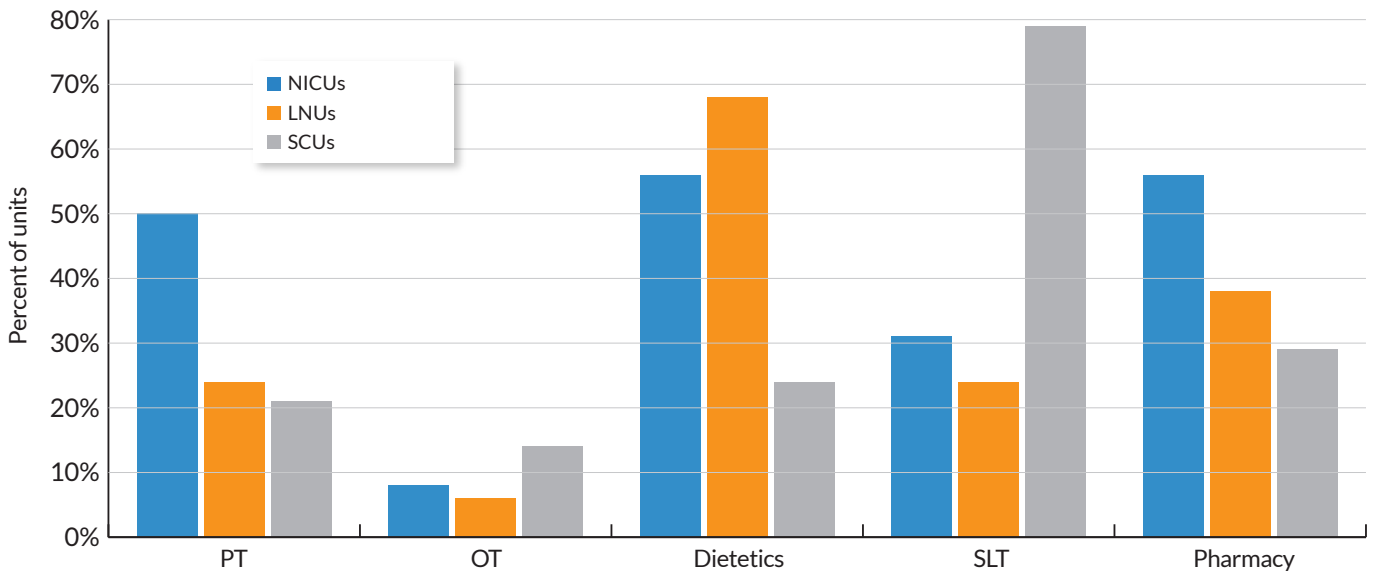
The overall adherence to national standards was low (neonatology specific psychology standards were not available) and was most likely to be met in dietetics (shown in **Figure 12** and **Figure 13**). Additionally, there is a gap between the proportion of units funded and those able to meet staffing standards, suggesting funding is not adequate to meet standards in many units. Identified funding was very low for psychology and occupational therapy, with nearly all neonatal units stating that the service was insufficient.

**Figure 12: Identified funding, adherence to national standards and clinical service opinion regarding service sufficiency for AHP services in English neonatal units**



Source: GIRFT AHP Clinical Services Questionnaire December 2019

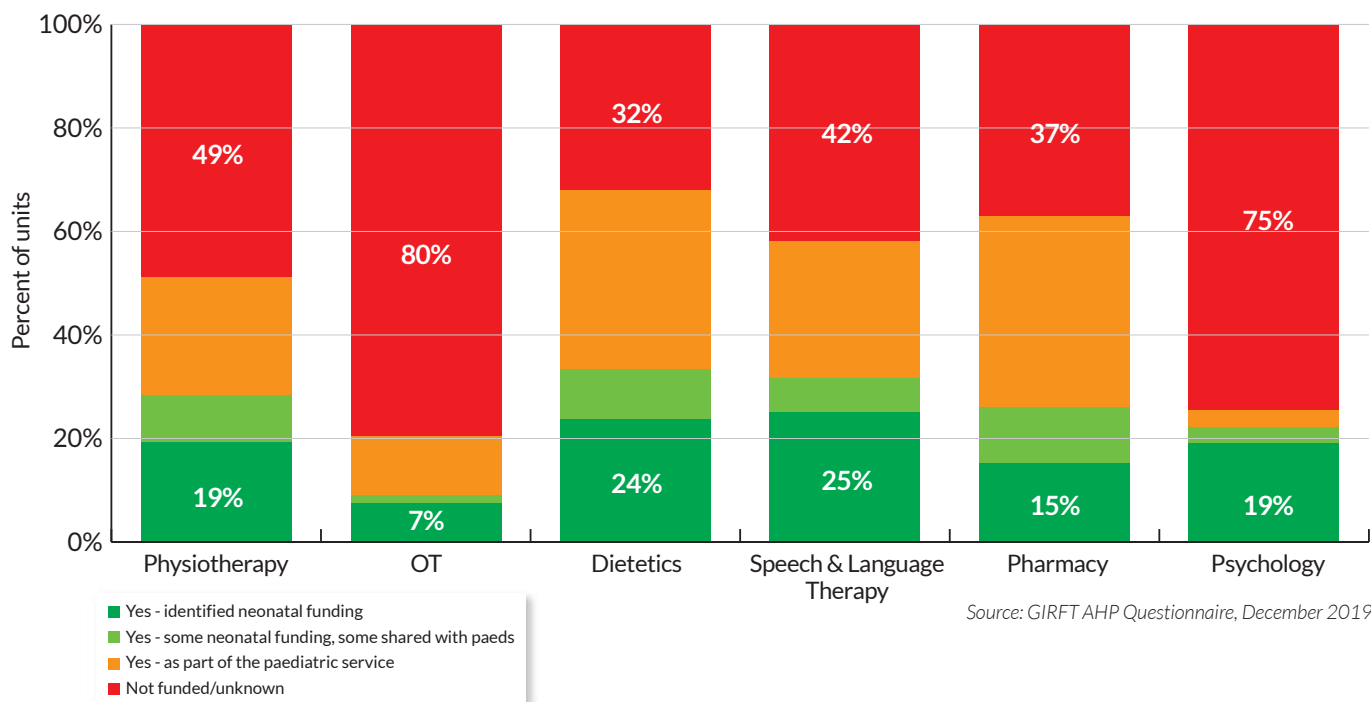
**Figure 13: Percentage of funded AHP services conforming to national standards in NICUs, LNUs and SCUs**



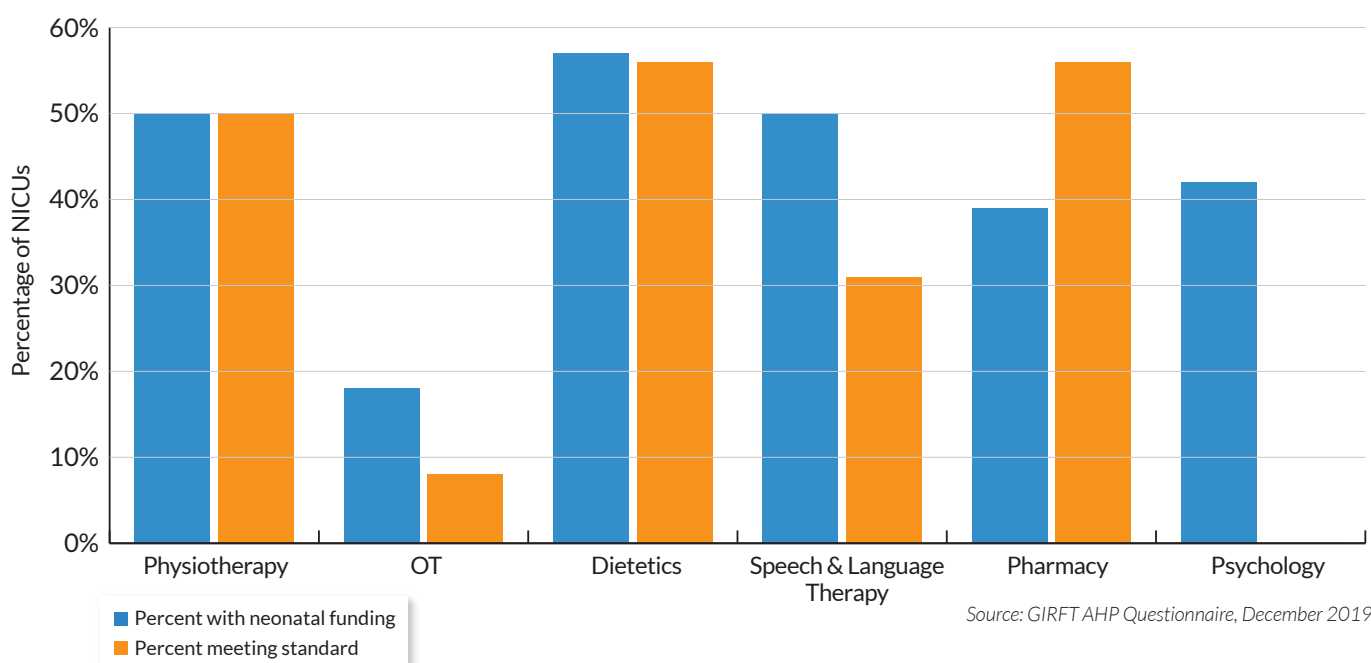
Source: GIRFT AHP Questionnaire, December 2019

Most funding was part of paediatric services with a small proportion having shared neonatal and paediatric budgets or entirely separate neonatal budgets (Figure 14). Where NICUs had identified neonatal funding, they were more likely to meet the staffing standards (see Figure 15). Our deep-dive visits found that often when funding was from paediatrics for the neonatal provision, the priority for service cover was given to the paediatric caseload. Ideally, funding should be allocated separately to the paediatric budget to ensure protected neonatal provision.

**Figure 14: Funding sources for AHPs, pharmacy and psychology services in neonatal units**



**Figure 15: Proportion of NICUs with identified neonatal funding and proportion meeting national staffing standards for AHPs, pharmacy and psychology**



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## Network findings

At the time of the survey in December 2019, only one network had funded network roles for a dietitian, speech and language therapist and respiratory physiotherapist, with no network supporting occupational therapy, neurodevelopmental physiotherapy, pharmacy or psychology posts. Another network has an unfunded dietitian network lead role with bank hours for specific project work. There were only three AHP network groups functioning across the ten networks and no psychology or pharmacy groups. On our deep-dive visits we found a notable increase in the number of groups that have been established with groups currently focussing on peer support and reviewing local service provision.

NCCR implementation plans (Dec 2020) recommended that trusts and ODNs develop an AHP, pharmacy and psychology strategy as part of workforce planning.<sup>25</sup> In addition, £1.6million of funding was specifically allocated in the NHS Long Term Plan to support the role of AHPs in neonatology. GIRFT has assisted the Neonatal Implementation Board in developing a funding mechanism for the allocation of funding to establish AHP network roles. These resources are being rolled out at a network level in FY2021/22.

## Competency and experience

GIRFT data showed that the most senior AHPs in units nationally had a high level of competency when benchmarked against each of their professional requirements for practice in neonates. Where a small proportion of AHPs were not demonstrating a specialist level of neonatal competency this is likely to be due to the competencies being relatively new, limited access to clinical and peer supervision and those who are the most experienced at working in neonates may not have had the opportunity to complete them. There was a similar picture for pharmacy and psychology and their professional requirements.

There is a high level of experience amongst the most senior AHPs working in NICUs, with at least two thirds of the SLTs, physiotherapists and dietitians, and around half the pharmacists, psychologists and occupational therapists having had more than five years' experience.

## Recruitment and retention challenges

The deep-dive visits found that AHPs are often working in isolation without the support of senior colleagues or a wider AHP team. Working in neonates is a specialist, high-risk area where there is limited peer support or clinical supervision within trusts and fragmented support across networks, mostly through unfunded support from NICU AHPs and pharmacists. There is often limited or no cross-cover provided for leave due to solo working. Being a specialist area, it is unsuitable to be covered by the general paediatric or adult teams. This impacts recruitment and succession planning as there is limited access to rotation and/or developing specialist posts for training and developing the workforce, which must be addressed.

Around a third of units had not attempted AHP recruitment in the past three years to each of the specialities. Of those that had attempted recruitment, around 40% reported difficulties for pharmacy, physiotherapy, SLT and psychology, with higher recruitment difficulties (73%) for dietetics, and lower for occupational therapists (27%). The main reasons given for failure to recruit AHPs and pharmacists was insufficient experience and no applicants. Lack of funding was the top reason given for recruitment into psychology posts. The banding level of posts was not reported as a difficulty in the recruitment process for any of the specialities.

## AHPs, pharmacy and psychology staffing: summary of findings

Our findings show that there must be urgent progress to ensure appropriate AHP, pharmacy and psychology support to neonatal services. There are large gaps in service across all parts of the country, with less than half neonatal services having regular dietetics, physiotherapy and speech and language input and less than a quarter with regular psychology and occupational therapy input. There is no service in the majority of units for psychology and occupational therapy and no provision in 10-30% for other AHP services, primarily due to lack of funding. Where services are available, the overall adherence to staffing standards ranged from 9% for occupational therapy to 54% for dietetics, with funding again being the main reason for an inability to comply with standards. NICUs with separate identified neonatal funding were more likely to achieve staffing standards.

Staff working in these posts are generally highly trained and experienced; however, they are frequently working in isolation, with difficulty in accessing peer support, clinical supervision, cross-cover and succession planning. There has been progress in the last 12 months with many local units now prioritising AHP, pharmacy and psychology input, using GIRFT benchmarking data to support their case. In addition, there has been an increase in network AHP and psychology groups, and NHS Long



Term Plan funding will commence in FY2021/22 providing funding for network AHP and psychology posts. Changes to education, career pathway and development of the AHP network model will all be needed to support the evolution of the multidisciplinary workforce team.

## Physiotherapy

### GIRFT key findings:

- 33% of units have a regular neurodevelopmental service.
- 39% of NICUs do not have a respiratory service.
- Half of NICUs and less than a quarter of LNUs and SCUs meet national staffing recommendations for physiotherapy services.
- More than 75% of units feel there is an insufficient physiotherapy service.
- 35% of units had no identified physiotherapy funding.

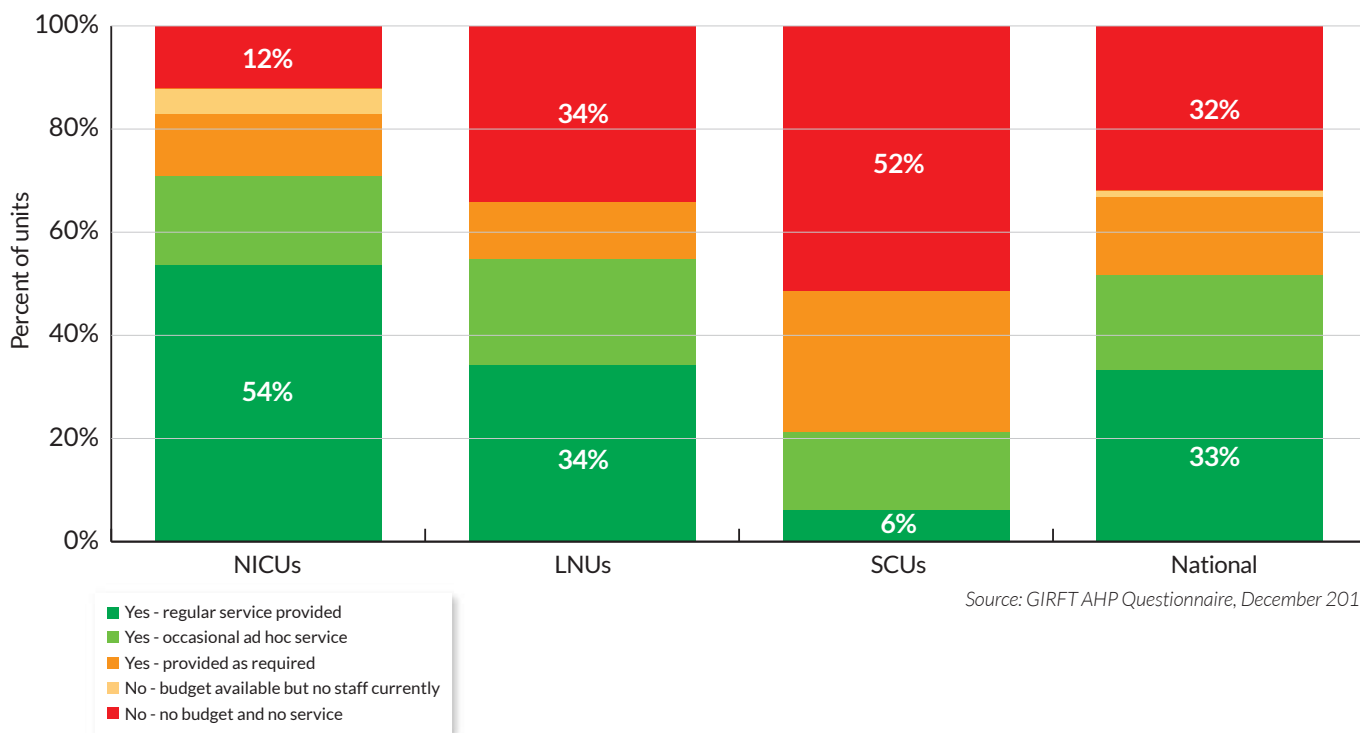
Physiotherapists (PT) provide highly-specialised observation, assessment, intervention in movement, gross motor and postural control in the rapidly changing physiology and behavioural stability of neonates. Early identification of motor problems ensures that neonates can receive diagnostic-specific intervention, which shapes the musculoskeletal system and motor organisation to optimise brain development. Neurodevelopmental physiotherapists support families and educate parents to optimise their baby’s brain development during their neonatal stay as well as supporting parent infant relationships.

Respiratory physiotherapy plays a small but important role in the neonatal population where physiotherapists assess the need for intervention and balance that against the physiological cost, energy expenditure and developmental needs of the infant. It is however important to optimise respiratory function to enable growth and development.

### Current service provision

Half of NICUs, a third of LNUs and just 6% SCUs have a regular neurodevelopmental physiotherapy service (**Figure 16**). Whilst respiratory and musculoskeletal physiotherapy services may not be needed as regularly, it is concerning that there is no respiratory service in 29% of NICUs and no musculoskeletal service in 15% of NICUs and nearly half of LNUs and SCUs.

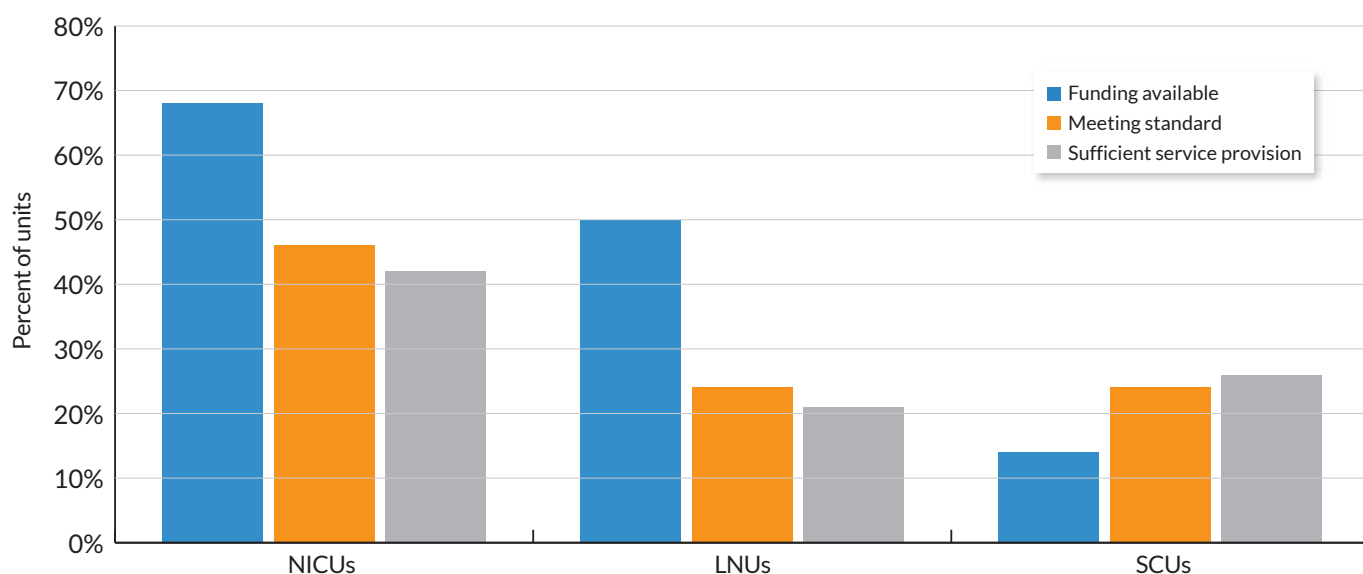
**Figure 16: Service provision for neurodevelopmental physiotherapy in NICUs, LNUs and SCUs**



## Adherence to national standards

Service standards and training for neonatal physiotherapy services are set by the Association of Paediatric Chartered Physiotherapists (APCP).<sup>26</sup> 50% of NICUs, 24% of LNUs and 21% of SCUs are meeting national staffing recommendations, and more than three quarters of units feel the physiotherapy service is insufficient (**Figure 17**). The majority of physiotherapists are experienced with five or more years of relevant neonatal experience (60% in NICUs, 50% in LNUs and SCUs) and three quarters of physiotherapists have all or some of their continuing professional development aligned to the national APCP Neonatal Competency Framework.<sup>27</sup> Importantly, a quarter of physiotherapists working on neonatal units had no specific neonatal training. In 2020, APCP developed and published guidance which will further support training and development of specialists working in neonates.<sup>28</sup>

**Figure 17: Identified funding, adherence to national standards and clinical service opinion regarding service sufficiency for physiotherapy services in English neonatal units**



Source: GIRFT AHP Clinical Services Questionnaire December 2019

## Funding sources

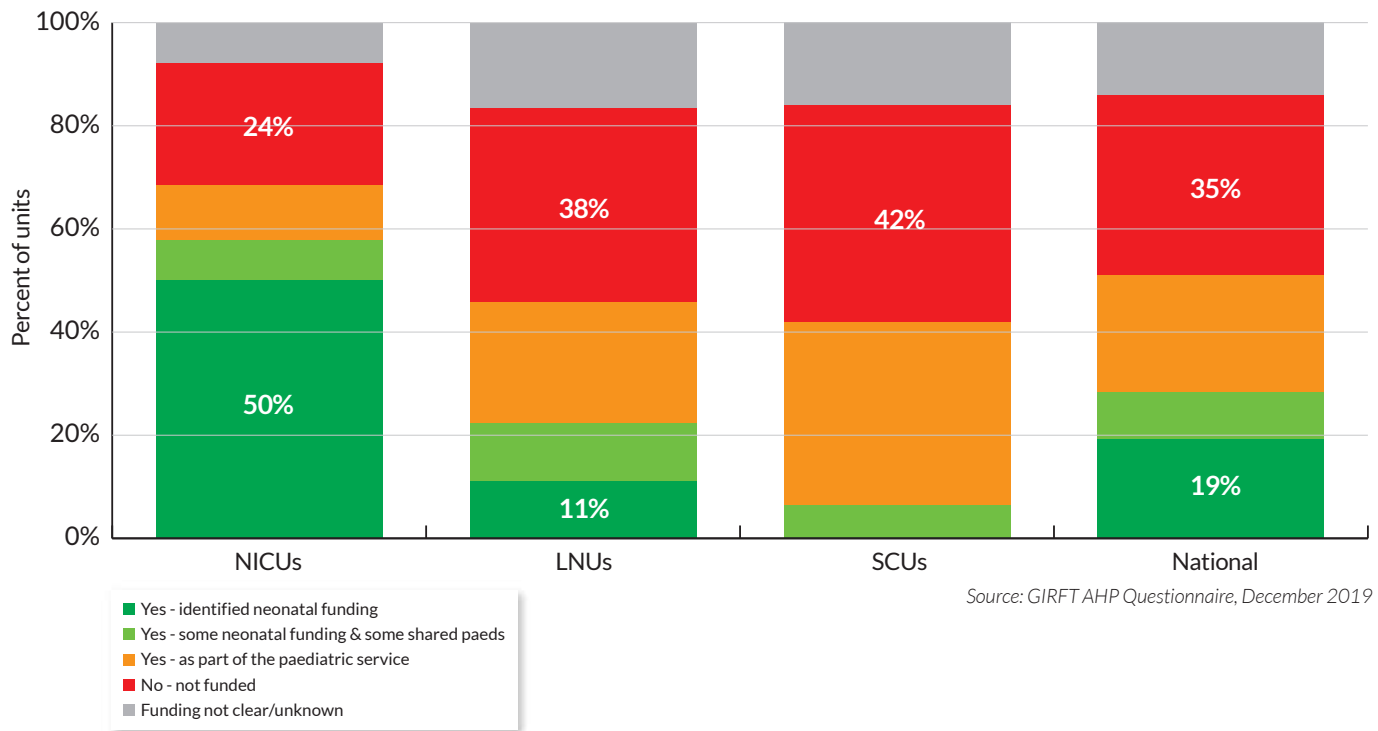
There is a significant short fall in funding of physiotherapy services in neonatal units with only 20% having identified funding (**Figure 18**). Funding was much more likely in NICUs (68%) and half of NICUs had specific neonatal funding. Less than half of LNUs & SCUs had any funding. Of those with no budget or service, 16% were trying to secure funding, a further 5% had been unsuccessful at securing funding and 12% did not feel physiotherapy was a priority.

<sup>26</sup> The Association of Paediatric Chartered Physiotherapists (2018) *Physiotherapy Staffing Recommendations for Neonatal Units in England* <https://apcp.csp.org.uk/content/neonatal-staffing-recommendations>

<sup>27</sup> The Association of Paediatric Chartered Physiotherapists (2014) *APCP Neonatal Competence Frameworks and Evidence Based Practice Guidance*.

<sup>28</sup> The Association of Paediatric Chartered Physiotherapists (2020) *Guidance for Good Practice for Physiotherapists Working in Neonatal Care*.

**Figure 18: Funding sources for physiotherapy services in neonatal units**



### Impact on services

The lack of regular neurodevelopmental physiotherapy input to all units is disappointing, given the recognised need for early assessment and intervention in the neonatal population to optimise longer term outcomes. GIRFT data demonstrates the shortfall in neurodevelopmental physiotherapy staffing is affecting the quality of service provided. For example:

- Only 40% of NICUs, 23% of LNUs and 9% of SCUs had inpatient neuro-behavioural assessments from physiotherapists.
- Inpatient neurological assessments were undertaken in 74% of NICUs, 52% of LNUs and 26% of SCUs.
- Only 56% of NICUs had a physiotherapist service for high-risk infant follow-up clinics. NICE guidance on developmental follow-up of children and young people born prematurely recommends that for surveillance up to two years (corrected) at least one OT, physiotherapist or SLT should be part of the multidisciplinary team (MDT) delivering enhanced care.<sup>29</sup>

### Occupational Therapy

#### GIRFT key findings:

- 80% of units have no OT service
- 22% of NICUs have a regular OT service
- OT service standards are met in just 8% of NICUs, 6% of LNUs and 14% of SCUs.
- 75% of units had no funding for OT services.

Occupational therapists (OTs) have a lead role in working with the multidisciplinary team to promote a neuro-protective developmental care environment, as well as individualised grading of environmental input to provide supportive care and recommendations for caregivers during neonatal care.

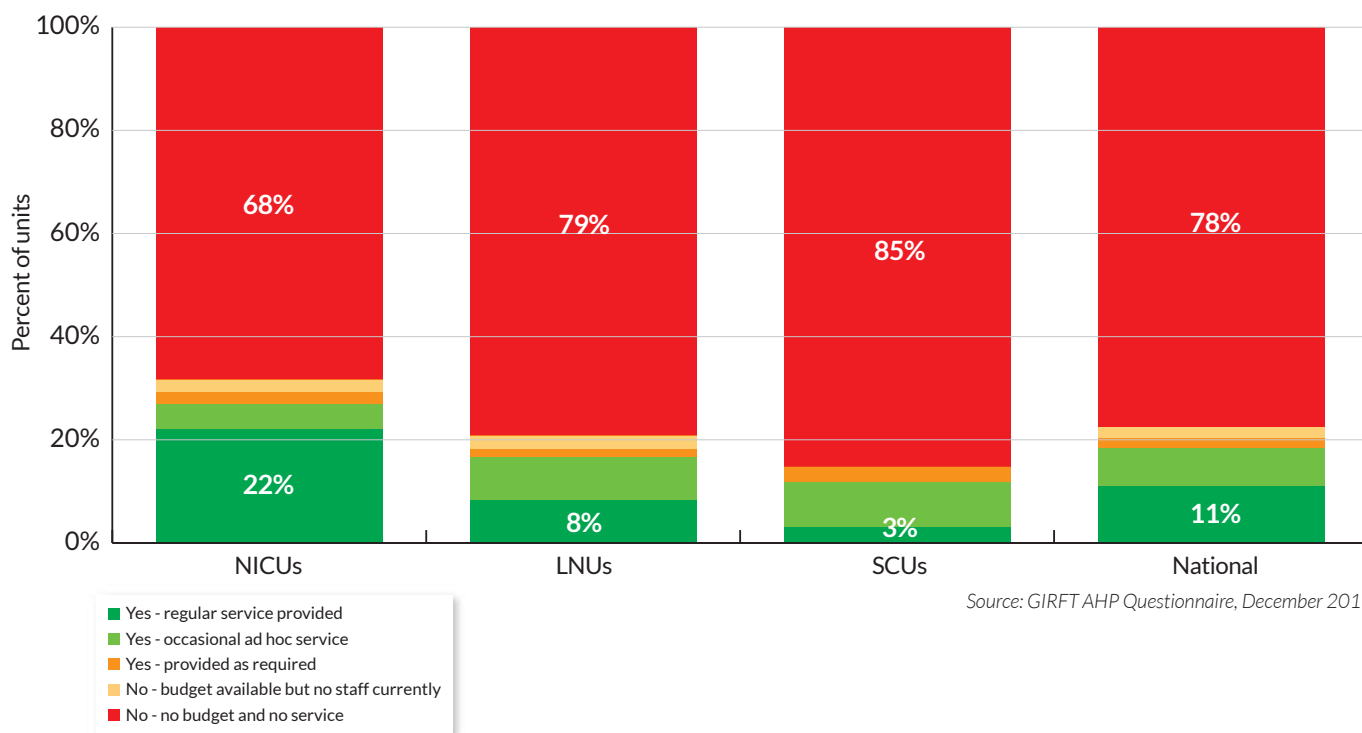
<sup>29</sup> NICE (2017) NG72, *Developmental follow-up of children and young people born preterm*

Preterm infants are at increased risk of developing emotional and behavioural problems later in life.<sup>30,31</sup> OTs, trained in both physical and mental health, support and educate parents on promoting developmentally appropriate sensory experiences for their baby and development of successful psychological and practical coping strategies for families. OTs also provide therapeutic interventions such as positioning for optimal neurobehavioural regulation enabling protected sleep, and optimal positioning and supportive regulation for positive feeding experiences. OTs also focus on enabling parents to feel confident and competent in reading their infant's neurobehavioural cues and equip them with sensitive and contingent strategies to support their neonate's development and regulation post discharge home.

### Current service provision

OT service provision is the lowest compared with other AHP specialties, with 80% of units having no service (**Figure 19**). Only 11% of units have a regular service provision which is highest in NICUs (22%).

**Figure 19: Service provision for occupational therapy in NICUs, LNUs and SCUs**



### Adherence to national standards

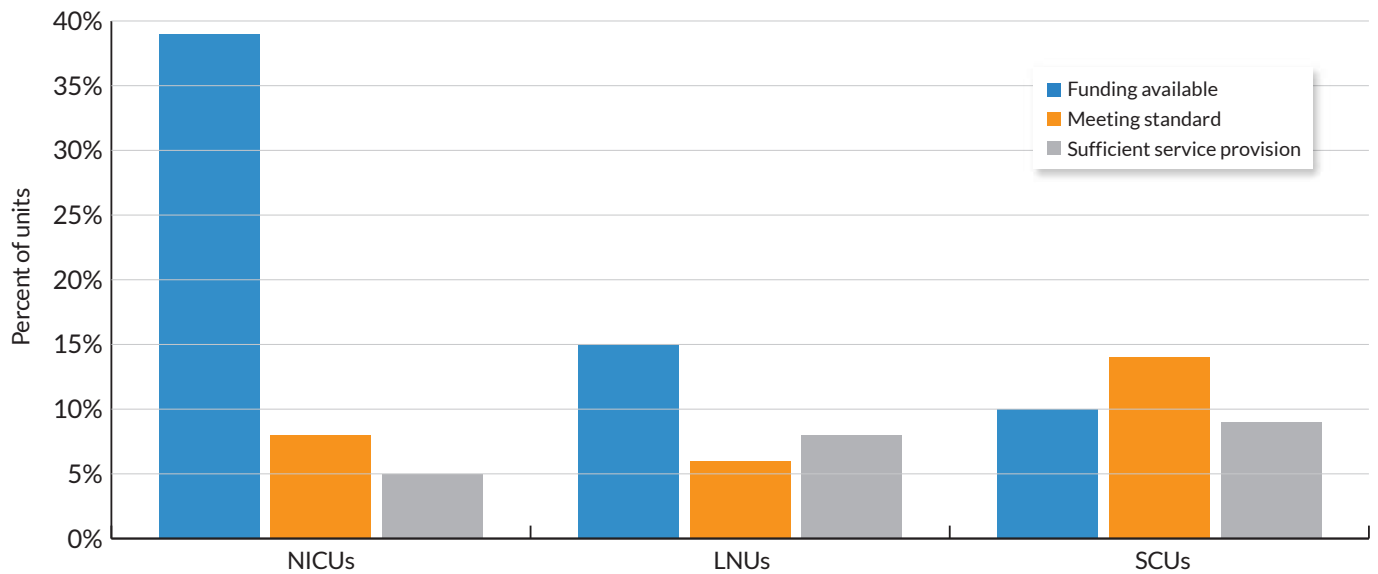
Service standards and training for neonatal occupational therapy services are set by the Royal College of Occupational Therapists (RCOT).<sup>32</sup> Adherence to staffing standards is low (**Figure 20**). Just under half of the most senior OTs working across neonatal units nationally have more than five years' experience of working on a NICU. Overall, a third had no specific neonatal training, particularly in SCUs (83%).

<sup>30</sup> Mathewson K.J., Chow CHT, Dobson KG, Pope EI, Schmidt LA, Van Leshout RJ (2017) Mental health of extremely low birth weight survivors: a systematic review and meta-analysis. *Psychological Bulletin*, <http://dx.doi.org/10.1037/bul0000091>

<sup>31</sup> Bröring T, Oostrom KJ, Lafeber HN, Jansma EP, Oosterlaan J. (2017) Sensory modulation in preterm children: Theoretical perspective and systematic review. *PLoS One*.

<sup>32</sup> Royal College of Occupational Therapists (2018), *Occupational Therapy Staffing on Neonatal Units* <https://www.rcot.co.uk/practice-resources/rcot-publications/downloads/neonatal-services>

**Figure 20: Identified funding, adherence to national standards and clinical service opinion regarding service sufficiency for occupational therapy services in English neonatal units**

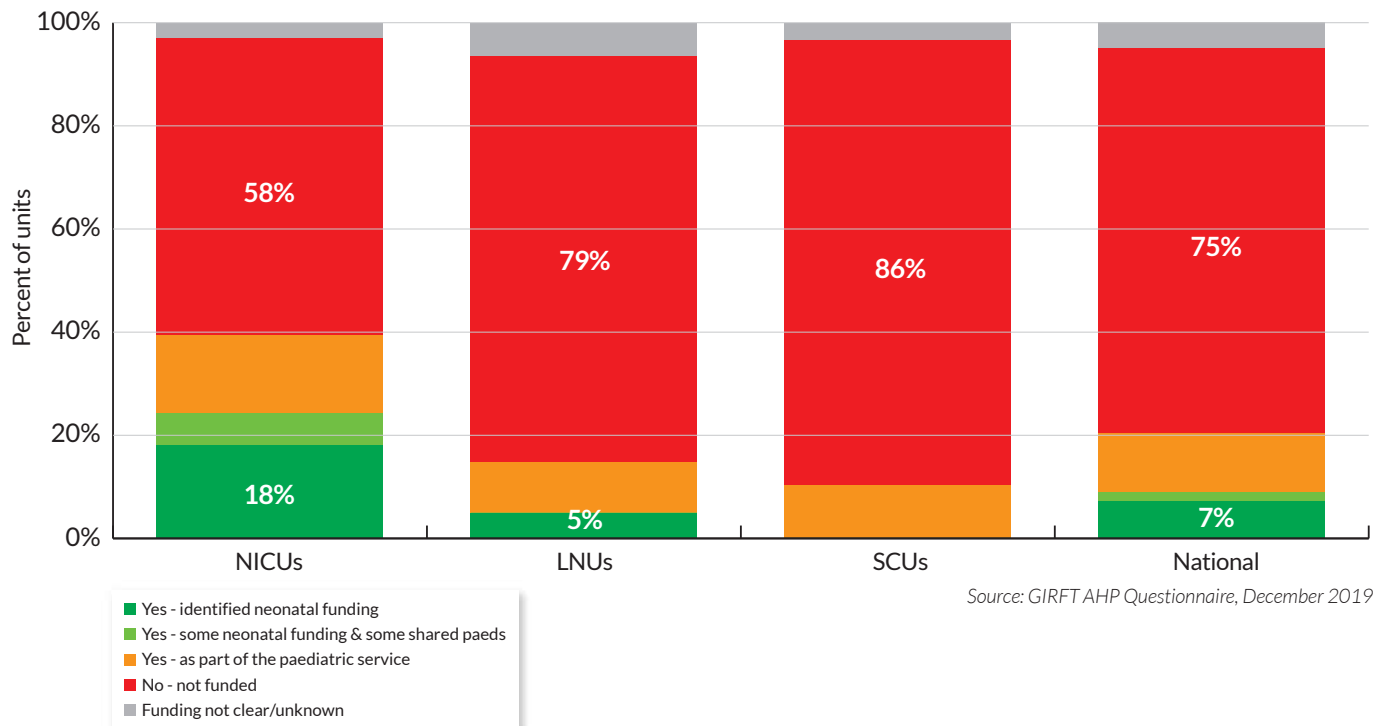


Source: GIRFT AHP Clinical Services Questionnaire December 2019

### Funding sources

Three quarters of units had no identified funding, and in 40% it was not considered a priority (**Figure 21**). Only ten units nationally were in the process of trying to secure funding and eight units had tried to secure funding but had been unsuccessful. Feedback from our deep-dive visits demonstrates that occupational therapy is the least understood role in the multidisciplinary team due to lack of experience of working with occupational therapy.

**Figure 21: Funding sources for occupational therapy services in neonatal units**



Source: GIRFT AHP Questionnaire, December 2019

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## Impact on services

GIRFT data demonstrates that the significant lack of service funding impacts many aspects of OT service provision. For example:

- Only 19% of NICUs stated they had access to neurobehavioural assessments carried out by OTs. These assessments and interventions promote early parent/infant engagement in responsive and meaningful interaction.
- Only 26% of NICUs had support from OT for parents and staff training in developmental care.
- Only 21% NICUs have OT input to their high-risk infant follow-up clinics. NICE guidance on developmental follow-up of children and young people born prematurely recommends that for surveillance of up to two years (corrected) at least one OT, PT or SLT should be part of the MDT delivering enhanced care.<sup>33</sup>

## Dietetics

### GIRFT key findings:

- 79% of NICUs had a regular dietetic service.
- 34% of LNUs and 21% SCUs had a regular dietetic service.
- 56% of NICUs, 68% of LNUs and 24% of SCUs met the staffing standards for dietitians.
- Fewer than 25% of NICUs and LNUs felt they had a sufficient dietetic service.
- 23% of units had no identified funding for dietetics.
- 47% of NICUs and 12% of LNUs had dietetic input for all patients on parenteral nutrition.

Dietitians have a specialist role in the complex nutritional care needs of neonates and specialist knowledge of the potential barriers for managing nutritional interventions. The need for optimum nutritional support is paramount as evidence points to short- and long-term adverse consequences of poor nutrient intake and growth in this population.<sup>34, 35, 36, 37</sup>

Dietitians have specialist knowledge of the complex nutritional problems arising from medical issues due to prematurity such as gastro-oesophageal reflux disease, necrotising enterocolitis, chronic liver disease and congenital heart disease. They are specialists in designing nutrition practice protocols and monitoring tools. They enhance clinical effectiveness in nutrition, which reduces complications such as NEC and postnatal growth restriction.

Dietitians assess and understand the indication for use of, and apply current clinical practices for, parental and enteral feeding strategies to meet the complex needs of neonates. They have extensive knowledge of the use of breast milk in preterm infants and support establishing and maintenance of lactation and the transition to breastfeeding. They understand the composition and use of breast milk fortifier (BMF), specialist preterm and term formula to supplement nutrition as needed.

Dietitians play a key role in supporting MDTs to make clinically effective feeding decisions, taking into account gastrointestinal disorder/surgical intervention. They are integral to embedding UNICEF Baby Friendly Initiative (BFI) neonatal standards, FICare and the Bliss Baby Charter.

## Current service provision

Dietetic service provision nationally was the highest amongst the AHP specialities. 79% of NICUs have regular service provision but this was much lower in LNUs and SCUs who were more likely to have occasional/ad hoc services (**Figure 22**).

<sup>33</sup> NICE (2017) guideline NG72, *Developmental follow-up of children and young people born preterm*

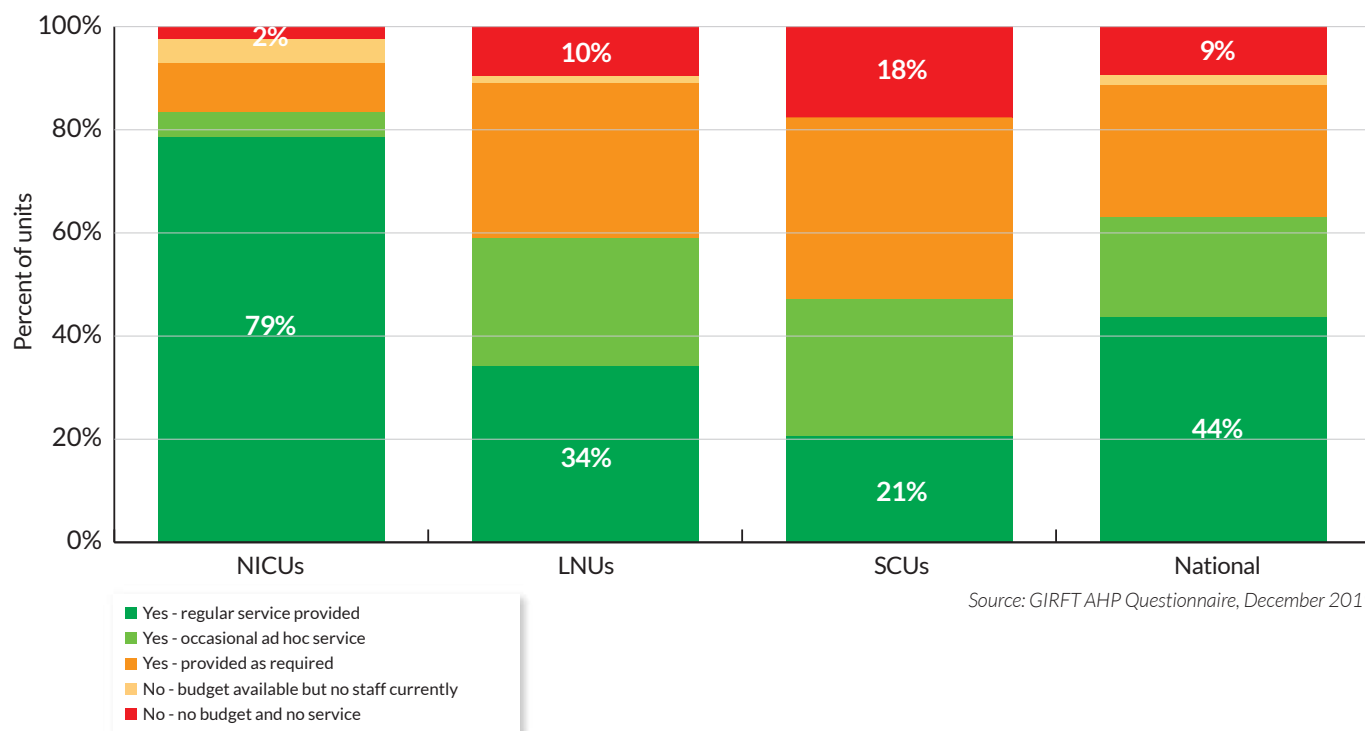
<sup>34</sup> Embleton, N.E., Pang, N., and Cooke, R.J., (2001) *Postnatal malnutrition and growth retardation: an inevitable consequence of current recommendations in preterm infants?* *Pediatrics*

<sup>35</sup> Ehrenkranz, R.A., et al., (2016) *Growth in the neonatal intensive care unit influences neurodevelopmental and growth outcomes of extremely low birth weight infants.* *Pediatrics*

<sup>36</sup> Chan, S.H., Johnson, M.J., Leaf, A.A. & Vollmer, B. (2016) *Nutrition and neurodevelopmental outcomes in preterm infants: a systemic review.* *Acta Paediatrica*

<sup>37</sup> Cormack, B.E., Harding, J.E., Miller, S.P. and Bloomfield, F.H. (2019) *The influence of Early Nutrition on Brain Growth and Neurodevelopment in Extremely Preterm Babies: A Narrative Review.* *Nutrients*

Figure 22: Service provision for dietetics in NICUs, LNUs and SCUs



### Adherence to national standards

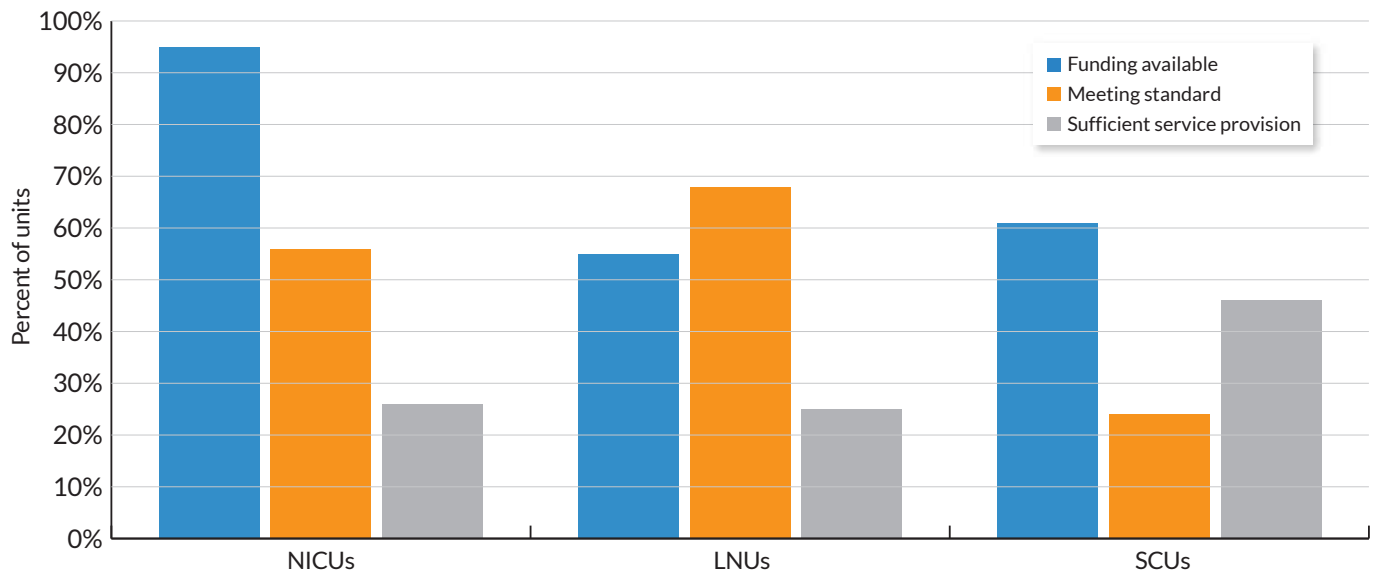
Service standards and training for neonatal dietetic services are set by The Association of UK Dietitians (BDA).<sup>38, 39</sup> LNUs have the highest percentage of units meeting the recommended standards at 68% with 56% of NICUs meeting the standard and 24% of SCUs (**Figure 23**). Two thirds of senior dietitians in NICUs had the recommended national competencies and more than five years' experience working in a NICU.

Service provision is considerably higher than identified funding in LNUs and SCUs suggesting a degree of goodwill in the service provision, this was born out by discussions in deep-dive visits. Less than a quarter of NICUs and LNUs and half of SCUs felt they had a sufficient dietetic service. However, in those units where there was no service and no budget available, 43% felt dietetics was not a priority.

<sup>38</sup> The Association of UK Dietitians (BDA). (2014) Dietitian Staffing on Neonatal Units: Neonatal Sub-Group Recommendations for Commissioning

<sup>39</sup> The Association of UK Dietitians: BDA Neonatal Sub-Group (2018) Competencies for Dietitians Working on Neonatal Units. [www.bda.uk.com/uploads/assets/bf9dfd91-0475-4894-8560c8b183f171fc/BDA-Formatted-Competencies.pdf](http://www.bda.uk.com/uploads/assets/bf9dfd91-0475-4894-8560c8b183f171fc/BDA-Formatted-Competencies.pdf)

**Figure 23: Identified funding, adherence to national standards and clinical service opinion regarding service sufficiency for dietetic services in English neonatal units**

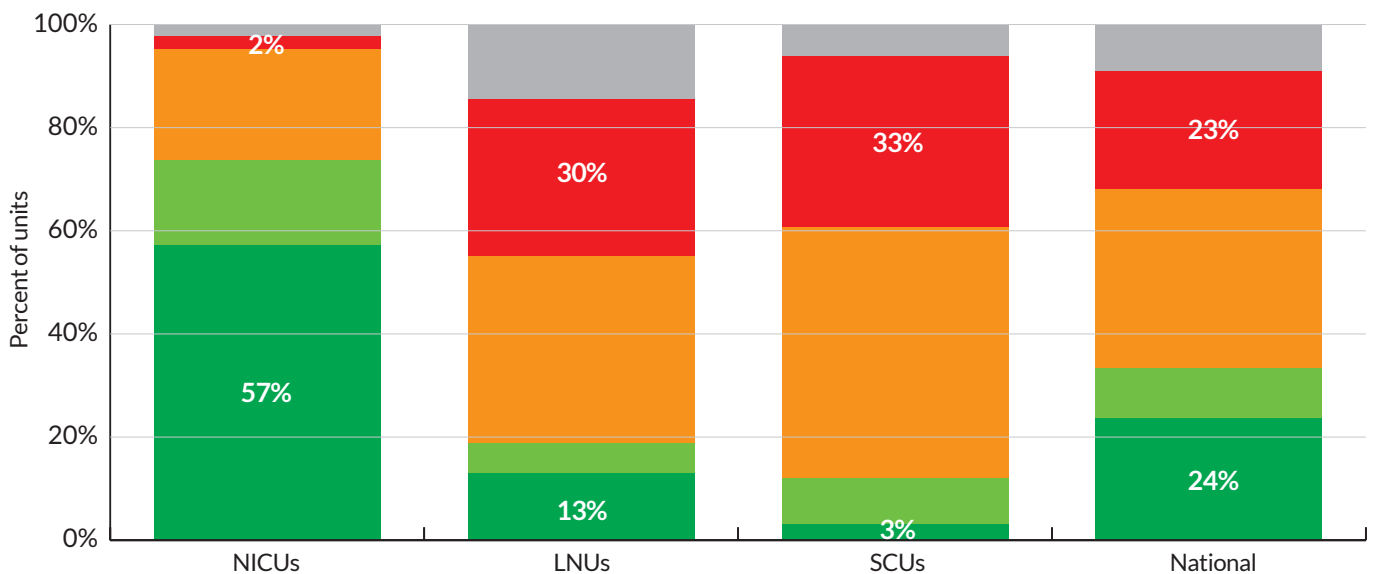


Source GIRFT AHP Clinical Services Questionnaire December 2019

### Funding sources

Our data (Figure 24) suggests that dietetic funding is most likely to be specifically identified for NICUs – nearly 60% of NICUs report having identified funding for their dietetic service. In LNUs and SCUs, this funding is more likely to be part of an allocation that is shared with paediatric services. Nationally, nearly a third of units (32%) have no funding for their dietetics or the funding source was reported as not being clear.

**Figure 24: Funding sources for dietetic services in neonatal units**



Source: GIRFT AHP Questionnaire, December 2019



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## Impact on services

Most units are offering dietitian input for patients with complex nutritional needs and those that are failing to thrive. However, dietitians who had regular time allocated to the neonatal service provided a higher level of service provision for all preterm infants and neonatal unit inpatients. This level of service provision was available in less than half of all NICUs, about a quarter of LNUs and at 11% of SCUs. GIRFT data demonstrates that the impact of this is seen in the following ways:

- Dietetic services were involved in supporting all patients on parenteral nutrition (PN) in only 47% of NICUs and 12% of LNUs; dietetic support for long-term PN patients was available in 61% of NICUs. NICE guidance<sup>40</sup> states that a neonatal dietitian should be included as part of the neonatal PN MDT.
- 77% of NICUs and 55% of LNUs reported dietetic involvement in developing guidelines for parenteral nutrition.
- 84% of NICUs, 61% of LNUs and 54% of SCUs reported dietetic involvement in developing guidelines for enteral nutrition.
- Only 58% of NICUs and 27% of LNUs had a nutrition-focused round once a week. Nutrition-focused rounds are an indicator of an embedded dietetic service and are reflected in the level of identified neonatal funding particularly in NICUs.

### IN PRACTICE

## Dietitian-led quality improvement standardising network feeding practices

### East of England ODN

Initial scoping by the East of England ODN noted wide variation in enteral feeding practices across the network. Guidelines were written based on current evidence, where available, and on network or national consensus where evidence was poor or unavailable. The guidance was shared across the network via the network dietitian lead, which involved:

- A robust teaching programme delivered at unit level to each MDT within the network.
- Information folders, posters and electronic newsletters.
- Calculated feed advancement tables.
- Rapid access advice and support provided via email and phone during and following the implementation period.

At a local level, 'champions' were identified to support implementation. Their role was to:

- Disseminate information and maintain the profile of the project.
- Provide ongoing support for teams during the implementation and embedding process and subsequent implementation of a nutrition pathway.

After a year there was 98% compliance with the guideline across all 17 units in the East of England. Network rates for necrotising enterocolitis are consistently low compared to the national average.

<sup>40</sup> NICE (2020) guideline NG154, Neonatal Parenteral Nutrition

## Speech and language therapy

### GIRFT key findings:

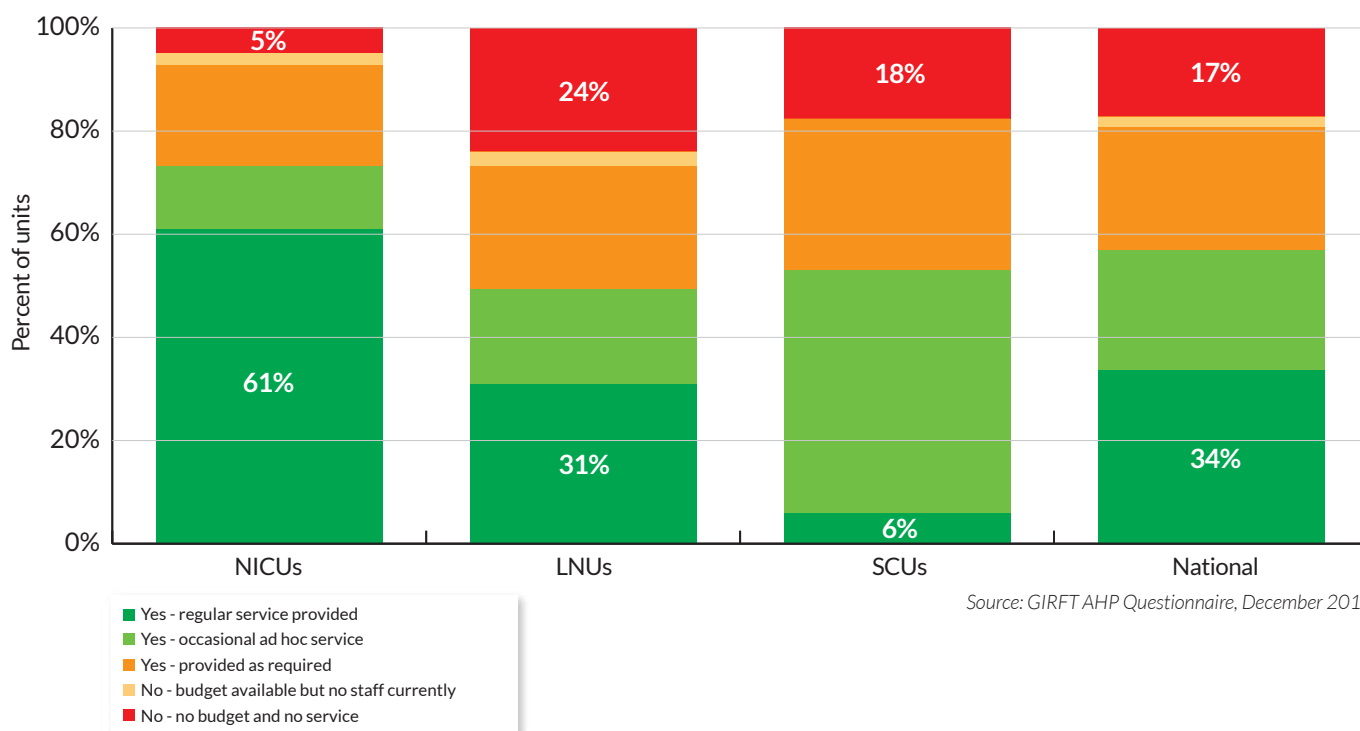
- 34% of services have regular speech and language therapy (SLT) service provision (61% in NICUs).
- 31% of NICUs, 24% of LNUs and 79% of SCUs met the SLT staffing standards.
- 75% of NICUs and LNUs felt the SLT service was insufficient.
- 27% of units had no identified budget for SLT services.

Speech and language therapists (SLTs) have a specific role in the early identification, assessment and management of oral feeding and swallowing difficulties in neonates. SLTs are specialists in providing pre-oral feeding support and assessment of readiness for oral feeding, evaluation of breastfeeding and bottle feeding. They understand the complexities of oral feeding especially with regards to respiratory devices and are often trained in instrumental objective assessment such as video fluoroscopy swallow studies (VFSS). SLTs provide individualised feeding recommendations and strategies to help support safe and effective oral feeding and nutrition. In addition, SLTs provide training and support to the wider multidisciplinary team in oral feeding practices and are integral in embedding UNICEF BFI neonatal standards, FICare and the Bliss Baby Charter. SLTs have a role in reducing the risk of known prolonged feeding difficulties such as delayed nasogastric tube weaning, oral aversion and future difficulties progressing with weaning onto solids.<sup>41,42,43</sup> SLTs also have expertise in early communication and how to maximise the opportunities for supporting speech, language and communication development through supporting parents with their neonates in the unique neonatal unit environment.

### Current service provision

There is a significant shortfall in SLT service provision to neonatal units at all levels with only a third of units having a regular service. This is highest in NICUs (**Figure 25**).

**Figure 25: Service provision for speech and language therapy in NICUs, LNUs and SCUs**



<sup>41</sup> Hawdon JM, Beauregard N, Slattery J, Kennedy G (2007) Identification of Neonates at Risk of Developing Feeding Problems in Infancy. *Developmental Medicine and Child Neurology*.

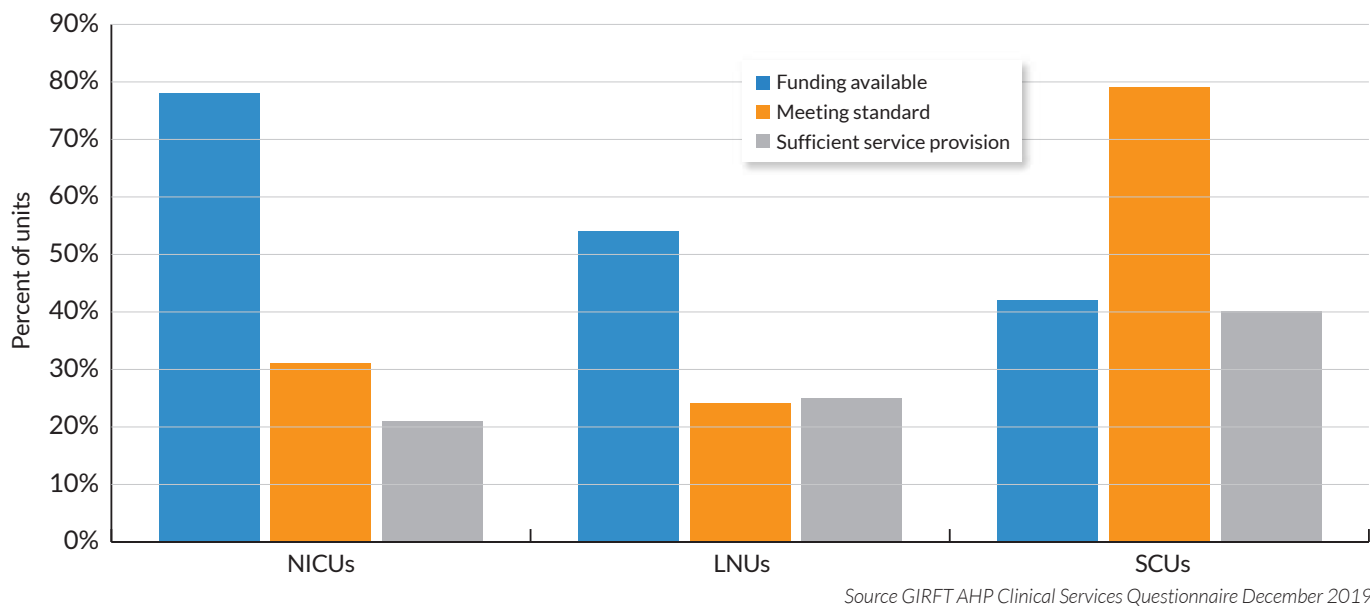
<sup>42</sup> Migraine A., Nicklaus SA., Parnet P., et al (2013). Effect of preterm birth and birth weight on eating behavior at 2 years of age. *American Journal of Clinical Nutrition*, doi: 10.3945/ajcn.112.051151

<sup>43</sup> Johnson S., Matthews R., Draper ES., et al. (2016). Eating difficulties in children born late and moderately preterm at 2 years of age: a prospective population-based cohort study. *The American Journal of Clinical Nutrition*, <https://doi.org/10.3945/ajcn.115.121061>

## Adherence to national standards

Service standards and training for neonatal speech and language therapy services are set by the Royal College of Speech and Language Therapists (RCSLT).<sup>44,45</sup> Adherence to service standards is low in NICUs (31%) and LNUs (24%) but higher in SCUs (79%) (Figure 26). Three quarters of staff in NICUs and LNUs felt the current service was insufficient. The existing staff are highly trained within the field and more than half of all SLT staff have five or more years of experience in a NICU. The level of service provision is higher than the level of funding across all levels of units, particularly within SCUs suggesting a significant component of goodwill provision from paediatric and community services providing in-reach and this was confirmed during GIRFT deep-dive visits. This limits the continuity of service provision to neonates and their families and prevents a service being embedded as part of the MDT.

**Figure 26: Identified funding, adherence to national standards and clinical service opinion regarding service sufficiency for speech & language services in English neonatal units**



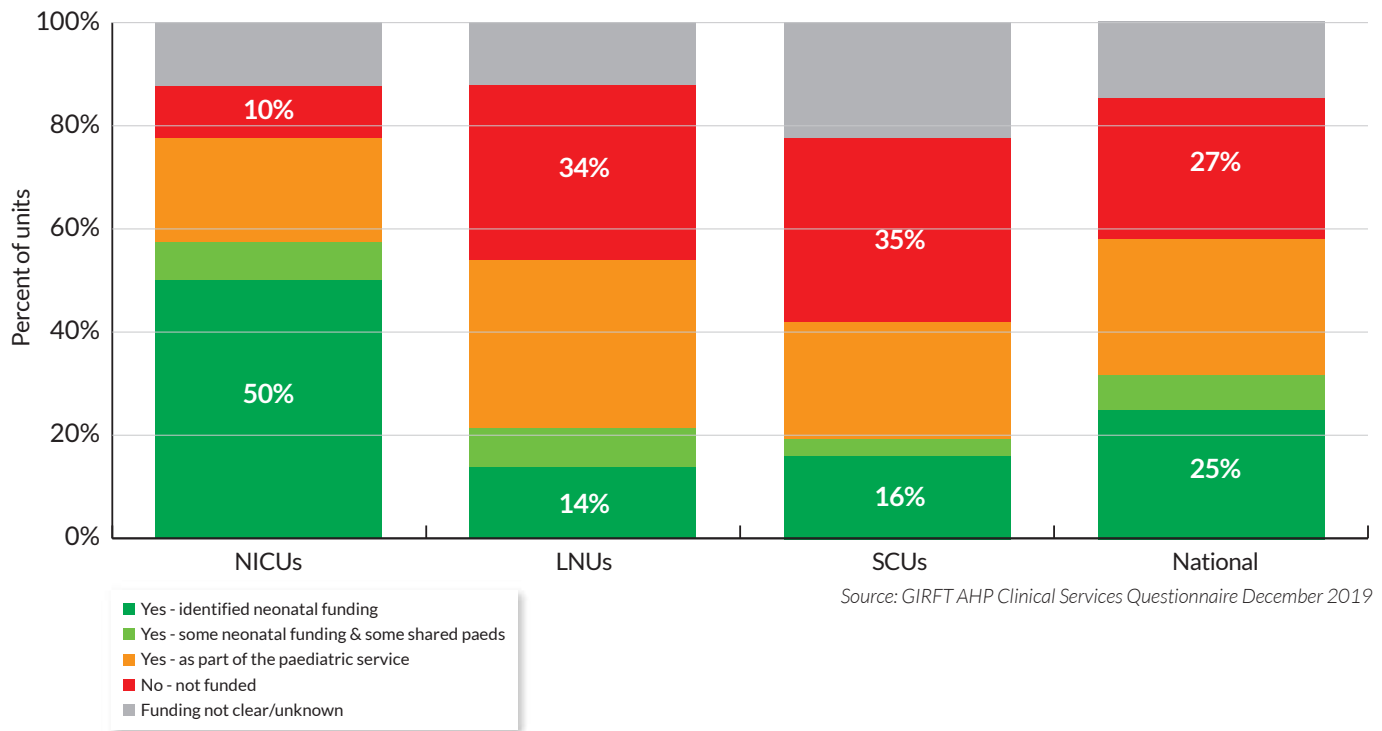
## Funding sources

Over a third of units had no budget (Figure 27). The GIRFT questionnaire data demonstrated no services were trying to secure funding at the time of our survey, and 12% of units had been unsuccessful at securing funding. In over a third of units with no budget or service, SLT services were not considered a priority.

<sup>44</sup> Royal College of Speech & Language Therapists (2018) *Speech and Language Therapy Staffing Recommendations for Neonatal Units*, available at [www.rcslt.org/wp-content/uploads/media/Project/RCSLT/neonatal-speech-and-language-therapy-staffing-level-recommendations.pdf](https://www.rcslt.org/wp-content/uploads/media/Project/RCSLT/neonatal-speech-and-language-therapy-staffing-level-recommendations.pdf)

<sup>45</sup> Royal College of Speech & Language Therapists (2018): *Neonatal Dysphagia Competency Framework*, available at <https://www.rcslt.org/wp-content/uploads/media/Project/RCSLT/dysphagia-training-competency-framework.pdf>

**Figure 27: Funding sources for speech and language services in neonatal units**



### Impact on services

GIRFT data demonstrates the shortfalls in funding and staffing below recommended levels appears to be impacting service provision. For example:

- 60% of NICUs have breastfeeding assessment and support from SLTs. This is higher than LNUs and SCUs, where only a third have access to this support.
- 16% of NICUs and just under a third of LNUs and SCUs are not able to access a SLT assessment of feeding and swallowing difficulties.
- Parent support for cue-based feeding and developmental care was higher on NICUs (70%). Less than half of LNUs were able to support parents in these areas.
- SLT involvement in the provision of Family Integrated Care (FICare) was only available in 35% of NICUs, 29% of LNUs and 14% of SCUs.
- SLT attendance at MDT ward rounds was higher in NICUs (44%), compared to LNUs (20%) and SCUs (0%).

## Pharmacy

### GIRFT key findings:

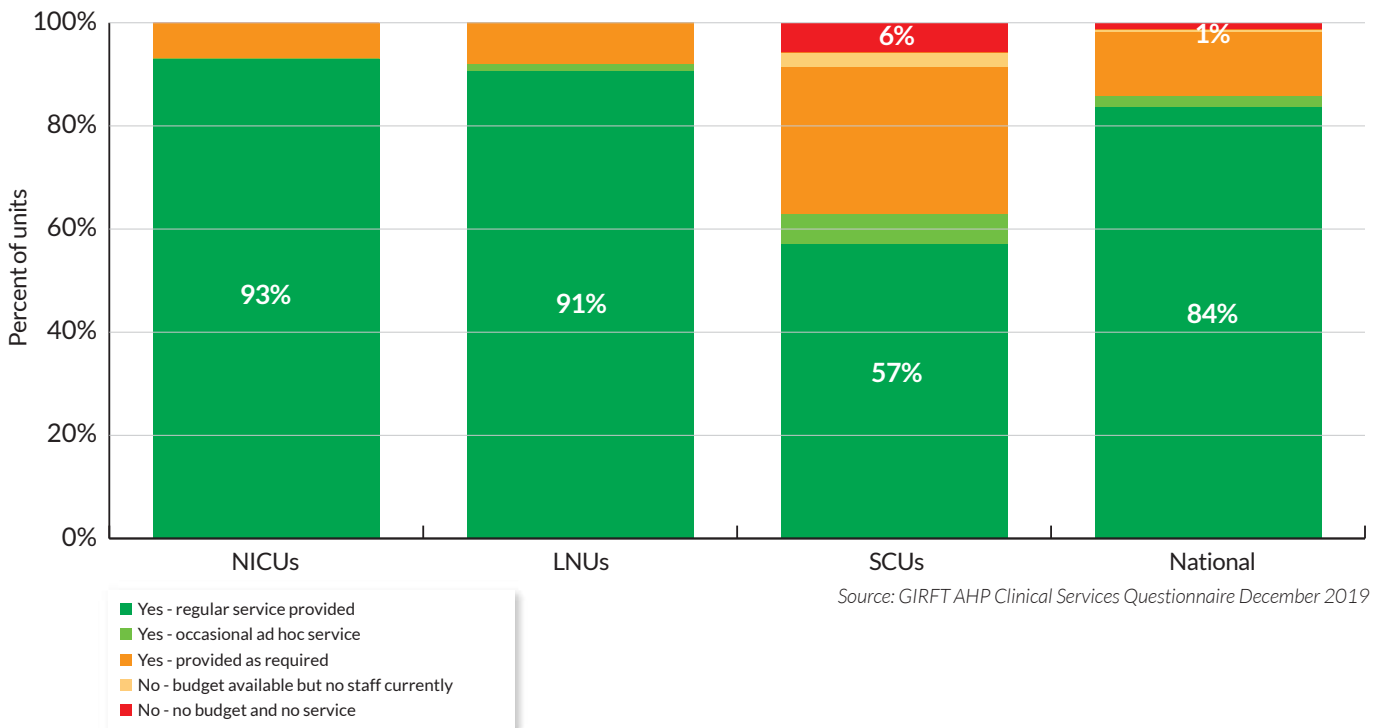
- 84% of units have regular pharmacy service provision.
- 56% of NICUs, 38% of LNUs and 29% of SCUs met pharmacy staffing standards.
- Pharmacists attend multidisciplinary rounds in 63% of NICUs, 32% of LNUs and 9% of SCUs.
- Pharmacists attend governance meetings in 67% of NICUs, 56% of LNUs and 46% of SCUs.
- 16% of NICUs and nearly a third of LNU pharmacists do not have neonatal parenteral nutrition training.

The role of the pharmacist is essential to ensure safe use of medicines in neonates. They play a major role in preventing medication errors, developing guidelines and supporting safe use of electronic prescribing systems and intravenous infusion pumps. They also provide training and support to the multidisciplinary team, advising on suitable and safe use of medicines. This is particularly important in neonatology as most medications are unlicensed in this age group, and thus considerations about pharmacokinetics, excipients, drug volumes and formulations all become far more complex. Drug errors are a very common adverse event due to the use of weight-based calculations and a rapidly changing weight. Parenteral nutrition (PN) is very commonly used in this population and this requires specialist knowledge, additional to that required for adults.

### Current service provision

The majority of neonatal services have regular service provision (84%) (Figure 28). However, 7-9% of NICUs and LNUs do not have regular service provision, and there is no provision at all in 9% of SCUs. This is very concerning given the important role pharmacists play in preventing medication errors.

Figure 28: Service provision for pharmacy in NICUs, LNUs and SCUs



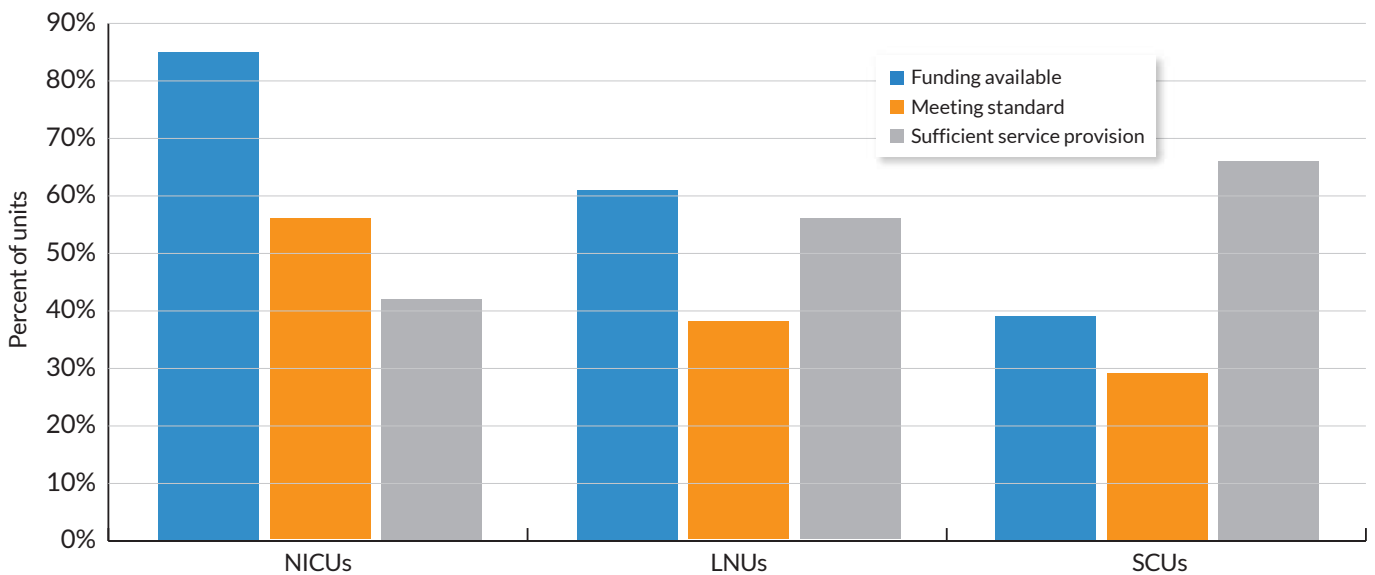
## Adherence to national standards

Staffing standards for pharmacists and pharmacy services to neonatal units in the UK are set by Neonatal and Paediatric Pharmacist Group (NPPG).<sup>46</sup> They include pharmacist time for ward rounds for all units and a WTE standard for NICUs; both standards are based on cot numbers at different levels of care.

Just over half of NICUs are meeting the staffing standard for the amount of time per week a pharmacist is physically present on the NICU with 34% meeting the WTE staffing standard (**Figure 29**). Staffing time standards are less likely to be met in LNU (38%) and SCU (29%). Around 42% of NICUs feel their pharmacy provision is sufficient, with higher number in LNU (56%) and SCU (66%).

Three quarters all senior pharmacists working in neonatal units have at least five years' neonatal experience. In NICUs, 73% of pharmacists had achieved the nationally recommended competency level, this dropped to a third for LNU, and 37% in SCU. However, in nearly a quarter of LNU and half of SCU, pharmacists had no neonatal training. Specific training for pharmacists in neonatal PN was achieved in 84% NICUs, 69% LNU and 37% SCU.

**Figure 26: Identified funding, adherence to national standards and clinical service opinion regarding service sufficiency for speech & language services in English neonatal units**



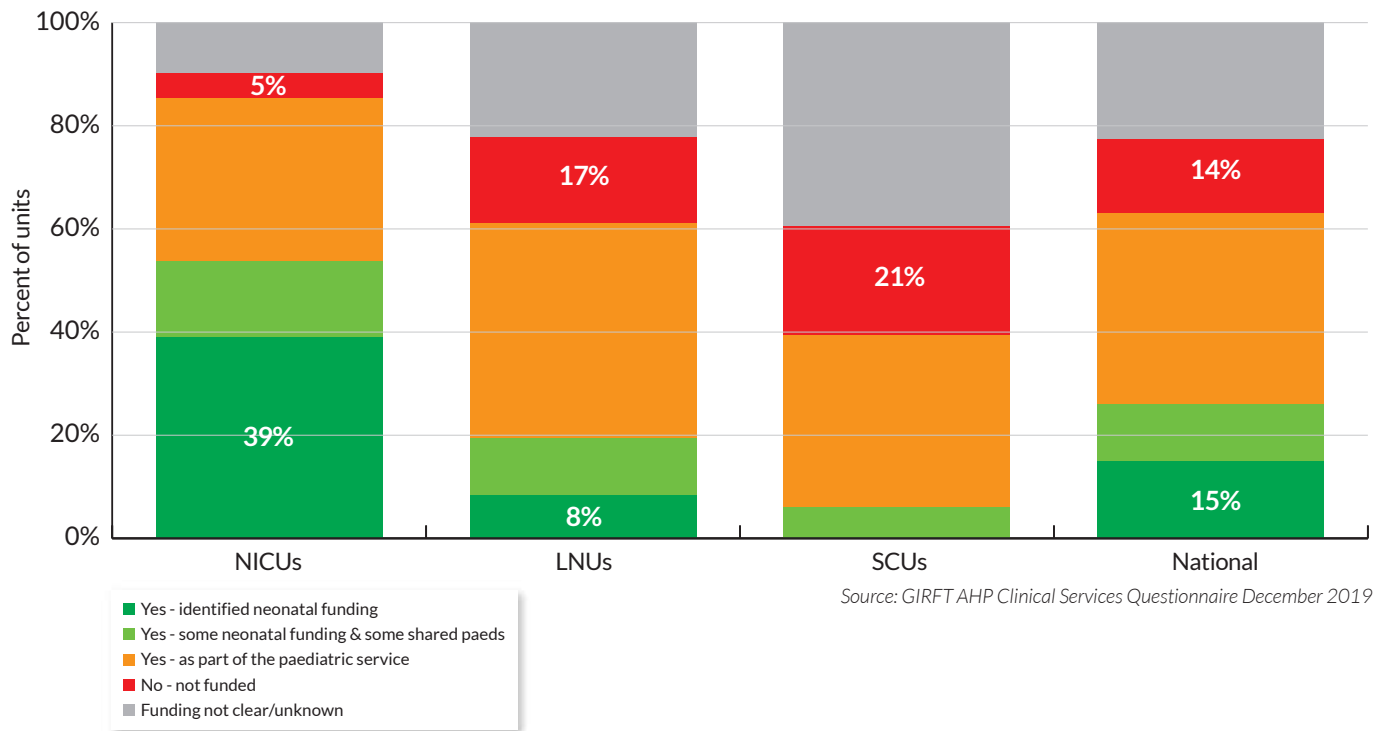
Source: GIRFT AHP Clinical Services Questionnaire December 2019

## Funding sources

Identified funding for services was highest for NICUs with nearly 40% receiving specific neonatal funding. For LNU and SCU the majority of services were funded as part of paediatrics (**Figure 30**).

<sup>46</sup> Neonatal and Paediatric Pharmacists Group, Neonatal Pharmacist Staffing Standards <http://nppg.org.uk/staffing-standards/>

**Figure 30: Funding sources for pharmacy services in neonatal units**



### Impact on services

Although pharmacy services fair better than AHPs and psychology, there is nonetheless a significant gap against staffing standards and many services feel they have insufficient support. This is reflected in a reduced ability for pharmacists to attend multidisciplinary rounds and governance meetings. It is also concerning that 16% of NICU pharmacists and nearly a third of LNU pharmacists do not have neonatal PN training. This training is strongly recommended by the NPPG and NICE guidance,<sup>47</sup> which emphasises the importance of the neonatal pharmacist as part of the neonatal parenteral nutrition multidisciplinary team. This is a critical role of the neonatal pharmacist and without this support there is a significant risk of incidents occurring relating to PN provision, due to inappropriate PN orders and monitoring.

### Psychology

**GIRFT key findings:**

- 63% of units have no psychology service.
- 57% of units have no funding for psychology.
- Half of NICUs, and 6-13% of LNUs and SCUs had a regular psychology service.
- 90% of units feel they have insufficient psychology services.
- WTE psychologists are, on average, one third of current BPS standard in those units that have a service.

Clinical psychologists with specialist expertise in neonatology provide evidence-based psychological assessment and interventions for parents, infants and staff on neonatal units. They work as part of the MDT and provide consultation to medical teams on complex cases. They supervise other professionals delivering psychological interventions, such as nurses undertaking counselling activities, counsellors, and family support workers, as well as coordinating additional specialist support such as health psychologists or psychotherapists where needed.

<sup>47</sup> NICE (2020) guideline NG154, Neonatal Parenteral Nutrition

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## Parental and family mental health

Admission to a neonatal unit for any reason can have negative psychological consequences for the parents, the neonate, and the parent-baby relationship, with significantly higher rates of parental mental health difficulties when compared to the general perinatal population.<sup>48, 49, 50, 51</sup> Moreover, the neonatal unit environment itself can be traumatising.<sup>52</sup>

Clinical psychologists are well trained in a number of therapeutic models to support parents' mental health needs and peri-trauma work. Effective and timely specialist inpatient intervention results in a number of cost benefits, including shorter length of stay and improved outcomes for parents and infants which are sustained over time.<sup>53, 54</sup> At a conservative estimate, the long-term costs of perinatal depression, anxiety and psychosis in the UK is £8.1 billion per year, the equivalent of £10,000 for every single birth, with 72% of this cost being due to adverse impacts on the child.<sup>55</sup>

Clinical psychologists can provide additional follow-up care post discharge to assist in the transition home. They assess risk and help to ensure clear pathways for mental health difficulties and refer on to specialist services. In addition to mental health needs, clinical psychologists are trained to provide psychological interventions for a range of specific issues that arise on the neonatal unit.

## Infant mental health

Clinical psychologists have expertise enabling them to focus on the attachment relationship between the infant and parent in a hospital setting. They work with AHPs and the MDT to enhance collaborative care planning and play an important role in developing family integrated care.

## Staff support and training

Clinical psychologists can use their skills to address the psychological distress of the intensive care environment on staff including pre-case discussions and debriefs of difficult clinical situations, lead reflective practice sessions and provide bespoke teaching and training to the neonatal team. Rates of burnout and trauma are high in the neonatal workforce. Where employed to support staff, evidence highlights a significant reduction in lost days to stress-related sickness and a 40% reduction in costs related to sickness.<sup>56</sup>

## Current service provision

Our data (**Figure 31**) shows that there is a very significant shortfall in psychology service provision to neonatal units. Only half of NICUs, and very few LNUs and SCUs, have a regular psychology service. There is no service in more than 40% of NICUs and more than two thirds of LNUs and SCUs.

<sup>48</sup> Grunberg VA, Geller PA, Bonacquisti A, Patterson CA. (2018) NICU infant health severity and family outcomes: a systematic review of assessments and findings in psychosocial research. *J Perinatol*.

<sup>49</sup> Bry A and Wigert H (2019) Psychosocial support for parents of extremely preterm infants in neonatal intensive care: a qualitative interview study. *BMC* <https://pubmed.ncbi.nlm.nih.gov/31783784/>

<sup>50</sup> Feeley N, Zekowitz P, Cormier C, Charbonneau L, Lacroix A, Papageorgiou A. (2011) Posttraumatic stress among mothers of very low birthweight infants at 6 months after discharge from the neonatal intensive care unit. *Appl Nurs Res*.

<sup>51</sup> Lefkowitz DS, Baxt C, Evans JR. (2010) Prevalence and correlates of posttraumatic stress and postpartum depression in parents of infants in the neonatal intensive care unit (NICU). *J Clin Psychol Med Settings*.

<sup>52</sup> Obeidat HM, Bond EA, Callister LC. (2009) The parental experience of having an infant in the newborn intensive care unit. *J Perinat Educ*. doi: 10.1624/105812409X461199

<sup>53</sup> Cherry A, Mignogna M, Rodenberry Vaz A et al, (2016) The contribution of maternal mental psychological functioning to infant stay in the Neonatal Intensive Care Unit. *International Journal of Women's Health*. <https://www.ncbi.nlm.nih.gov/pmc/articles/PMC4930234/>

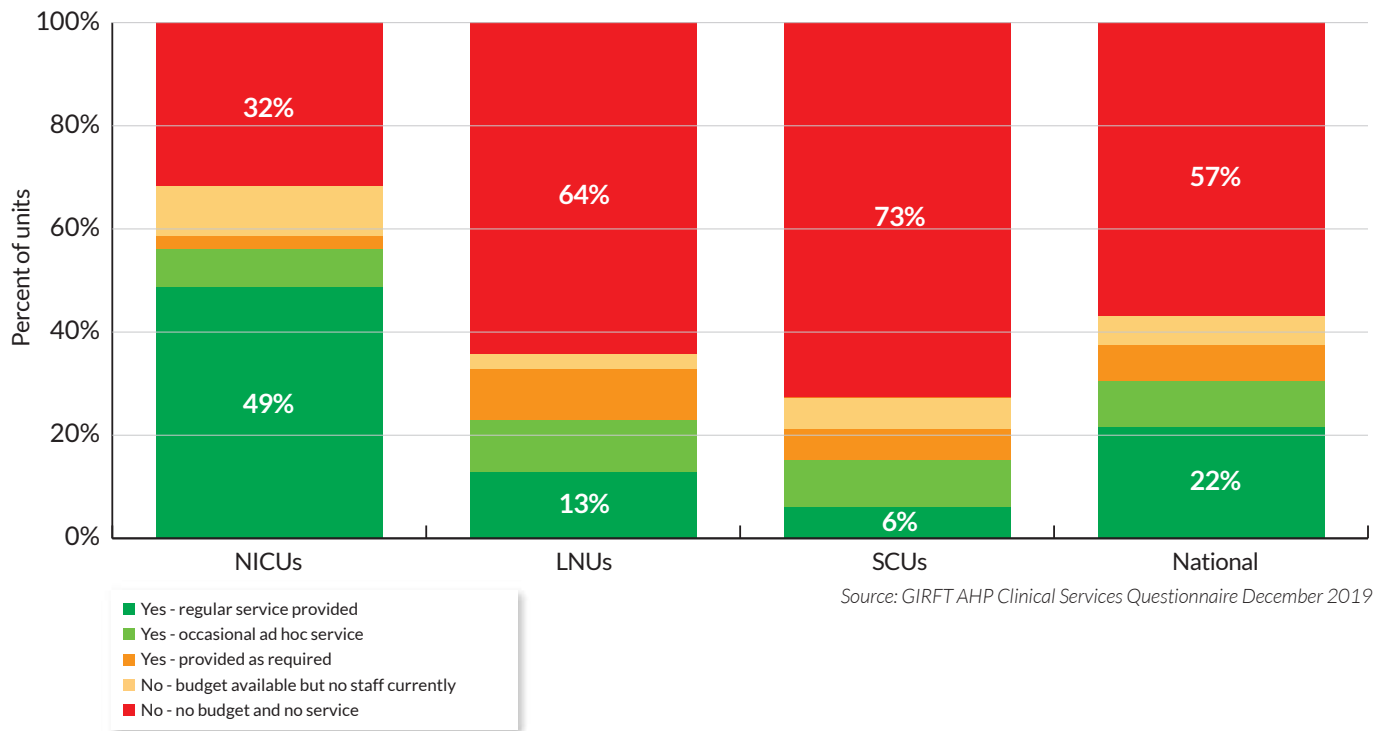
<sup>54</sup> Hannan, K.E. and Bourque, S.L. (2020), How does family integrated care in the NICU affect short-term infant and parent outcomes?. *Acta Paediatr*, <https://doi.org/10.1111/apa.15421>

<sup>55</sup> Bauer A, Parsonage M, Knapp M, Lemmi V & Adelaja B (2019). *The Costs of Perinatal Mental Health Problems*. LSE Personal Social Services Research Unit: Centre for Mental Health. <https://www.centreformentalhealth.org.uk/publications/costs-perinatal-mental-health-problems>

<sup>56</sup> D'Urso A, O'Curry S, Mitchell L, et al. (2018) Staff matter too: pilot staff support intervention to reduce stress and burn-out on a neonatal intensive care unit. *Archives Disease in Child Fetal Neonatal Ed*



**Figure 31: Service provision for psychology in NICUs, LNUs and SCUs**



### Adherence to national standards

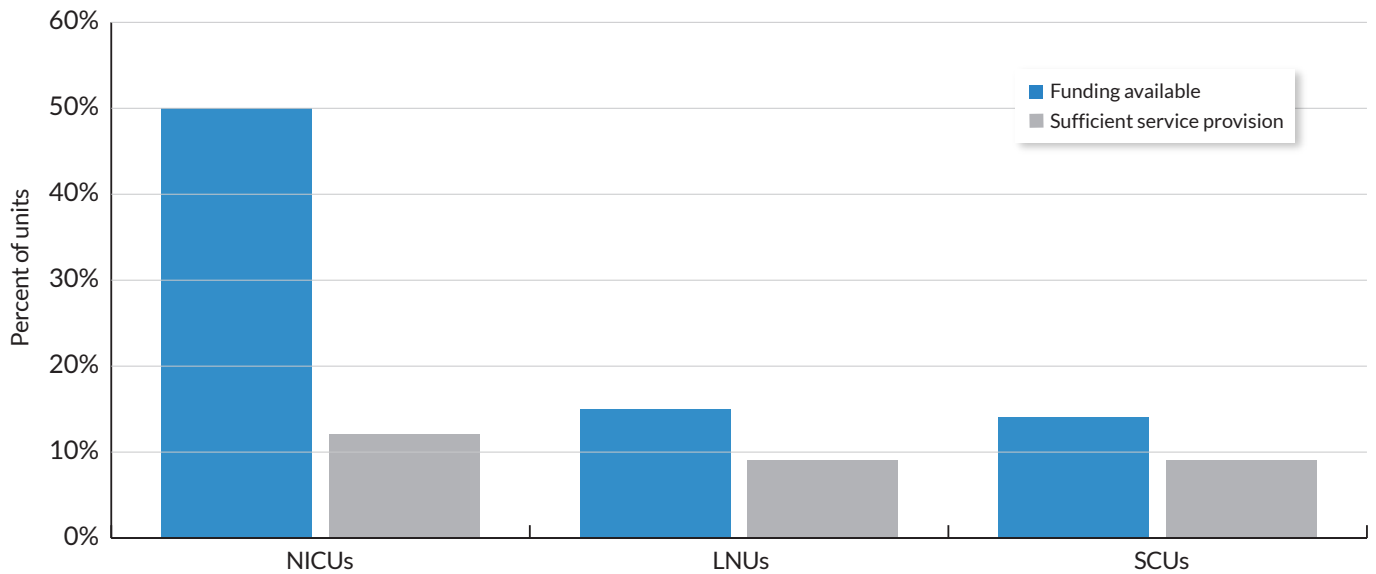
The British Psychological Society (BPS) published staffing standards for perinatal services in 2016.<sup>57</sup> These are based on delivery populations with additional requirements if a neonatal service is present on-site. These standards should be used as a baseline for trust benchmarking, but further work is required to develop guidelines which consider the acuity and complexity of the babies admitted to neonatal services.

The additional neonatal component of the current BPS perinatal recommendations suggests that for an average sized unit, the neonatal psychology support should be 0.9 WTE for NICU, 0.6 WTE for LNU and 0.4 WTE for SCUs. (These figures assume baseline perinatal support from maternity services is already present.) Our data suggests psychology support is much lower in practice. The average WTE for psychologists who were in post across all NICUs was 0.33 WTE (range 0.0 to 1.7), LNUs 0.04 WTE and SCUs 0.02 WTE. 90% of units reported feeling that they have insufficient psychology services (**Figure 32**).

The current workforce is very experienced with half having five or more years' experience working in a neonatal unit and over half working at consultant or post-doctoral level.

<sup>57</sup> British Psychological Society (2016) *Perinatal service provision: the role of perinatal clinical psychology*

**Figure 32: Identified funding, and clinical service opinion regarding service sufficiency for psychology services in English neonatal units**

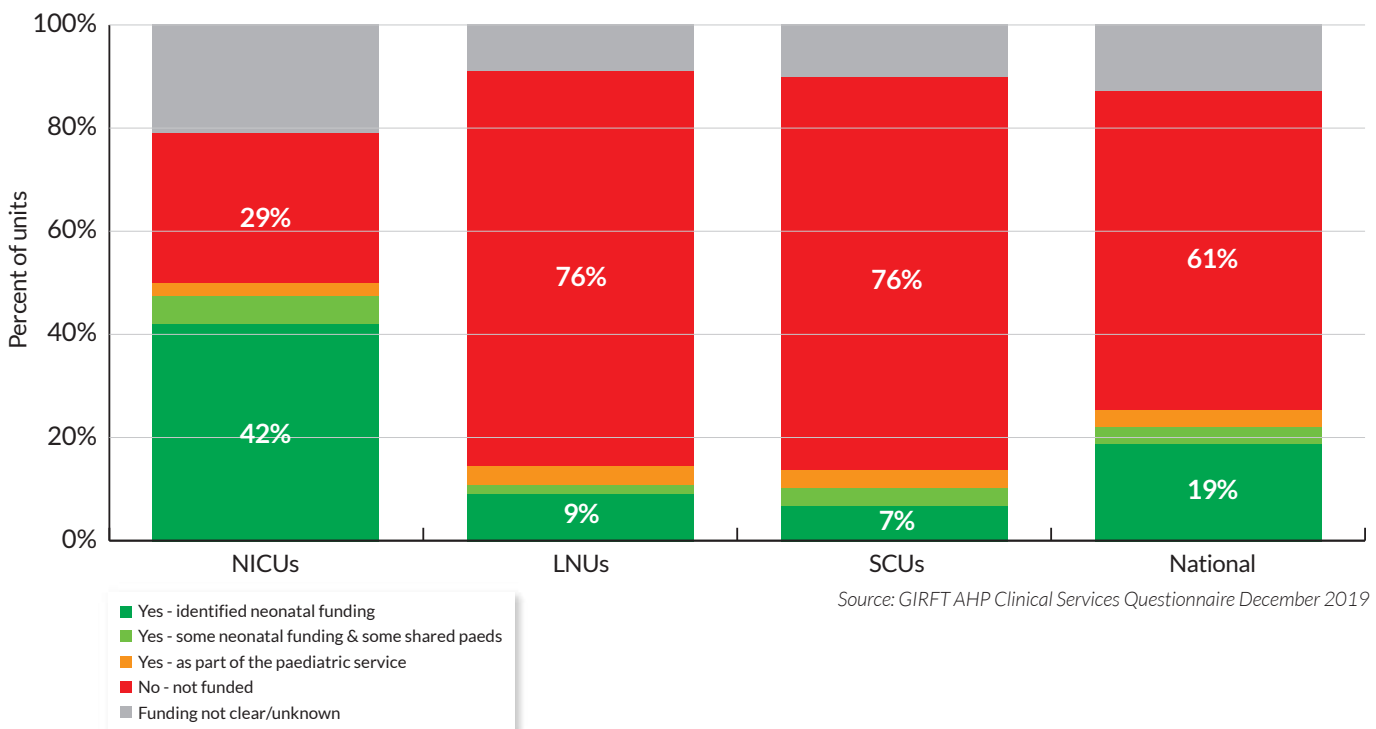


Source: GIRFT AHP Clinical Services Questionnaire December 2019

### Funding sources

Three quarters of neonatal psychological services have no budget (**Figure 33**), of which 20% were trying to secure funding, 6% had unsuccessfully tried to secure funding and 40% did not consider psychology to be a priority. This picture is very disappointing given the focus on perinatal mental health (see also our discussion on family wellbeing in the GIRFT Neonatology National Specialty Report p108).

**Figure 33: Funding sources for psychology services in neonatal units**



Source: GIRFT AHP Clinical Services Questionnaire December 2019

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## Impact on services

The lack of embedded service has a significant impact on psychological support for families and staff and even where there is dedicated provision this is mostly felt to be insufficient. GIRFT data demonstrates that this impacts service provision in many ways. For example:

- 58% of NICUs provide inpatient support and counselling (27% of LNUs, 20% of SCUs).
- 58% of NICUs provide bereavement psychological support and counselling (37% of LNUs, 11% of SCUs).
- 35% of NICUs had psychology involvement in family integrated care models (21% of LNUs and only 9% of SCUs).
- Less than a fifth of all units provided staff training and support for managing families with mental health difficulties.
- Outpatient family psychological support and counselling were offered for the short-term in 37% of NICUs and 17% of LNUs, but virtually no SCUs.
- Psychology involvement in MDT ward rounds was higher in NICUs (30%), and only 7% of LNUs and 3% of SCUs.

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## Developing the future workforce model for neonatology

Creating a safe and sustainable workforce requires review and development of the whole multidisciplinary team, embracing new ways of working with a focus on family partnership in care to ensure a holistic, safe, high-quality neonatal service for the future. Education is the lynchpin to support the future model of neonatal care for medical staff, nurses, AHPs and parents. It is critical that all teams have access to relevant training and that trusts provide protected time to enable this. In addition, evolution of existing roles and adoption of alternative and innovative roles e.g. assistant practitioners, nurse associates and physician associates will be required as well as more fully integrating the family within this team. Workforce models will need to be tailored to provide the best fit for each trust through use of network and local workforce strategies. This should include training that gives LNU and SCU staff confidence to manage situations which occur infrequently outside the NICU setting (which is also discussed in our recommendations in the accompanying GIRFT Neonatology National Specialty Report).

Staff wellbeing is also a critical part of creating a safe and sustainable workforce. When staff feel supported it can have a significant impact on sickness and retention. Research by Bliss in 2019 highlighted the significant impact of the neonatal environment on the mental health and wellbeing of neonatal staff. It found that support for staff who need it is inconsistent and often inadequate. Based on the survey of neonatal staff, over half of respondents said their mental health deteriorated over the previous 12 months, highlighting understaffing, workload and dealing with traumatic events as contributory factors.<sup>58</sup>

## Medical staffing: the way forward

### Education and training

The RCPCH have developed a new training pathway “Progress+” (anticipated start date September 2023), which is designed to be more flexible and attractive to trainees hopefully improving recruitment and retention. The new model focuses on capability-based training rather than time-served and splits the curriculum into four core and three speciality training years, thereby reducing the overall training programme from eight to seven years. The transition to the new programme will need to be carefully managed and evaluated.

Review of training placements and current junior doctor roles and responsibilities is essential to support trainees and improve their education experience. In addition, as highlighted in the recent Ockenden report,<sup>59</sup> it is important for trained staff, particularly those working in LNUs and SCUs whose intensive care experiences will be less frequent, to have ongoing education and training to ensure confidence and skills are maintained for intensive care activities. This should include observational attachments in local NICUs as well as network-based education, training and simulation events for the whole multidisciplinary team (for further information, please refer to the clinical and governance, safety and litigation sections of GIRFT’s Neonatology National Specialty Report). In addition, junior staff should have rapid access to expert clinical advice when needed, and developments in new technologies such as telemedicine may help to reduce stressful situations for junior staff, improving recruitment and retention.

### Non-clinical roles

There are a significant number of important non-clinical roles required to support a high-quality service within neonatology including governance activities, bereavement support, quality improvement, infant feeding and research. Discussions from deep-dive visits suggest that general reductions in consultant supporting activity time have meant that there is often insufficient, or no time allocated to these roles. It is essential that trusts recognise the value and time required for this work to ensure ongoing high-quality services and prevent staff burnout.

### Multidisciplinary team development

Services must develop workforce models which are less reliant on deanery trainees who change post every six to 12 months. The Medical Training Initiative (MTI) scheme<sup>60</sup> offers international doctors a two-year training programme, endorsed by the RCPCH, this option has been embraced by some units (predominantly NICUs). Development of advanced neonatal nurse practitioners (ANNPs) is already well established in many units. Alternative extended and new roles (e.g. enhanced neonatal nurse practitioner (ENNP), physicians associate, and prescribing pharmacist), must be developed to provide a higher level of organisational memory and stability to the service, as well as improving support for doctors in training as they undertake their neonatology placement. This type of workforce transformation has started in some trusts but will take time to evolve and require local solutions to be found.

<sup>58</sup> <https://www.bliss.org.uk/bliss-research-mental-health-and-well-being-of-neonatal-staff>

<sup>59</sup> Ockenden D (2020) *Emerging Findings and Recommendations from the Independent Review of Maternity Services at The Shrewsbury and Telford Hospital NHS Trust*, <https://www.donnaockenden.com/downloads/news/2020/12/ockenden-report.pdf>

<sup>60</sup> <https://www.aomrc.org.uk/medical-training-initiative/>

## IN PRACTICE

### Novel staffing model in a busy tertiary NICU

#### Manchester University NHS Foundation Trust (MUFT)

The large unit at MUFT has, like others, had difficulty in filling medical rotas in the last number of years, with potential for impact on quality of care and the ability to drive QI. In striving for clinical excellence, the unit has become innovative with staffing, using alternative models to formulate a blended neonatal workforce.

With capacity for 69 babies, several years ago the unit began to upskill enthusiastic nursing staff to work as enhanced neonatal nurse practitioners (ENNPs) or advanced neonatal nurse practitioners (ANNPs) – the latter working on the tier 1 junior doctor rota.

ENNPs underwent training on Examination of the Newborn and Enhanced Neonatal Nursing Practice (formerly ENB R23) courses at the University of Manchester, followed by a supernumerary period enabling work in medical roles on HDU and SCU. ANNP trainees completed the two-year University of Salford master's degree while undertaking clinical training in NICU. Nurse practitioners have medical consultant educational supervisors, also facilitating non-medical prescribing.

With hard work from a dedicated workforce team, medical rotas are now full with a blend of trainee doctors, junior and senior clinical fellows, international Medical Training Initiative doctors and ANNPs, facilitating team-working and innovation in the department.

Keen to explore the role of physician associates in neonatology, the unit began working with the University of Manchester to facilitate three-week student attachments, leading to the appointment of two enthusiastic practitioners whose role in NICU is evolving supported by a neonatal-specific competency framework.

With this multidisciplinary workforce providing competency-based care, teams are well led with 24-hour consultant presence, driving high-quality care for their complex neonatal population. The team encourage other units with similar challenges to consider alternative staffing models.

## Nurse staffing: the way forward

### Education and training

Neonatal ODNs are fundamental in supporting quality assurance of local education offers and supporting teams in feeling part of the wider network. It has been nationally recognised that neonatal ODNs are well placed to understand regional nuances within workforce and education. Network-supported education is cost-effective, linking closely with practising clinicians within the network and providing equitable access to training which can be difficult for individual units to support alone. Substantive workforce/education roles within network teams will be one of the early priorities supported by the NHS Long Term Plan funding for nursing commencing in FY2021/22.

The NHS Long Term Plan has protected money for a network lead nurse role supporting workforce and education with key responsibilities to map out challenges and support innovative solutions to the neonatal nursing workforce. This includes providing assurance to the network regarding the accuracy of provider unit neonatal nursing workforce returns to ensure funding allocations for neonatal nurse staffing from the NHS LTP can be directed to where they will be most effective. This group of senior nurses, working closely with the Neonatal Nursing Association, must take this opportunity to ensure there is a national education and training framework specific to neonatal nursing to ensure workforce development and career structure is supported by a sustainable competency-based education and training offer which will have a sustainable effect on recruitment and importantly, retention of nurses within the specialty.

The time needed for all elements of practice development must be taken into consideration when defining the nursing workforce and calculating the nursing requirements and skill mix within the team. Comprehensive workforce planning should include a workforce training needs analysis, level of practice, commissioning and provision of training and education. Study leave for the nursing workforce must meet or exceed the statutory requirements for registrants. Unlike doctors, the nursing workforce, including those practicing as ANNPs on medical rotas, do not often have contracted education time. This should be highlighted in their job plan.<sup>61</sup>

<sup>61</sup> <https://www.rcn.org.uk/professional-development/advanced-practice-standards>

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Consideration also needs to be given to the sustainable workforce of educators and development of clinical academics who are protected, supported and given a career pathway to remain in clinical practice, teaching and research.

In 2020/21, Health Education England (HEE) allocated £1,000 additional resource for every nurse and AHP to contribute to their continuing professional development over three years (not currently recurrent funding). Trusts should support specialties such as neonatal services to utilise this money to enhance the education offer to their staff either through individual professional development reviews or on a wider neonatal service training needs analysis. The opportunity should not be lost to utilise this additional funding to support career development.

## Preceptorship

Preceptorship programmes are for newly qualified staff and provide them with the basic knowledge and skills required to function within the neonatal team, making them feel valued at the outset of their career. Formal programmes of preceptorship for nurses new to neonatology, which can be provided at local or network level, may support recruitment and retention into neonatology.

### IN PRACTICE

## Preceptorship/Foundation Education Programme

### Thames Valley and Wessex Network

Thames Valley and Wessex Network Preceptorship/Foundation Education Programme is delivered twice yearly and runs for one year. It is for all newly qualified nurses and midwives, and nurses with no experience to the specialty.

The main aim of this programme is the recruitment and retention of staff to the specialty. The secondary aim is the acceleration of learning and skill acquisition in preparation for QIS.

The curriculum is underpinned by the RCN Neonatal Nurses Competency Framework utilising Benner's Novice to Expert continuum. There are 12 study days with parity for maternal, infant and staff mental health as well as physical health of the neonate and family. The preceptees undertake a quality improvement project, a bioscience test and a clinical placement in an alternative designated neonatal unit.

The programme commenced in October 2014 and was piloted with 12 nurses from within the network. Twice yearly intakes commenced from April 2016 to meet recruitment demands from the units. Currently across both intakes there are 56 newly qualified nurses new to the speciality. Typically, 80% of those starting the programme complete it – if individuals leave it is usually within the first two months having decided that neonatology is not for them.

Feedback from preceptees highlight the importance of the programme as a conduit for clinical and leadership skills. Examples include:

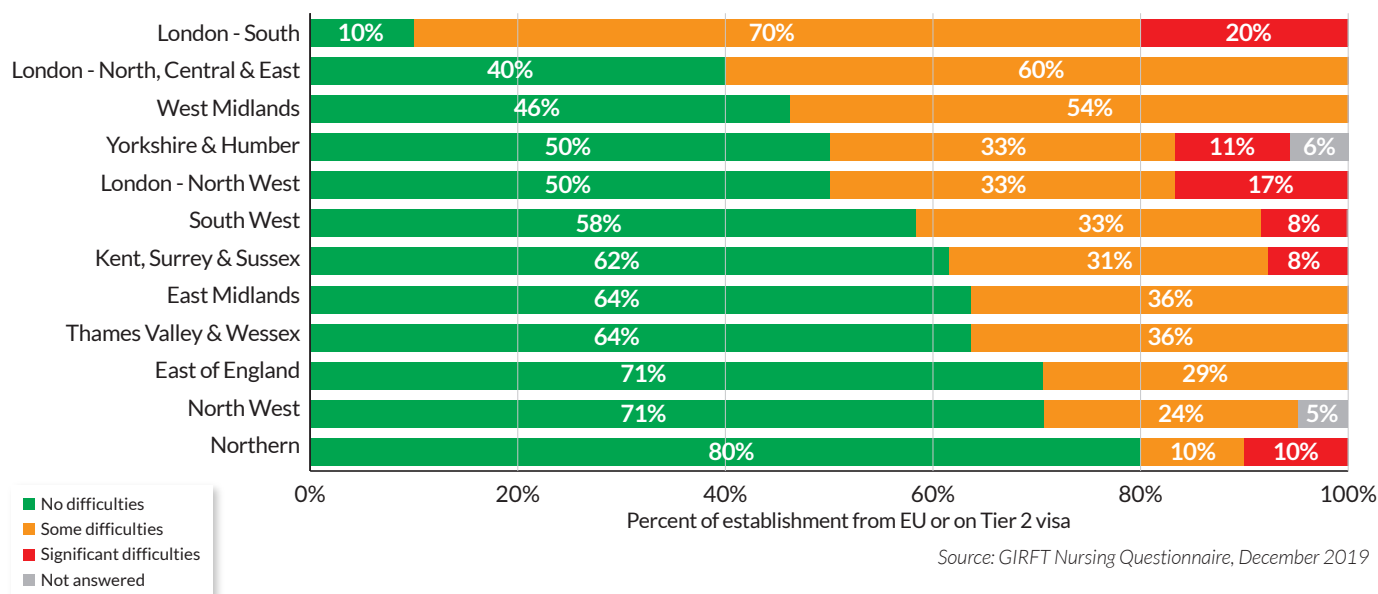
- *"If the way we are discussing things at the study days and we are able to interact as a Network it's like a model for how we want it to be at work, like its encouraged for you to challenge things and interact with each other and do anything just for the best of the babies and their families. I feel we could take that back more to the workplace."*
- *"Being on the programme was fantastic, I was very well supported, and my Preceptor was always encouraging. My confidence with caring for the babies and family increased."*
- *"Now I feel more confident that I've got the basics and keen to go on to QIS and learn more."*
- *"I think that all neonatal nurses should have the opportunity to work in a level 2 and 3 units in order to develop a different mixed of skills that contributes to self-confident, competent and skilled neonatal nurses."*

## Qualification in speciality (QIS)

HEE worked with an external partner to complete an independent review of the neonatal Qualification in Speciality (QIS), published in June 2021.<sup>62</sup> Key findings from the report highlight a lack of standardisation in both access to funding for the neonatal QIS across the country and the principle QIS content offered to services in different regions. With no professional regulation or monitoring of the content or qualification, the quality, consistency and transferability of the neonatal QIS training is not robust. There are 9 recommendations from the report setting out the need for improved consistency in offer and oversight at a national level with key stakeholders involved. It is acknowledged within the recommendations of the report the need for the neonatal QIS offer to sit within a wider piece of work to understand the career framework of the neonatal nurse to support retention.

Access to QIS funding was also a significant problem highlighted in some of the deep-dive visits. GIRFT data demonstrates significant regional variation in access to funding for QIS placements (particularly in South London) and more difficulties with funding access in NICUs compared with LNUs and SCUs (see **Figure 34** and **Figure 35**).

**Figure 34: Proportion of units with access to funding for Qualified in Speciality (QIS) training placements by ODN**



<sup>62</sup> HEE (2021), Neonatal QIS Review <https://www.hee.nhs.uk/our-work/maternity/neonatal/neonatal-qualified-specialty-qis-education-training-review>  
<https://www.hee.nhs.uk/our-work/maternity/neonatal/neonatal-qualified-specialty-qis-education-training-review>

**Figure 35: Access to funding for Qualified in Speciality (QIS) training placements by unit designation**



QIS for neonatal nurses is a role-essential qualification. Standards around this qualification and access to it must be equitable and sustainable, with clear assurance around the competence and transferability of skills of the nurse following completion of the course. A lack of remuneration following completion of this specialist qualification remains a barrier for some staff. The HEE QIS review goes some way to defining the problems and recommending further work to be undertaken with national focus to find sustainable solutions. Neonatal ODNs and key workforce groups such as the NNA and RCN must be involved in the ongoing work to ensure this moves at pace.

### Advanced and enhanced neonatal nursing qualifications (ANNP/ENNP)

A recognised career pathway for neonatal nurses is to the advanced nurse practitioner role. Whilst at times this can be seen as progression that moves experienced neonatal nurses from the nursing realm to more medical roles, it is important to see the MDT benefits of this experienced and stable workforce, supporting clinical safety, education, research and leadership to enhance the wider quality and safety of the service. However, it is important to note that ANNPs working on the medical rota and covering shifts on tier 1 or 2 rotas must be paid from the medical budget, not the nursing budget. Lack of clarity regarding payment streams may lead to falsely elevated nurse staffing establishments and staffing numbers and this must be avoided.

#### GIRFT key findings:

- 45% of units have ANNPs, with 38% of ANNPs working on tier 1 and 28% on tier 2 medical rotas.
- 300+ WTE ANNPs are working across all neonatal units, the majority in NICUs.
- 57% of units plan to train or employ more ANNPs in the next two years.
- 23.7 WTE ENNPs are in post and only 11% units plan to train or employ more in the next two years.
- There is significant regional variation in access to training and funding for ANNP/ENNPs.

Across the 156 neonatal services nationally, 70 services utilise the ANNP role, most commonly on the tier 1 (60 units) and tier 2 (38 units) rotas. There are more than 300 WTE ANNPs working across all services, the majority of which are in NICUs. More than half of units, and 84% of NICUs, have plans to train or employ ANNPs in the next two years. Whilst it is good news that many services plan to support further recruitment to this role, deep-dive visits have highlighted that there are problems with regional variation in access to training and funding, which has led to the depletion of charitable funds in some areas to establish ANNP teams. Inequitable funding also causes significant difficulties for retention of staff in those units/regions that are less able to access support.



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Sustainable funding and equitable access to training is vital to support this important role within services, supporting career development and staff retention. The training and development of ANNP teams undoubtedly improves the safety of neonatal services and there should be national focus on understanding the potential of sustainable funding streams to protect this. The potential of an apprenticeship model for the training of ANNPs with access to trust apprenticeship levy funding to ensure sustainable access has been achieved in the Northern region and could be modelled in other networks.

## IN PRACTICE

### Use of apprenticeship model for training ANNPs

#### South Tees Hospitals NHS Foundation Trust

South Tees Hospitals NHS Foundation Trust had previously had some specific funding from HEE to train ANNPs but following the introduction of the ACP (advanced clinical practice) apprenticeship, the trust used this model to support ANNP training.

The trust was sent a link from local HEE to apply for a place (in this case it was the ACP course at Sheffield that had been previously experienced). The link asks questions around the role and whether a job description is in place and the appropriate training opportunities as well as specifically skilled individuals to supervise.

There was also a local process within the trust where the ACP places are recorded centrally, and specific checks and balances are in place to make sure that the process runs smoothly. This included ensuring posts had been approved and were in budget, a clear job description available, a competitive interview took place and there was a plan around what the funding would be spent on. In the trust's case, funding was for travel and accommodation for students to travel to Sheffield and the course fees.

Overall, the trust found the process straightforward and would recommend it, providing all the essential elements above are included and local support is available.

The Enhanced Neonatal Nurse Practitioner (ENNP) role is less well recognised nationally with only a handful of institutions offering this course. This is demonstrated within the data with only 23.7 WTE in post nationally, and only 11% of units looking to train/recruit to this role over the next two years.

The ENNP role offers an important transition role for the QIS nurse to move towards the more senior ANNP roles and its wider responsibilities. The ENNP role could fit well within a career structure for neonatal nurses to support recognition for their enhanced skills and commitment to neonatology (**Figure 39, Appendix A**).

## IN PRACTICE

### Summary of clinical pathways for neonatal nurses

#### University Hospitals Plymouth NHS Trust

The NICU at Plymouth provides neonatal nurse career pathway opportunities aligned to those published within the Toolkit for High-Quality Neonatal Services. The clinical career pathway flows from junior nurse to nurse consultant, and within the trust there are clearly defined academic requirements and job roles to reflect this progressive professional development.

This was achieved through the development of academic partnership modules with the University of Plymouth for QIS, ENNP and ANNP. In addition, the ENNP module was embedded within the MSc ANNP pathway to enable a seamless transition to ANNP, supporting nurses to develop within a clearly defined ENNP role prior to undertaking advanced practice, making succession planning more structured and manageable. The accreditation of the MSc ANNP as a work-based master's degree (apprenticeship) enables the funding for academic elements to be accessed via the trust levy budget.

To effectively manage the recruitment and ongoing development of ENNPs and ANNPs, there is an established nurse management structure with a nurse consultant taking the lead and a lead ANNP controlling the ENNP/ANNP budget. This ensures all posts are appropriately managed, appraised and developed in line with job descriptions and service line requirements. In addition, this enables shifts to be rostered within a structured format to support the medical rota, rather than to fill medical rota gaps and ensures that non-clinical time is appropriately allocated. Thus, roles can be fulfilled, morale and motivation are enhanced and recruitment and retention are improved.

## Career structure

There is currently no clear career structure described within neonatal nursing that is shared and used to encourage staff to begin a career in neonatal care. This has an impact on both the ability to recruit into the specialty, but also to retain staff who do not see further financially supported routes to develop their career after achieving QIS.

What is encouraging is the national focus on the support for structured career progression within nursing. Several documents have sought to provide some structure to the neonatal career pathway.<sup>63,64,65</sup> Work is underway, in collaboration with the NNA, to develop an example of what a career structure within neonatal nursing could include (see **Figure 36** to **Figure 43** in **Appendix A**). This example structure includes suggested banding levels for different elements of the career structure in line with current vacancies, the ANNP career framework and a national call for recognition of the neonatal QIS within banding following consolidation. Whilst this framework currently feels aspirational, without some clear structure to the progression available within a neonatal nursing career, recruitment and retention will remain an obstacle to safe and sustainable staffing. With the correct education strategy and standardised competency framework many elements of the demonstrated career structure suggested here are achievable. Such a structure requires commitment both from those within neonatal care to continuously develop members of the team, as well as a national focus on what is required behind such a structure to ensure it is sustainable, funded and meets the needs of the future neonatal team to support recruitment and retention and a satisfied workforce providing quality expert care. The NNA and national lead nurse group should support work around the realisation of such a structure and the ODN workforce and education roles would be well-placed to support work around this, and the education offer required behind it, in collaboration with HEE.

An apprenticeship model could lend itself well to the progressive steps of many elements of the neonatal career pathway and this should be investigated at a national level by the neonatal workforce and education leads to understand the true potential of sustainable training via this route.

<sup>63</sup> Department of Health (2009) Toolkit for High Quality Neonatal Services <http://www.londonneonatalnetwork.org.uk/wp-content/uploads/2015/09/Toolkit-2009.pdf>

<sup>64</sup> BAPM (2021), *Advanced Neonatal Nurse Practitioner Capabilities Framework*  
[www.bapm.org/resources/300-advanced-neonatal-nurse-practitioner-capabilities-framework](http://www.bapm.org/resources/300-advanced-neonatal-nurse-practitioner-capabilities-framework)

<sup>65</sup> Royal College of Nursing (forthcoming) *Career, Education and Competence Framework for Neonatal Nursing in the UK*

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## Multidisciplinary team development – nurse associates and assistant practitioners

Nationally a total of 172 WTE nurse associates (NAs) and assistant practitioners (APs) are in post, either working or in training. The nurse associate role is a new addition to the workforce with nurse associates being added to the NMC register in 2019. Of neonatal services, 20% have nursing associates with a further 36% planning to recruit within the next two years. There are 60.7 WTE nurse associates currently in training out of 93 WTE employed across neonatal services. The Dinning tool includes this valuable workforce within its calculations where these roles are utilised for direct clinical care. The development of nurse associate courses will help to support this role in establishing itself within neonatal services, with local work needed around neonatal-specific competencies and how the role can be utilised in different services.

### GIRFT key findings:

- 20% of units have nursing associates (NAs).
- 36% of units plan to recruit NAs within the next two years.
- 14% of units have assistant practitioners (APs).
- 12% of units plan to recruit APs within the next two years.

### IN PRACTICE

## Nursing associates

### Evelina London Children's Hospital

The Evelina London Children's Hospital is already in the process of supporting the training of two nursing associates with the aim for succession planning for nursery nurse roles and to support the development of a transitional care area within the post-natal ward.

By facilitating neonatal/paediatric heavy placements during the training, the aim is to develop the necessary clinical skills to be able to care for babies who require special and/or transitional care. The long-term goal is to train a further four to six nursing associates, in partnership with maternity, so that they can work in rotation between the special care nurseries and transitional care.

The assistant practitioner role is more established with 14% of neonatal services having assistant practitioners and a further 12% planning to recruit within the next two years. There are fewer assistant practitioners in training (12.5 WTE out of a total of 79.0 WTE in training or in post). It is possible this role will become less favoured as it is an unregistered role, the registered NA role may prove to be the role of choice for the future. Local teams must ensure these valued members of the team with a wealth of experience are not left behind within the MDT.

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## Allied health professionals, pharmacy and psychology

### Education and training

With limited formal training currently available for SLTs, physiotherapists and OTs, AHPs seeking to develop a career in these specialities within neonates is challenging. Dietetics have robust postgraduate training with two MSc modules with neonatal training – one for SCU/LNU care and one for NICU/surgical care linked to the British Dietetic Association competencies for neonatal dietitians.

There are national specialist neonatal working groups for each of AHPs, pharmacists and psychologists. Each of the AHP specialities and pharmacy have competencies or practice guidelines in place for working in neonates, which support continuing professional development and provide a structure for clinical supervision. There are close working links between the AHP groups with annual joint study days for teaching, sharing current research and networking.

HEE is currently working with the national AHP working groups to develop a structured career pathway in neonates with associated training and accreditation. This will help raise the profile of a speciality within neonates, creating rotational opportunities for more junior staff as well as extending beyond a specialist level of competency to consultant level posts. This will ensure attractive and long-term career choices.

#### IN PRACTICE

### Establishing a wider AHP neonatal team through secondment and sharing of clinical expertise

#### King's Health Partners and Evelina London Children's Hospital

King's College NHS Foundation Trust (KCH) and Evelina London Children's Hospital (ELCH) agreed a secondment of a Band 8a occupational therapist (OT) for a year in 2014/15 from ELCH to KCH. The role was to lead KCH's OT paediatric team due to there being a vacancy in the lead post. As part of the secondment, a review of the neonatal AHP service was carried out and a risk assessment highlighted the need for OT and physiotherapy.

A business case was supported for 0.5 WTE OT and 0.5 WTE physiotherapist. The seconded OT lead worked with the paediatric OT and physiotherapist to upskill and educate in neonatal care and formed a wider AHP multidisciplinary team. A new lead OT was then recruited by the seconded OT and the service was handed over. Following this, OT, physiotherapy and SLT service provision to the neonatal unit has been increased further.

### Network AHP and psychology provision

All networks need to include representation for AHPs, psychology and pharmacy on their network board. Currently only two out of ten (20%) ODNs include a board member from any of these specialities. These specialities bring different voices and expertise to the network board to inform network work plans, clinical improvement, workforce development and education. The NHS Long Term Plan funding will be used to support network roles for AHPs and psychology. These will be a valuable resource for developing regional peer support and education as well as advocating for AHPs and psychology support services at national, network and trust level.

## IN PRACTICE

### Development of AHP network roles

#### West Midlands Operational Delivery Network

The allied health professional (AHP) network roles within the West Midlands Operational Delivery Network comprises speech and language therapy, respiratory physiotherapy and dietetics. They are hosted through SLAs with Birmingham Women's and Children's NHS Foundation Trust enabling professional supervision and appraisal. The team are available to all network units equally to deliver support, advice and training either as a team or individually. This visibility coupled with their expertise and an enthusiasm for improving care means they are held in high regard across the network.

This team works collaboratively to deliver AHP services focused on four main areas:

- Developing and disseminating standardised collaborative guidelines to support best practice.
- Identifying training needs, developing and delivering multi-professional standardised education programmes along with supporting resources for parents and staff.
- Providing expert advice, challenging poor practice and sharing good practice across the network
- Ensuring AHP roles are included in network work plans and strategy groups and supporting recruitment, training and retention of AHP staff.

## IN PRACTICE

### Clinical psychology network role project

#### Thames Valley and Wessex Operational Delivery Network

Thames Valley and Wessex are piloting for one year a Consultant Clinical Psychologist network role, as part of a project to scope and improve psychological care, mental health outcomes and wellbeing of parents, babies, and staff of neonatal units across the network.

The following outcomes support the goals of the NHS Long Term Plan, the recommendations of the NCCR and the increased mental health issues arising from the COVID-19 pandemic:

- Develop an up-to-date service map with clearly identified pathways to local support where available.
- Develop standardised protocols to assist staff in seeking the right support at the right time for families on the unit.
- Develop an agreed mechanism for case discussion / case planning with individual units and perinatal mental health services which can be audited and reviewed.
- Work across different organisations and teams, including ensuring that supervision provision is in place for the psychological work carried out by other professionals, staff support and joint clinical work with other professionals within neonatal units.
- Develop a rolling programme of teaching and training to staff on perinatal and infant mental health to reinforce skills and update knowledge.
- Undertake research, service evaluation and audit projects to provide a consistent approach to evaluating the family experience across all units.
- Work at clinical service, trust, and network level to develop policies, procedures or interventions that enhance the quality of psychological and physical care given to infants, parents, and staff. This includes the development of new psychological services based on recommendations of national service frameworks which affect the quality of psychological care which health care professionals provide.

## Appendix A: Supplementary workforce data

### Compliance with BAPM standards

**Table 5: NICUs - compliance with BAPM standards**

Weekday	BAPM standards	All NICU (%)	<2000IC (%)	≥2000IC (%)
Standards for ALL NICUs	Tier 1 separate rota compliance	100%	100%	100%
	Tier 2 separate rota compliance	98%	94%	100%
	Tier 3 separate rota compliance	100%	100%	100%
	Tier 3 12 hours per day	60%	25%	83%
Activity based standards	Tier 1 compliant if ≥7000 deliveries	100%	N/A	100%
	Tier 2 rota x2 24/7 if ≥2500 IC/year	76%	N/A	76%
	<b>Proportion meeting ALL relevant standards</b>	<b>50%</b>	<b>19%</b>	<b>71%</b>

Weekend	BAPM standards	All NICU (%)	<2000IC (%)	≥2000IC (%)
Standards for ALL NICUs	Tier 1 separate rota compliance	100%	100%	100%
	Tier 2 separate rota compliance	98%	94%	100%
	Tier 3 separate rota compliance	100%	100%	100%
	Tier 3 12 hours per day	49%	18%	71%
Activity based standards	Tier 1 compliant if ≥7000 deliveries	100%	N/A	100%
	Tier 2 rota x2 24/7 if ≥2500 IC/year	67%	N/A	67%
	<b>Proportion meeting ALL relevant standards</b>	<b>39%</b>	<b>18%</b>	<b>54%</b>

Source: BadgerNet, RCPC Snapshot Survey, GIRFT Clinical Services Questionnaire, December 2019

**Table 6: LNUs - compliance with BAPM standards**

Weekday	BAPM standards	All LNUs (%)	<1000IC/HD (%)	≥1000IC/HD (%)
Standards for ALL LNUs	Tier 1 separate rota compliance 24/7	56%	17%	80%
	Tier 2 separate rota 12 hrs/day	49%	10%	74%
Activity based standards	Tier 2 rota 24/7 (≥600 IC/≥1500RC/year)	65%	N/A	65%
	Tier 3 separate rota (≥750 IC/≥2000 RC/year)	75%	N/A	75%
	<b>Proportion meeting ALL relevant standards</b>	<b>29%</b>	<b>3%</b>	<b>46%</b>

Weekend	BAPM standards	All LNUs (%)	<1000IC/HD (%)	≥1000IC/HD (%)
Standards for ALL LNUs	Tier 1 separate rota compliance	55%	17%	78%
	Tier 2 separate rota 12 hours/day	53%	7%	72%
Activity based standards	Tier 1 compliant if ≥7000 deliveries	100%	N/A	100%
	Tier 2 rota 24/7 (≥600 IC/≥1500RC/year)	65%	N/A	65%
	Tier 3 separate rota (≥750 IC/≥2000 RC/year)	75%	N/A	75%
	<b>Proportion meeting ALL relevant standards</b>	<b>27%</b>	<b>7%</b>	<b>39%</b>

Source: BadgerNet, RCPC Snapshot Survey, GIRFT Clinical Services Questionnaire, December 2019

**Table 7: SCUs - compliance with BAPM standards**

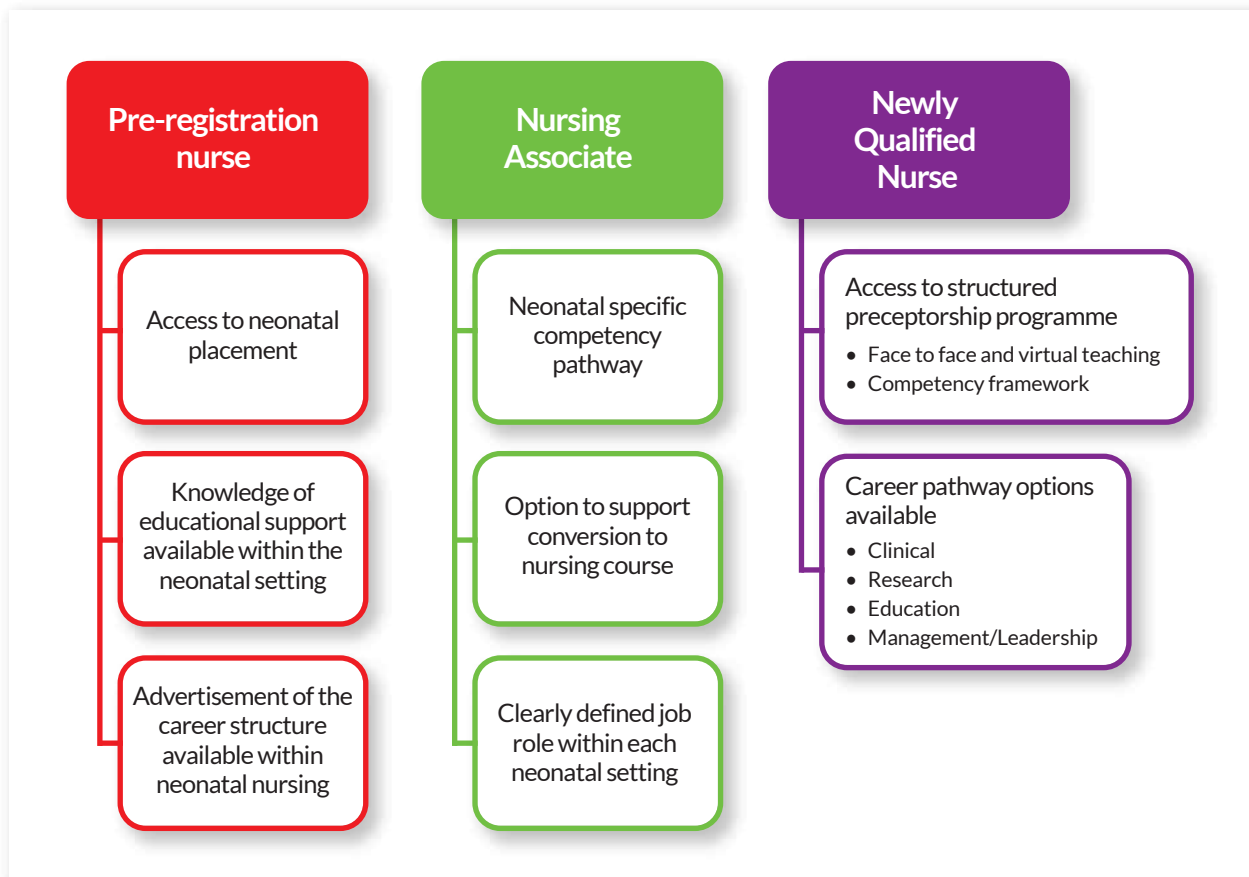
Weekday	BAPM standards	All LNUs (%)
Standards for ALL SCUs	Tier 1 4-6 hours separate cover	84%
Activity based standards	Tier 1 separate rota 24/7 ( $\geq 365$ RC/year)	42%
	Tier 2 separate rota 12 hours/day	25%
	<b>Proportion meeting ALL relevant standards</b>	<b>45%</b>

Weekend	BAPM standards	All LNUs (%)
Standards for ALL SCUs	Tier 1 4-6 hours separate cover	
Activity based standards	Tier 1 separate rota 24/7 ( $\geq 365$ RC/year)	33%
	Tier 2 separate rota 12 hours/day	33%
	<b>Proportion meeting ALL relevant standards</b>	<b>61%</b>

Source: BadgerNet, RCPCH Snapshot Survey, GIRFT Clinical Services Questionnaire, December 2019

## Nursing career framework

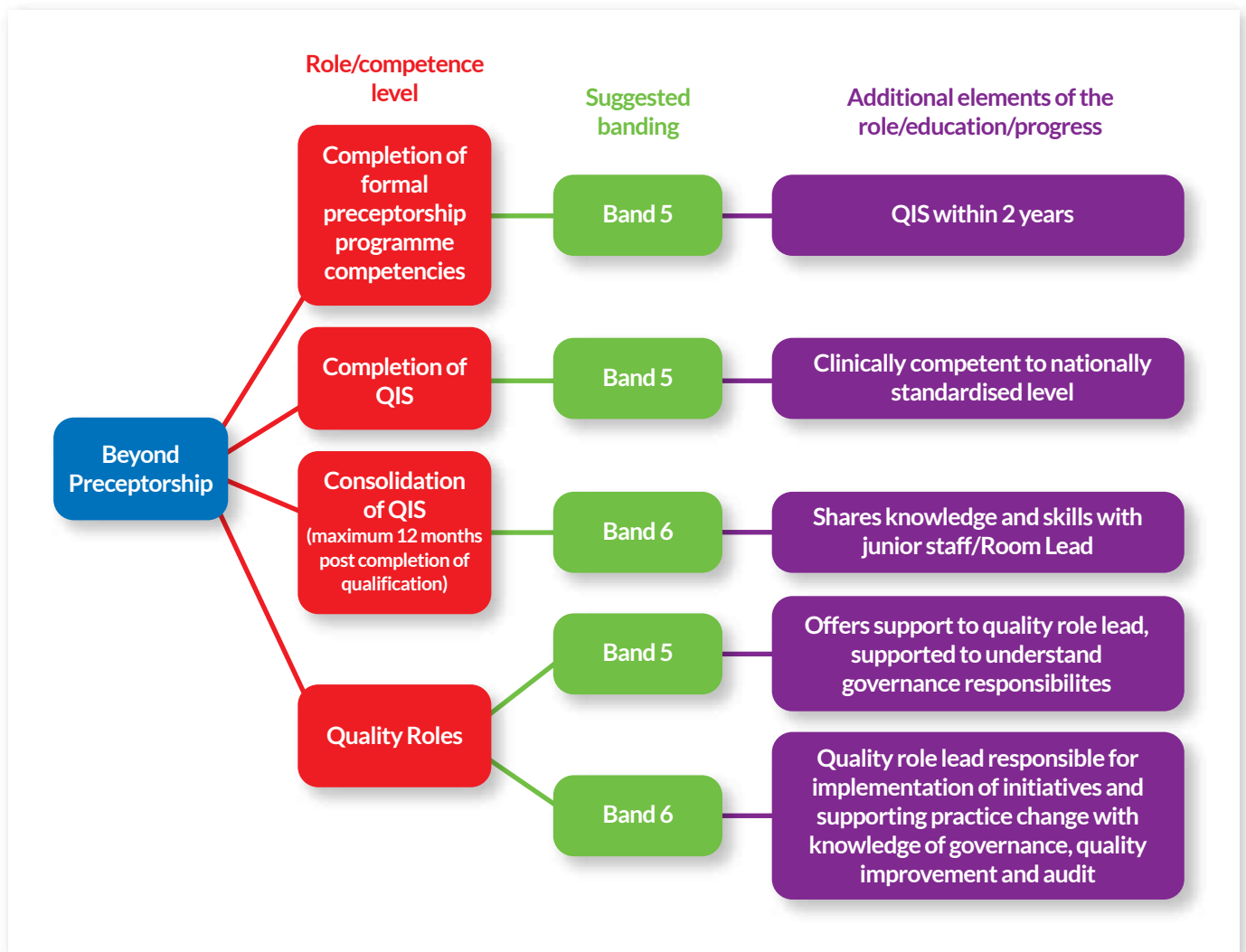
Figure 36: Routes into neonatal care



Source: GIRFT in collaboration with NNA

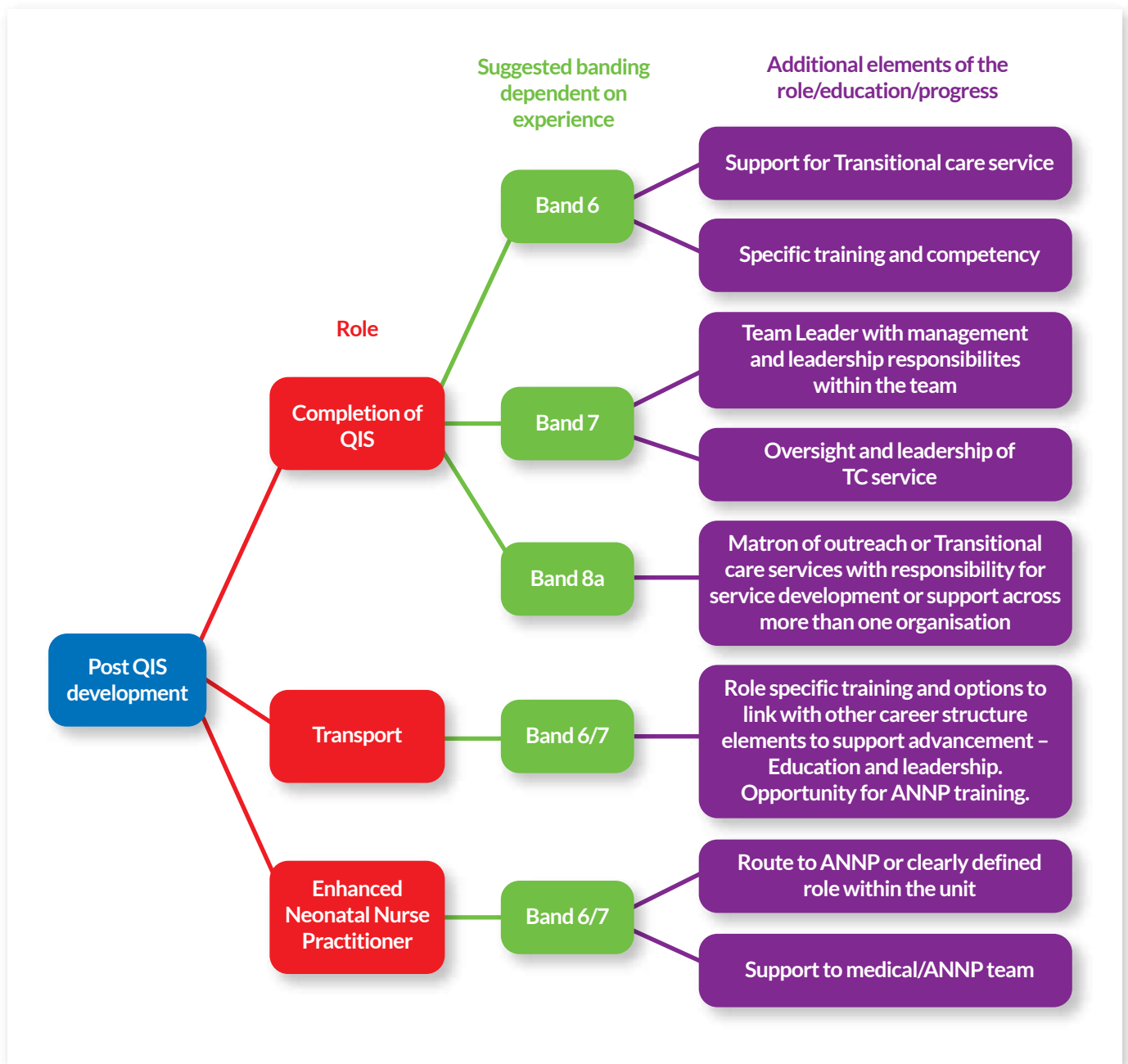


Figure 37: Early neonatal career



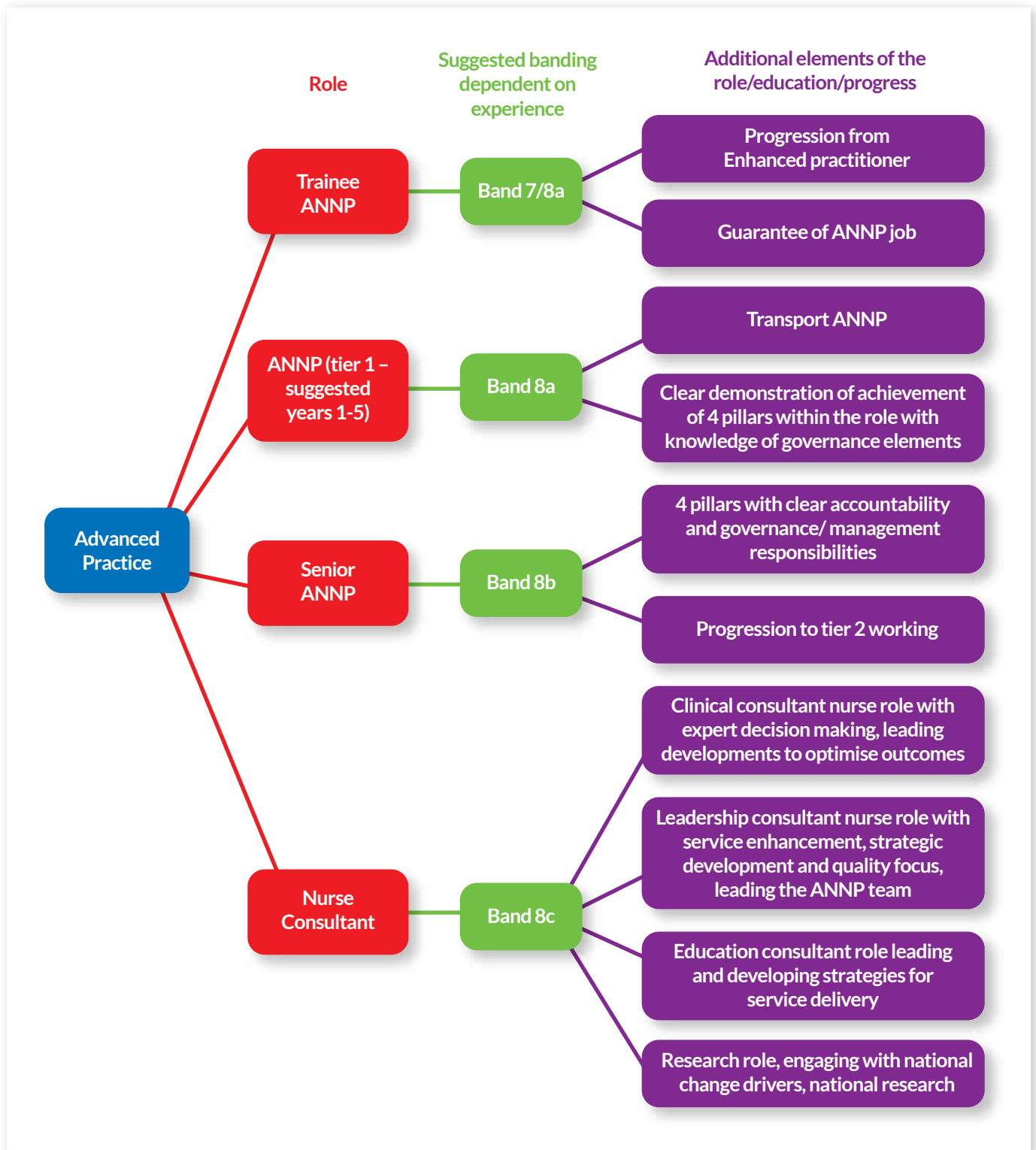
Source: GIRFT in collaboration with NNA

Figure 38: Advancing neonatal career



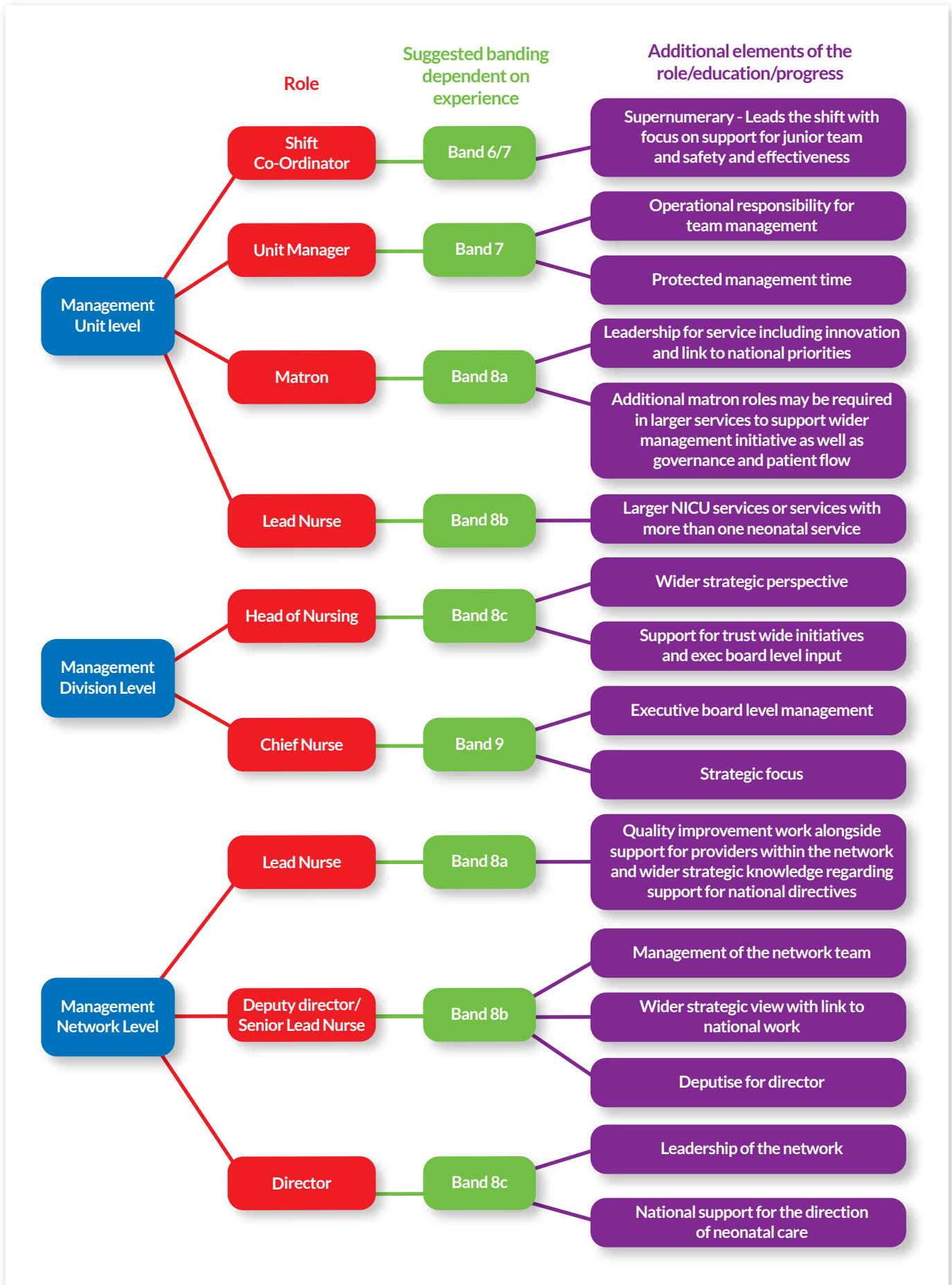
Source: GIRFT in collaboration with NNA

Figure 39: Advanced clinical practice



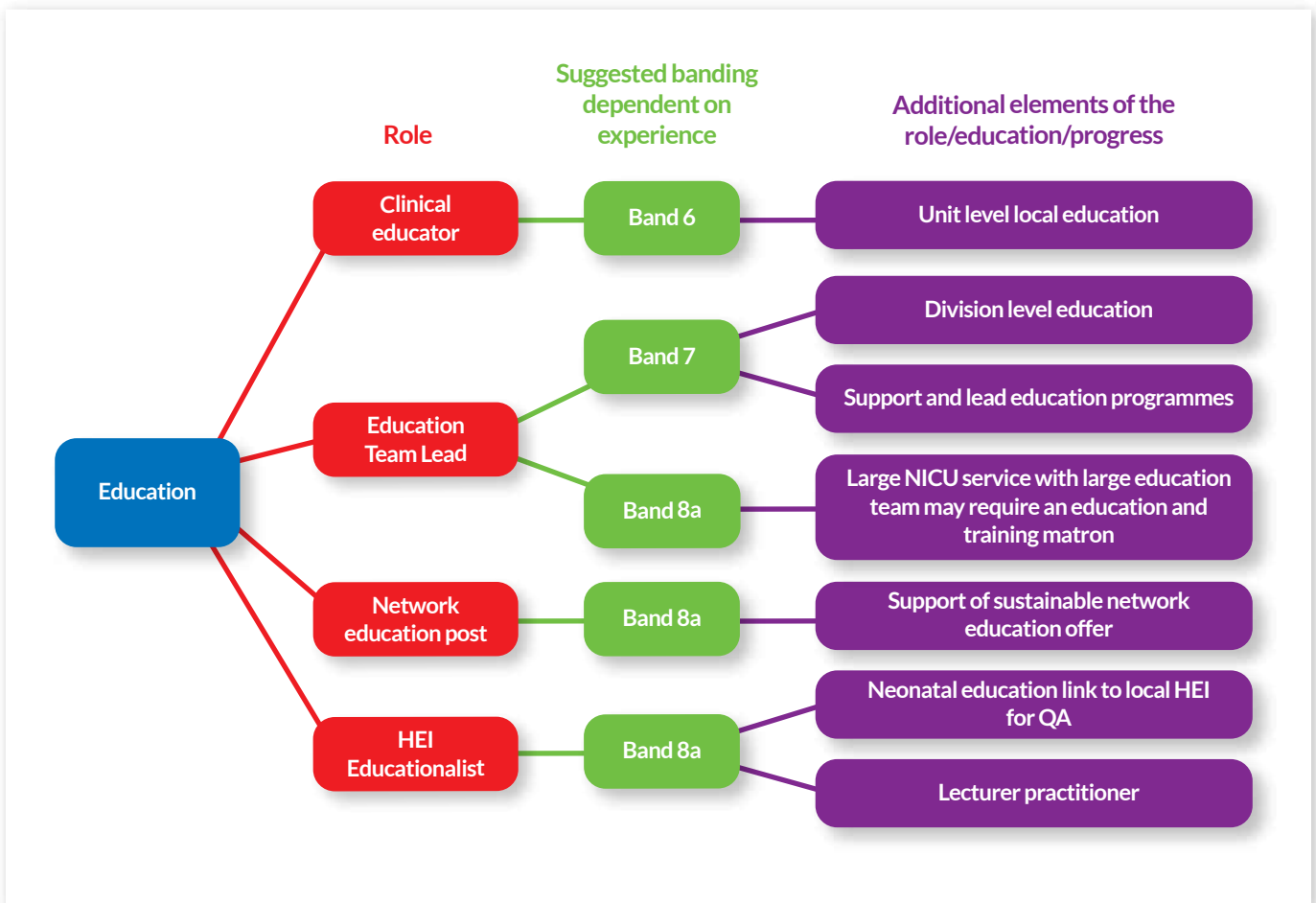
Source: GIRFT in collaboration with NNA

Figure 40: Neonatal management career



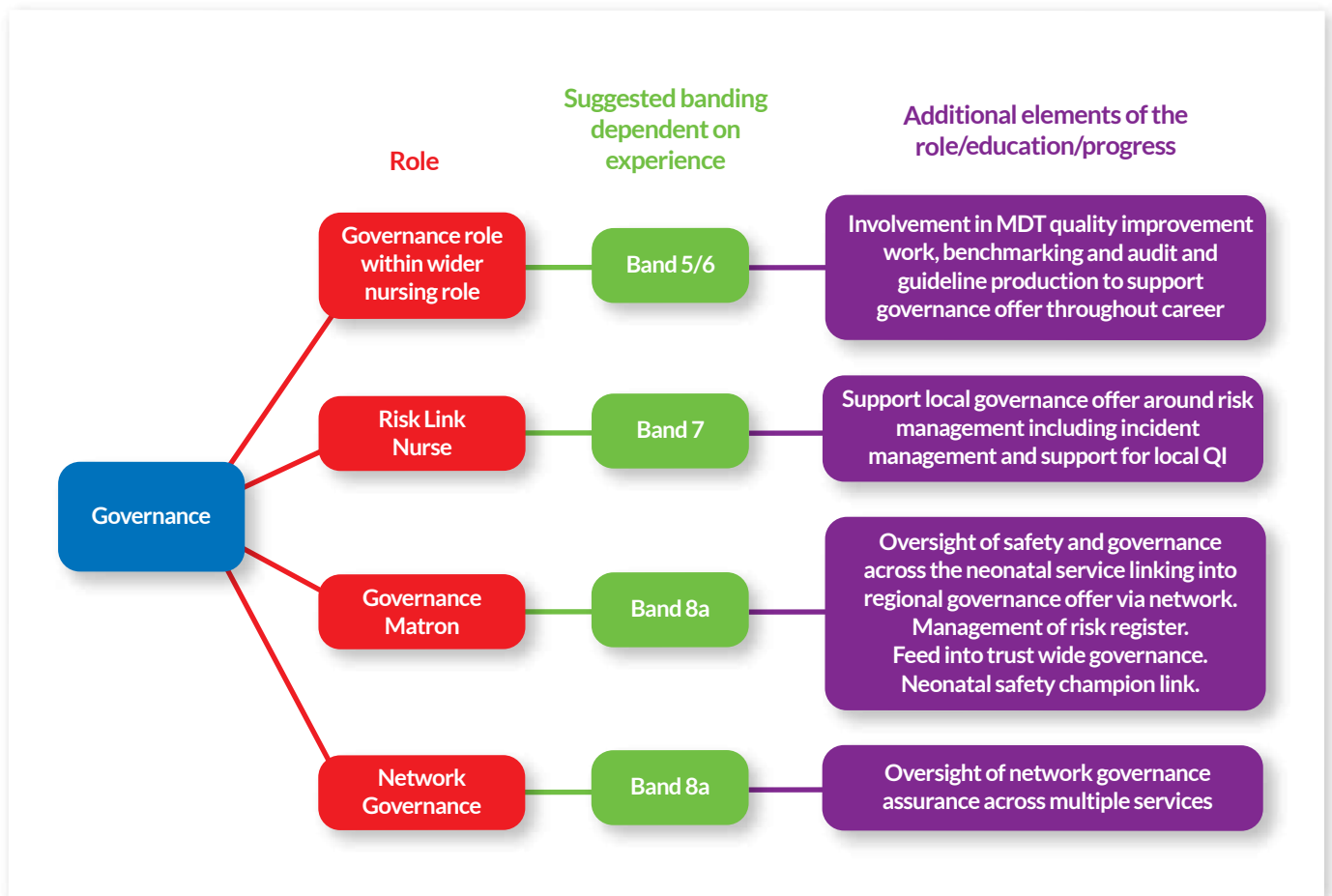
Source: GIRFT in collaboration with NNA

Figure 41: Neonatal educational career



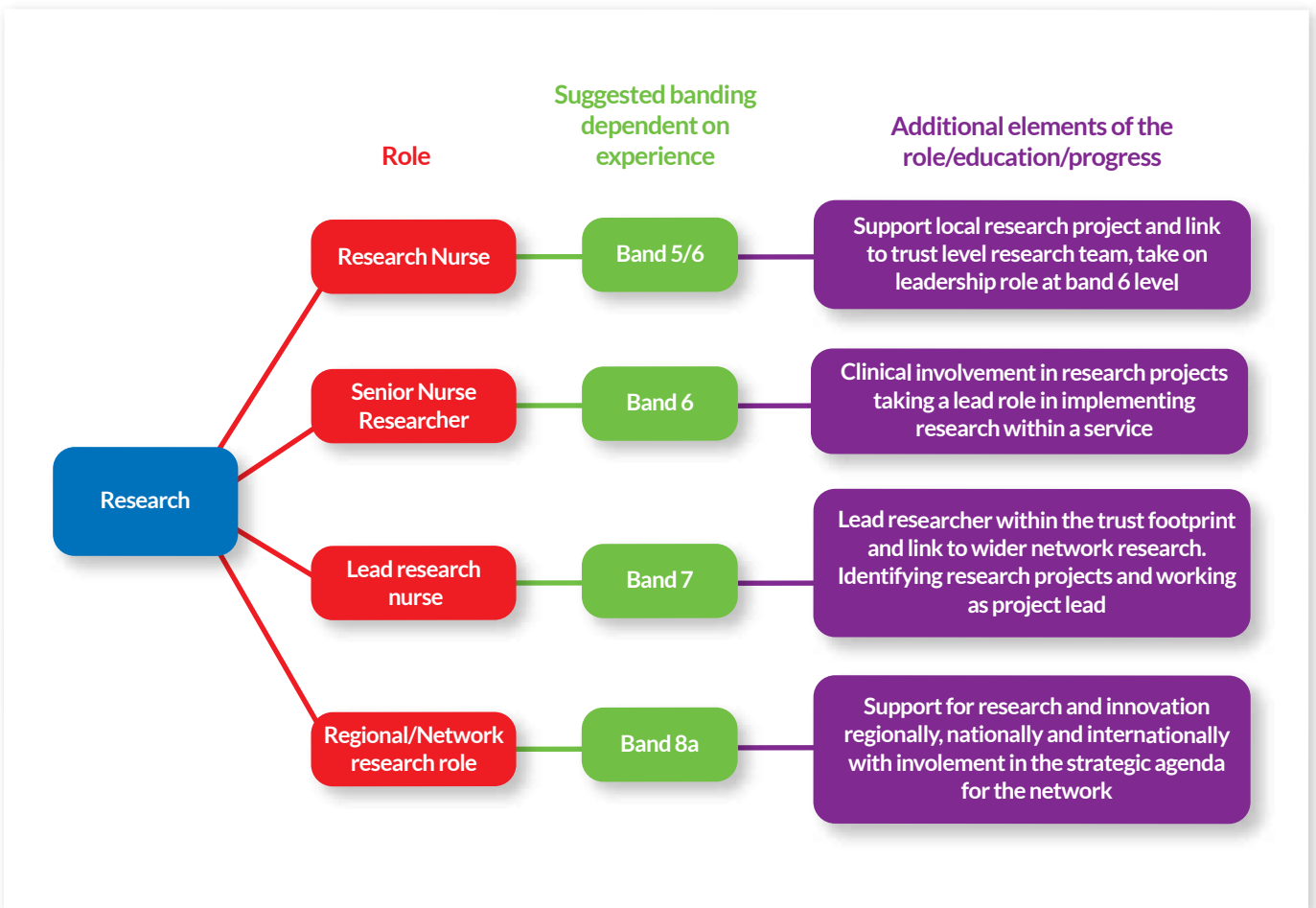
Source: GIRFT in collaboration with NNA

Figure 42: Wider neonatal career opportunities - governance



Source: GIRFT in collaboration with NNA

Figure 43: Wider neonatal career opportunities - research



Source: GIRFT in collaboration with NNA

# About the GIRFT programme

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Getting It Right First Time (GIRFT) is a national programme designed to improve treatment and care by reviewing health services. It undertakes clinically-led reviews of specialties, combining wide-ranging data analysis with the input and professional knowledge of senior clinicians to examine how things are currently being done and how they could be improved.

Working to the principle that a patient should expect to receive equally timely and effective investigations, treatment and outcomes wherever care is delivered, irrespective of who delivers that care, GIRFT aims to identify approaches from across the NHS that improve outcomes and patient experience, without the need for radical change or additional investment. While the gains for each patient or procedure may appear marginal, they can, when multiplied across an entire trust – and even more so across the NHS as a whole – deliver substantial cumulative benefits.

The programme was first conceived and developed by Professor Tim Briggs to review elective orthopaedic surgery to address a range of observed and undesirable variations in orthopaedics. In the 12 months after the pilot programme, it delivered an estimated £30m-£50m savings in orthopaedic care – predominantly through changes that reduced average length of stay and improved procurement.

The same model has been applied in more than 40 different areas of clinical practice. It consists of four key strands:

- a broad data gathering and analysis exercise, performed by health data analysts, which generates a detailed picture of current national practice, outcomes and other related factors;
- a series of discussions between clinical specialists and individual hospital trusts, which are based on the data – providing an unprecedented opportunity to examine individual trust behaviour and performance in the relevant area of practice, in the context of the national picture. This then enables the trust to understand where it is performing well and what it could do better – drawing on the input of senior clinicians;
- a national report, that draws on both the data analysis and the discussions with the hospital trusts to identify opportunities for improvement across the relevant services;
- an implementation phase where the GIRFT team supports providers to deliver the improvements recommended.

## GIRFT and other improvement initiatives

GIRFT is part of an aligned set of workstreams within NHS England and NHS Improvement. It is the delivery vehicle for one of several recommendations made by Lord Carter in his February 2016 review of operational efficiency in acute trusts across England.

The programme has the backing of the Royal Colleges and professional associations and has a significant and growing presence on the Model Hospital portal, with its data-rich approach providing the evidence for hospitals to benchmark against expected standards of service and efficiency. The programme also works with a number of wider NHS programmes and initiatives which are seeking to improve standards while delivering savings and efficiencies.

## Implementation

GIRFT has developed an implementation programme designed to help trusts and their local partners to address the issues raised in trust data packs and the national specialty reports to improve quality. The GIRFT team provides support at a local level through the NHS England regional teams, advising on how to reflect the national recommendations into local practice and supporting efforts to deliver any trust specific recommendations emerging from the GIRFT visits. GIRFT also helps to disseminate best practice across the country, matching up trusts who might benefit from collaborating in selected areas of clinical practice. Through all its efforts, local or national, the GIRFT programme strives to embody the ‘shoulder to shoulder’ ethos that has become GIRFT’s hallmark, supporting clinicians nationwide to deliver continuous quality improvement for the benefit of their patients.



# Glossary

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**AHP**

Allied health professional

**ANNP**

Advanced neonatal nurse practitioner

**APCP**

Association of Paediatric Chartered Physiotherapists

**BAPM**

British Association of Perinatal Medicine

**CNST**

Clinical negligence scheme for trusts

**CRG**

NHSE clinical reference group

**ENNP**

Enhanced neonatal nurse practitioner

**HD**

High dependency

**HEE**

Health Education England (a Non-Departmental Public Body. It supports the delivery of excellent healthcare and health improvement to the patients and public of England by ensuring that the workforce of today and tomorrow has the right numbers, skills, values and behaviours, at the right time and in the right place)

**ICS**

Integrated care system (NHS organisations that, in partnership with local councils and others, take collective responsibility for managing resources, delivering NHS care, and improving the health of the population they serve)

**IQR**

Interquartile range

**LNU**

Local Neonatal Units provide short-term intensive care (1-2 days); and high dependency/special care and transitional care services for their local populations

**MDT**

Multidisciplinary team - a team of healthcare professionals from different disciplines

**MRCPCH**

Member of the Royal College of Paediatrics and Child Health

**NCCR**

NHS England Neonatal Critical Care Transformation Review published December 2019

**NICU**

Neonatal Intensive Care Units (NICUs) provide intensive care for the smallest and sickest babies across the whole region, in addition to high dependency, special care and transitional care for their local population

**NIPE**

Newborn and infant physical examination – a screening programme that screens newborn babies within 72 hours of birth, and then once again between 6 and 8 weeks for conditions relating to their heart, hips, eyes and testes

**NNA**

Neonatal Nurses Association

**NNAP**

National Neonatal Audit Programme

**NPPG**

Neonatal Paediatric Pharmacy Group

**ODN**

Operational delivery networks, which are focused on coordinating patient pathways between providers over a wide area to ensure access to specialist resources and expertise

**PN**

Parenteral nutrition

**QIS**

Qualification in specialty

**RCPCH**

Royal College of Paediatrics and Child Health

**SCU**

Special Care Units (SCUs) provide special care and transitional care for their local population

**TPN**

Total parenteral nutrition

**WTE**

Whole time equivalent

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Bringing this report to fruition has been a team effort and I am grateful to all the people who contributed.

Firstly, to my fabulous GIRFT team:

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**Dr Eleri Adams**

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For more information about GIRFT,  
visit our website: [www.GettingItRightFirstTime.co.uk](http://www.GettingItRightFirstTime.co.uk)  
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