TABLE OF CONTENTS

Foreword 3

Introduction 6

Clinical Networks

1. Cardiac Clinical Network 9
2. Integrated Stroke Delivery Networks 23
3. Respiratory Clinical Network 40
4. Long-COVID Clinical Network 56
5. Diabetes Clinical Network 67
Foreword
The Cardiovascular Disease and Respiratory (CVDR) Networks together with the Diabetes Network is delighted to publish its 2021/22 Annual Report. This reports highlights some of the key achievements of the Networks over the last year in what has been a challenging year for health and care. Specifically, 2021/22 marked a change from a focus on the COVID-19 response to supporting our partners with recovery and planning for the future.

The CVDR Networks aim to seek regional solutions to common issues and provide sound building blocks for the transformation of pathways, as well as looking at better ways to support patients at home and optimise their treatment and outcomes.

2021/22 marks the first full year for establishment of most of the CVDR Networks and at a time when the NHS has undergone considerable challenges and changes because of the COVID-19 pandemic. Some challenges were common to all the networks, but there were also some unique opportunities.

One challenge was the setting up Networks teams and launching the Networks in a new virtual world and during times of re-deployment due to COVID-19. However, there have been opportunities for us to bring a greater range of stakeholders together in these virtual meetings and to provide more on-line webinars.

COVID-19 has continued to challenge the health system in terms of workforce and the need to reduce the backlog of patients waiting for services across all of the pathways, as well as leading to the development of Post-COVID Assessment Services and the mass vaccination programmes. The impact of the pandemic has also highlighted the importance of the Long-Term Plan objective of delivering the best care to our patients in the East of England and to supporting the recovery work.

Clinical Commissioning Groups and providers have been developing their plans to move towards becoming Integrated Care Boards and Integrated Care Systems, with potential changes in existing teams and structures. The development of these new Integrated Care Boards and Systems is a great opportunity for the Networks to develop much greater partnership working with the systems, and to share best practice and avoid duplication.

Changes within NHSE have meant that in December, the Networks moved from the Strategy and Transformation Directorate to the Medical Directorate which has enabled closer working with our Network SROs and with other clinical networks to support areas of co-production.

The latter half of the year saw the wider development of the PMO team to strengthen governance and assurance, both regionally and nationally. A network business intelligence analyst was appointed in February 2022 to work with the networks to provide robust metrics, demonstrate improvement and develop platforms for ensuring value for money.
Looking forward to 2022/23, we intend to strengthen the relationships and partnership working with our new Integrated Care Boards and Systems, identifying and prioritising local issues. We will also be developing dashboards and metrics for each of our Networks to be able to provide greater intelligence across the system and to demonstrate the impact of the work.

In addition, there will be a greater focus on engaging the patient and public voice in the shaping of our pathways, as well as targeting work on health inequalities; reducing unwarranted variation across our region; and a greater use of digital enablers to improve access to care and drive efficiency for both patients and staff.

Finally, I’d like to also express my gratitude for all the hard work and dedication that the regional Networks team and all members of the Networks have shown over the last year. I look forward to continuing work with the team, Networks, providers and partners over the next year (and beyond) to build on our initial achievements and continue to work towards improving service delivery for all patients in the East of England.
Introduction

The Cardiovascular Disease and Respiratory (CVDR) Networks, together with the Diabetes Network, cover a range of long-term conditions across full pathways of care across the East of England region.

The CVDR Networks aim to seek regional solutions to common issues and provide sound building blocks for the transformation of pathways, as well as looking at better ways to support patients at home and optimise their treatment and outcomes.

This family of networks comprises of:

1. **Cardiac Clinical Network** – which includes prevention, rehabilitation, cardiology, and cardiac surgery.

2. **Integrated Stroke Delivery Networks** – there are two Integrated Stroke Delivery Networks (ISDNs) in the East of England – North ISDN and South ISDN. The stroke and cardiac networks share the CVD prevention programme.

3. **Respiratory Clinical Network** – this Network provides leadership across the region to support to quality improvements that can be made in the diagnosis, treatment, rehabilitation and prevention of respiratory disease in the East of England.

4. **Long COVID Clinical Network** - a new network sitting within the Respiratory Network umbrella, the Long COVID network was set up in response to the emergence of Post-COVID Syndrome and the need to provide assessment and treatment services for this new condition.

5. **Diabetes Clinical Network** – this network has been in existence for some years but has recently refocused to assurance of recovery of services post pandemic as well as implementing new technologies and pathways of care.

These Networks are instrumental in delivering the triple aim of the 2021 White Paper Integration and Innovation: Working Together to Improve Health and Social Care for All.

The detailed aims of the Networks are to:

1. **Improve** sustainable outcomes in population health and healthcare.
2. **Tackle** inequalities in outcomes, experience, and access.
3. **Enhance** quality of care for patients.
4. **Increase** productivity and value for money.
5. **Help** the NHS to support broader social and economic development.

In addition, the Networks aim to provide leadership and focus across the East of England in their respective fields, bringing together multi-professional stakeholders from all providers and commissioners.

Regional Team

<table>
<thead>
<tr>
<th>Name</th>
<th>Role</th>
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<tbody>
<tr>
<td>Helena Baxter</td>
<td>Head of East of England CVDR and Diabetes Clinical Networks and Transformation</td>
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<td>Fiona Oliver</td>
<td>Deputy Head of East of England CVDR and Diabetes Networks and Transformation</td>
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<tr>
<td>Caron Tozer</td>
<td>Business Manager, East of England CVDR and Diabetes Clinical Networks</td>
</tr>
<tr>
<td>Paula Sumray</td>
<td>Business Co-Ordinator/Executive Assistant, East of England CVDR and Diabetes Clinical Networks</td>
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NHS England
East of England

6 million population
6 Integrated Care Boards
23 trusts
1. Cardiac Clinical Network

» Highlights
The Cardiac Clinical Network was established in the first quarter of 2021/22 to deliver the ambitions of the Long Term Plan to support COVID-19 recovery across the East of England region and to deliver the Cardiac Pathways Improvement Programme (CPIP) outlined by the national team.

The vision and aims of the cardiac network are to “deliver better heart health and healthcare outcomes for all”.

**NETWORK PRIORITIES FOR 2021-22**

**Long Term Plan Ambitions:**
- Increase detection of familial hypercholesterolaemia to 25%
- Greater access to echo in primary care
- Better personalised care for heart failure patients leading to reduced LOS in acute hospitals
- Improve defibrillator networks to improve survival from out of hospital cardiac arrest
- Up to 85% of patients eligible for cardiac rehabilitation accessing care

**Cardiac Pathways Improvement Programme Priorities:**
- Hypertension detection and management
- Increase access to echocardiography and reduction of backlog post-COVID 19
- Reporting and management of P2/P3 waits in cardiac surgery
- NSTEMI & STEMI treatment times
- Clinical/process changes to improve patient flow (eg 7/7 working)
- Improved access to cardiac rehab
- Heart failure pathways

This is achieved by setting the strategic direction for local cardiac services, driving operational improvement, implementing high quality, standardised pathways of care spanning prevention, diagnosis, acute and specialist treatment, rehabilitation and end of life care.
# Network Team

**Dr Robert Sherwin**  
Senior Responsible Officer, Medical Director Specialised Commissioning & Health and Justice

**Dr Tom Keeble**  
Clinical Lead, Acute Coronary Syndrome and Out-of-hospital cardiac arrest

**Dr Rebecca Schofield**  
Clinical Lead, heart failure and diagnostics

**Dr Chirag Bakhai**  
Clinical Lead, Primary Care and CVD prevention

**Diane Felstead**  
Quality Improvement Manager

**Fantacy Twagira**  
Project Support Officer

**Ryan O’Neill**  
Senior Informatics Data Analyst

**Amanda Harrington**  
Business Support Officer
"The Clinical Network has been hugely powerful in connecting Primary Care CVD Leads across the region and driving the sharing of learning, good practice and innovation.

It has acted as a conduit for collaboration on our major shared challenges, including hypertension, hypercholesterolaemia, atrial fibrillation and heart failure, with regional-level solutions being developed where this makes sense.

On a personal level, it has been a great pleasure to spread the word about previously unsung innovation taking place across the East of England and a privilege to support our systems in working together, learning from each other and making best use of the opportunities available to reduce inequalities and improve outcomes for the population."

Dr Chirag Bakhai
Primary Care Clinical Lead,
GP and Long Term Conditions Lead, BLMK
Network Performance and achievements

CVD Prevention

The Cardiac Network has a CVD Prevention Clinical Advisory Group (CAG) which meets bi-monthly and comprises of stakeholders from all 6 ICSs in the region and works in partnership with EAHSN. This CAG covers the prevention agenda for both cardiac and stroke. Their role is to update members on the work of the Network, understand challenges in each system, review regional data, share best practice and support systems to achieve national targets. The work of the CAG for 2021/22 includes;

Hypertension

- **BP@home**: involves bi-monthly steering group meetings, but also target support to systems with lower uptake and engagement with BP@home, using case studies, support from local exemplars and identification of digital tools to support self-management (see Figure 1).
- **BP Optimisation**: the network works closely with East Academic Health Science Network (EAHSN) to implement UCL Partners proactive care framework for hypertension, as part of BP@home.
- **Pharmacy Case Finding**: work with Local Professional Network to monitor data in relation to pharmacy case finding service (see Figure 2), share successes and identify challenges.

Lipid Pathways

- **Familial hypercholesterolaemia**: working in partnership with East GMSA and EAHSN to achieve the ambitions of FH detection in 25% of the population by 2023. The working group is looking at algorithms to detect high risk patients, but also has undertaken a service mapping exercise to determine the service provision for genetic testing and lipid clinics in each ICS. The next steps for this group are to explore the possibilities of a regional service for FH detection and diagnosis.

Atrial Fibrillation (AF)

- Although not one of the top priorities for the network this year, we will continue to identify areas of good practice and review data with systems and EAHSN, and run pilots with systems where possible. At the end of 2020/21, the network funded 2 systems to provide AliveCor devices to GP surgeries to improve AF detection rates.
- Part of the function of the CAG is to understand the workforce issues faced by the ICSs, particularly in primary care, and to work collaboratively to explore any alternative models and/or training that might support the recovery of CVD prevention.
Figure 1 | Rollout of BP@home - October 2021 data

Figure 2 | Patients seen by Community Pharmacy Hypertension Service 2021-22
Diagnostics

The Network works closely with other areas of diagnostics within the region, particularly the Community Diagnostic Centres (CDC) team and the diagnostics recovery teams to ensure alignment and reduce duplication. The echocardiogram backlog increased dramatically during COVID-19 and recovery has been slow (see table below). In the last quarter of 2021/22, the network engaged with the cardiac physiology network and the CPIP team to undertake a deep dive discussion on issues affecting recovery.

Following the deep dive, the network formed a task and finish group with the cardiac physiologists, the Regional Chief Healthcare Scientist, the workforce lead for Community Diagnostic Centres and Health Education England and The Leadership Academy.

The key areas of focus for this task and finish group are:

**Workforce:** training, education, leadership and apprenticeships to help build a sustainable workforce for the future in partnership with the Healthcare Scientists leads and Health Education England. The group is also exploring possibilities of region-wide international recruitment to reduce vacancies across the region.

**Capacity and demand:** we obtained a full picture of the region and identified any areas of unwarranted variation, areas of good practice and areas in need of further support (see Figure 3 and 4).

**Increasing efficiency and new ways of working:** we supported a number of pilots with some sites using different support staff, improving triage, identifying any short term solutions to reducing the backlog and looking to pilot hand-held echo with artificial intelligence later in the year (OPERA study) in conjunction with EAHSN.
Figure 3| Total waiting list, echocardiography tests, patient numbers, East of England

Figure 4| Total waiting list, echocardiography tests, patient numbers, East of England
Integrated Care Systems
Heart Failure and Breathlessness

In January 2022, the Network hosted a webinar on heart failure to launch this new workstream. An overarching steering group has been set and with three Task and Finish Groups established covering the following areas:-

**Detect**: promoting best practice in terms of early diagnosis for patients with heart failure, including echo and access to NT pro-BNP.

**Optimise**: promoting a standardised up-titration of medication to achieve optimum outcomes for patients.

**Empower and Support**: encouraging patients to be engaged and involved in their care, including use of technology, education and end of life care decisions.

A fourth Group was will be added to this pathway to support the development of virtual wards for heart failure. This will link in with the regional virtual wards team to help reduce length of stay for patients in hospital, allowing them to be cared for safely at home supported by the secondary care and community teams.

Heart failure @home is a national programme which will be adopted into the task and finish groups in 2022/23 year, using technology to enhance the optimisation of patients and reducing the need for frequent out-patient attendances.

Cardiac Rehabilitation Network

The primary focus of this Network is to bring all 24 cardiac rehabilitation services in the region together, working in partnerships with NHSEI and key partners, to support the services to increase uptake and improve outcomes. A smaller steering group meets bi-monthly to review actions from network meetings, progress ongoing pieces of work, and develop the agenda for network meetings. The main focus for 2021/22 has been the restoration of face to face rehabilitation programmes with changing COVID-19 restrictions and addressing the backlog of patients waiting for cardiac rehabilitation.

NHSE and the Clinical Policy Unit (CPU) are providing targeted funding of £7 million for Cardiac Rehabilitation in 22/23. Systems have been invited to submit bids to the national team. Bids for funding for 2022/23 will be focused around the top two priorities;

1. Support set up for rehab in areas with no current service
2. Enhance current service to increase scope to eligible groups not covered (eg develop new heart failure rehab where rehab is currently only offered to heart attack/post-surgical patients).

This will support local systems to work towards delivering the Long Term Plan ambition that by 2028 the proportion of patients accessing cardiac rehabilitation will be amongst the best in Europe, with up to 85% of those eligible accessing care.
Management of Acute Coronary Syndrome

In the last quarter of 2021/22, a steering group was formed to focus on STEMI, NSTEMI and out of hospital cardiac arrest, with key stakeholders from across the acute providers of these services;

ST-elevation Myocardial Infarction (STEMI)
The main focus has been to review data and understand the impact of ambulance delays for patients requiring time critical interventions. The group is working with the ambulance service to better identify patients requiring transfer from one hospital to another, and linking with the national team to promote a pilot in the East of England. STEMI data suggests that the process for treating patients when they reach the specialist centre is good, but that key delays are experienced in the call to door times.

Non-ST-elevation Myocardial Infarction (NSTEMI)
This focuses on the 72 hour target for patients requiring invasive cardiology intervention; many of whom are waiting in acute in-patient beds in non-PCI centres for transfer. At the end of 2021/22 three pilots were agree to be funded by the network:-

1. Mid and South Essex Hospitals to fund specialist nurses at weekends to facilitate faster referral and transfer of patients from the receiving hospitals. This work will also include early facilitated discharge for both STEMI and NSTEMI patients;
2. Norfolk and Norwich University Hospitals to increase transport provision for patients requiring transfer from local hospitals;
3. RPH to develop an education package for paramedics to improve the early diagnosis of NSTEMI on scene.

Early results from these pilots are expected in Q2/Q3 in 2022/23 (see Figure 5).

Out of Hospital Cardiac Arrest (OHCA)
The network is working with MSE to conduct a research study to improve outcomes in patients with OHCA. The pilot includes having a central cardiac arrest centre in MSE and offering neuroprognostication MDTs to a wider group of intensive care units to aid decision making. The work is also aiming to improve survivor aftercare and looking at ways to support rescuers. This work is fully co-produced with patients and carers who have survived cardiac arrest. The new algorithms and pathway are expected to go live in October 2023.
Figure 5I NSTEMI - Percentage of cases that receive their procedure (Coronary Angiography with PCI if indicated) within 3 days

The grey and black bars show the ICSs that make up the East of England Cardiac Network.
“As part of the Eastern AHSN (Academic Health Science Network) Cardiovascular Disease Prevention Programme, we have worked in close partnership with the CVDR Network. This has ensured that our programme aims, workstreams and deliverables have been in collaboration in its efforts to help with the identification, prevention and management of conditions linked with cardiovascular disease across the East of England.

We feel that the CVDR network adds tremendous value to our focus therapeutic areas: lipid management, familial hypercholesterolaemia, atrial fibrillation and high blood pressure.”

Nick Pringle
CVD Programme Lead, Eastern AHSN
Challenges

- Setting up the network during COVID was particularly challenging in cardiac. Although a programme manager was appointed, the post-holder was immediately re-deployed to support the COVID-19 response. The full appointment of all clinical leads and programme support was not achieved until late summer, resulting in some delays to commencing the key workstreams.

- Echocardiography services were stretched pre-COVID, and the post-COVID backlog has been particularly challenging to improve both these services locally and nationally. Workforce availability is a key factor and will be a focus for the network in 2022/23.

- The pressures on urgent and emergency care, and specifically the pressures on ambulance services, has been felt across the cardiac pathways, but particularly has affected the ability to meet some of our time critical standards for STEMI.

Areas of Focus for 2022/23

The priorities for 2022/3 agreed by the national team are a continuation of the 2020/21 priorities with the additional requirements:

- Improved CVD prevention (focusing in hypertension)
- Improved access to diagnostics (echocardiography and NT pro-BNP)
- Elective recovery (reduction of P2 and P3 waits) and appointing clinical leads for cardiac surgery
- Reduced time-to-treatment for heart attacks and improved survival from cardiac arrest
- Increased uptake of cardiac rehabilitation.

Additional priorities for the East of England network include:

- Establishment of effective partnership working with the Integrated Care Systems
- Wide ranging patient and public engagement in the workstreams
- Out of Hospital Cardiac Arrest Centre pilot evaluation.
Figure 6 | Cardiac Clinical Network Governance

- National CVDR Programme Board
- National Team (CPIP)
- Regional Executive Team
- CVDR Programme Board
- Cardiac Network Regional Board
  - CVD Prevention Clinical Advisory Group (joint with stroke ISDNs)
  - Acute Coronary Syndrome Steering group
  - Diagnostic steering group
  - Heart Failure and Breathlessness steering group
  - Cardiac Rehabilitation steering group
2. Integrated Stroke Delivery Networks

» Highlights
Integrated Stroke Delivery Networks

In 2019 the NHS Long Term Plan set out ambitious aims for the development and improvement of services for the prevention and management of stroke in England. These aims were further developed in the National Stroke Services Model (NSSM) 2021, Integrated Community Stroke Services Model (ICSSM) 2022 and the stroke Getting It Right First Time (GIRFT) report 2022.

There are two Integrated Stroke Delivery Networks (ISDNs) for the East of England covering three ICB’s in the north and south respectively. The North ISDN includes Cambridgeshire & Peterborough, Norfolk & Waveney and Suffolk & North East Essex systems. The South ISDN includes Mid & South Essex, Hertfordshire & West Essex and Bedfordshire, Luton & Milton Keynes systems. The East of England ISDNs were operationalised in April 2021.

Network objectives

- enable improvements in stroke prevention;
- reduce inequalities and improve outcomes for people who experience a stroke in EoE.

The objectives will be met by realisation of the Long Term Plan goals, implementation of the NSSM, ICSSM and the delivery of the GIRFT recommendations. In addition, the ISDNs support the ongoing recovery from COVID-19, regional and ICB level priorities and supervise the operational challenges in relation to mechanical thrombectomy provision.
**Pre-hospital care – Pre-alert of stroke**: production of a standard proforma for pre-alert information and agree preferred process. Reduce call to door times and optimise cannulation rates. Increase percentage of patients admitted to a specialist stroke bed within 4 hours region wide.

**In-patient stroke care**: improve the delivery of thrombolysis to all patients who could benefit to 15.8% by 2024. Improve provision and delivery of complex imaging and support the implementation of the National Optimal Stroke Imaging Pathway (NOSIP). Improved SSNAP performance across all inpatient settings, A rated services expected by 2023. Achieve compliance in the stroke specific critical time standards.

**Prevention**: support systems to improve detection/treatment: Primary prevention (AF; High Blood Pressure; Raised Cholesterol), Secondary prevention (stroke TIAs) and tertiary prevention.

**Acute Care**:

a. **Pre-hospital care – Pre-alert of stroke**: production of a standard proforma for pre-alert information and agree preferred process. Reduce call to door times and optimise cannulation rates. Increase percentage of patients admitted to a specialist stroke bed within 4 hours region wide.

b. **In-patient stroke care**: improve the delivery of thrombolysis to all patients who could benefit to 15.8% by 2024. Improve provision and delivery of complex imaging and support the implementation of the National Optimal Stroke Imaging Pathway (NOSIP). Improved SSNAP performance across all inpatient settings, A rated services expected by 2023. Achieve compliance in the stroke specific critical time standards.

**Post-Hospital Care**: support systems to implement the new Integrated Community Stroke Specification model and improve access to Life After Stroke services and increase the percentage of patients receiving six-month reviews to 60% by 2024.

**Workforce**: support the professional development of staff involved in the stroke pathway through a common framework of competencies and training. Ensure robust staffing levels across all providers, to agreed standards. Develop a capabilities-based workforce.

**Health inequalities**: collaborate locally in planning and action to reduce inequalities in areas of high deprivation/socioeconomic groups and complex needs.

**Mechanical Thrombectomy**: equitable access improvement and ability to increase the proportion of patients who receive thrombectomy after a stroke to 8% by 2024.

**Data, Evidence & Research**: ensure full engagement with the Sentinel Stroke National Audit programme (SSNAP) across all services. Development and implementation of non SSNAP dashboard metrics Enhance recruitment into stroke research studies and evidence base in stroke care.

Network Team

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Business Co-ordinator
Network Performance and Achievements

Establishing team and governance

The first half of 2021/22 saw the formation of the ISDN teams, the programme management set up and governance to deliver the planned work programme. A series of Clinical Advisory Groups (CAGs) were established to focus on specific areas of the stroke pathway comprising key stakeholders from acute and community providers, Integrated Care Systems, the ambulance services and 3rd sector organisations. These are:

- CVD Prevention CAG
- Pre-Hospital Admissions CAG
- Acute Care Stroke Admissions Improvement CAG
- Stroke AI and Procurement
- Stroke Rehabilitation CAG
- Nursing Workforce CAG
- Improving Mechanical Thrombectomy.
- Stroke Quality Improvement in Rehabilitation programme (SQuIRe)
- Patient and Public Engagement
- Stroke National Audit Programme (SSNAP) Peer Reviews

CVD Prevention Clinical Advisory Group

The stroke network shares a CVD Prevention Clinical Advisory Group with the Cardiac Clinical Network, which is detailed under the Cardiac Network section. In addition to the work on preventing primary stroke through the management of hypertension, atrial fibrillation and cholesterol, the Stroke Network was successful in securing funding for a tertiary prevention pilot (preventing further stroke after an initial event) focused on health inequalities. This is for the ISDN to:-

- Identify and reduce stroke specific health inequalities within their area, working in partnership with their ICS health inequality lead and other relevant stakeholders, using the stroke-specific health inequalities framework and Core20Plus5
- A scoping exercise using public health data, initially identified two areas with high age-standardised rates of mortality from stroke as surrogate measures for inequalities: South East Essex and Luton. Some work was progressed in the two areas but due to funding implications at the end of the financial year, the project could not continue in the Luton area.
- The project was rescoped to cover the Essex area, to include Thurrock which was the third area with high age-standardised rates of mortality from stroke and Mid Essex which could be used as a control.
- Early Supported Discharge (ESD) and community providers from the three areas: Essex Partnership University NHS Foundation Trust (EPUT), North East London Foundation Trust (NELFT) and Provide Community Interest Company (CIC) agreed to pilot a personalised care approach with patients and families recovering from stroke by means of protected time spent educating them on their stroke, what would have caused it and the global risks of stroke, using the Stroke Association ‘How to reduce my stroke’ booklet. Providers, patients, and their families (if applicable) will also co-produce a personalised stroke prevention plan using the Stroke Association ‘My Personal Stroke Record’ to set goals and track progress in achieving those goals.
- Since the personalised care approach is fundamental to the intervention within the project, personalised care training for relevant staff taking part in the pilot, was sourced from the regional Personalised Care team.
- The pilot is due to go live on 15th June 2022 and will be monitored through monthly oversight groups and weekly touch points to ensure the pilot is safe and effective.
Pre-Hospital Clinical Advisory Group

This CAG was established since April 21 to support clinicians, providers and commissioners in the process of pre-alerting potential stroke patients to improve patient outcomes. This will be achieved by reducing variation and call to door times, optimising faster assessment and treatment, and supporting communication between acute providers and the ambulance services to safely transfer stroke patients to mechanical thrombectomy centres. The work of this CAG includes:

- **Developing standardised pre-alert processes.** Working with key stakeholders, the Group has developed a standardised process and pre-alert proforma. Six Trusts in conjunction with EEAST ambulance crews commenced a 3 month pilot of this pre-alert process in March 2022.
- **Pre-Hospital Stroke Video Triage.** The ISDN submitted a bid for national funding to support a pilot for video triage for two sites in the East of England – North West Anglia Foundation Trust and University College Hospital (UCLH). Pre-hospital video triage allows ambulance crews to have a video consultation with a specialist stroke team prior to conveying the patient to ensure that the most appropriate site/service is chosen. The ISDN were notified that the bid was successful in April 2022. This will form one of the main areas of work for this CAG in 2023/24.

Mechanical Thrombectomy

One of the key deliverables has been to improve rates of mechanical thrombectomy (MT) in the region. Much of this work is supported by the quality improvement work in the networks clinical advisory groups, but some specific projects have been established to meet this aim;

- Interim MT pathways. Pan-regional steering group established (6 weekly) with London colleagues since April 2021. Collaboration has enabled region wide access to MT at the Royal London Hospital in addition to established pathways into Charing Cross and Oxford / Thames Valley while the regional MT services are being developed.
- Continue to support close monitoring of capacity and demand and relevant operational requirements. Ongoing and maintained access to London MT services is continually mapped against local MT service implementation timelines and flow.
- The ISDN continues to support the wide communication of MT availability/alternative providers to all acute providers in the East of England.

**Development of regional MT services.** Joint steering group established (6 weekly) since April 21 with Cambridge University Hospital (CUH), Norfolk and Norwich University Hospital (NNUH) and Specialised Commissioning to help progress their respective MT services for the region. The steering group has supported the implementation of:

- Final sign-off for the CUH business case
- Agreed timelines for implementation of the 3 expansion phases of the CUH service (phase 1 expected to be operational from May 22) to achieve a 24/7 service
- Supporting NNUH in the development of their Strategic Outline Case and progression to full business case (expected Autumn 2022)
- Agreeing timelines with NNUH for phased expansion of services (expected 2024), which continue to be progresses through the steering group.
Stroke AI and Procurement

The region does not currently have the ability to interconnect AI platforms across Trusts within the region and currently does not operate any Hub or Spoke model. The adoption and use of AI is sporadic across the region and is behind compared with the other six regions in England implementing AI systems (see Figure 7). In 2021, 21% of Trusts had implemented AI compared with an increase to 43% by April 2022 but there is still much to do to get to 100% adoption as per neighbouring networks (London & Kent; see Figure 8).

AI will support clinical decisions regarding suitability for thrombolysis and thrombectomy and will address some of the GIRFT recommendations by implementing the National Optimal Stroke Imaging Pathway including more timely transfer of information, reduce unwarranted variation in poor access to MRI, improve imaging within one hour of arrival for all patients with stroke and ensure 24/7 access to CT angiogram and CT perfusion. Benefits of AI will be realised through measured step change improvements in Trust SSNAP results for thrombolysis and thrombectomy.

The ISDN has been working on plans to introduce AI in remaining sites across the region in 2022 and have:

- Secured the expertise of the EoE Collaborative Procurement Hub to support the AI regional bid through the national NHS Shared Business Services (SBS) framework.
- Secured a lead host trust, Luton & Dunstable (Apr 2022) to manage the two year regional contract.
- Regional procurement working group established Apr 2022 and agreed requirements of technical specification/commercial schedule.
- The project is on track to deploy AI in the Autumn of 2022.
Figure 7 | Progress with AI decision support implementation in 2021/22

Figure 8 | AI position as of April 2022

- Kent and London networks fully live
- Individual sites live across East of England but several outstanding
- Brainomix and RAPID AI in use
- Funding provided in the last two financial years to progress
Acute Care - Stroke Admissions Pathway Improvement Clinical Advisory Group

The NHS Long Term Plan aims to improve the quality of care and treatment available for people who do have a stroke through ensuring that high quality, specialist care and treatments, such as thrombolysis (clot-busting drugs) and mechanical thrombectomy (clot extraction), are increasingly available to more patients as part of Integrated Stroke Delivery Networks.

This Admissions Pathway Improvement CAG aims to ensure access to highly specialised stroke units for patients with stroke in < 4 hours and for >90% of their stay through:

- Improving awareness of the benefits of organised stroke care to executive and bed management teams to ensure rapid access to and maintenance of stroke units.
- Reduce use of stroke unit beds by general medical patients – reclassify beds and reallocate staff where necessary.

Admissions Pathway Improvement Audit:

A local audit was undertaken in the period between February – April 2022 to look at the processes that acute trusts had to support access to highly specialised stroke units for patients with stroke in < 4 hours and also to look at the causes of any 4 hour key performance indicator (KPI) breaches (see Figure 9).

There was a good response to the audit with 14 routinely admitting acute trusts in the region taking part.

- Influencing factors also evident were poor selection and management of medical outliers, reduction of stroke unit bed bases (COVID related configurations), delayed transfer of care, and poor staffing levels (MDT) leading to extended LOS.
- The audit analysis and findings were presented at the Clinical reference group, discussed with the Admissions pathway improvement CAG, shared with individual acute trusts and are influencing the scoping of priorities and improvement work aimed at reducing breaches across the region.
- The processes audit analysis showed that most stroke units have processes, standard operating procedures in place, however the use of those processes is not reflected in achieving the 4 hour KPI.
- Analysis of the breach causes audit showed that specialist stroke beds are not being protected leading to significant delays in the delivery of stroke specialist care (see Figure 10).
- Influencing factors also evident were delayed transfer of care from the ED or non stroke wards, poor staffing levels resulting in an increase in workload and COVID related issues delaying admission into a stroke unit.
Figure 9| Processes audit results

- Designated empty stroke ring fenced beds: 9 Yes, 5 No, 1 No rating
- Stroke unit bed management policy: 7 Yes, 6 No, 2 No rating
- Stroke unit ring fenced beds policy: 7 Yes, 7 No, 1 No rating
- Step down of stroke patients policy: 4 Yes, 10 No, 1 No rating
- Covid policy - is there a red/green pathway in managing stroke unit beds: 11 Yes, 3 No, 1 No rating
- Any other policies that support the stroke admissions pathway: 6 Yes, 7 No, 2 No rating
- Executive sponsor to support the stroke admissions pathway: 6 Yes, 8 No, 1 No rating
- Criteria for medical outliers to be placed on the stroke unit: 6 Yes, 8 No, 1 No rating
- Criteria for medical outliers to be transferred back to medical wards: 5 Yes, 7 No, 3 No rating
- Escalation procedure if there are no stroke unit beds: 6 Yes, 13 No, 1 No rating
- Difference in the management of stroke unit beds during in and out of hours: 6 Yes, 4 No, 5 No rating

Figure 10| Breach causes - regional summary

- No stroke unit bed
- Medical clerking
- Clinically unwell patient requiring specialist input from other areas not suitable...
Nursing Workforce Clinical Advisory Group

A regional appraisal of the stroke nursing workforce was completed to understand the impact of correct hyperacute and acute stroke nursing establishments and the utilisation of the specialist nursing workforce. This work has enabled the development and dissemination of system wide intelligence.

The nursing workforce across stroke services is integral to the delivery of specialist stroke care. Despite this, nursing interventions and patient contact time are not captured via the Sentinel Stroke National Audit Programme (SSNAP) audit as other disciplines are, resulting in the stroke nursing workforce being influenced by local priorities with poor provision largely unrecognised. Furthermore, staffing constraints caused by COVID-19 has resulted in the redeployment of specialist nurses, directly impacting the immediate provision of stroke care and depriving stroke units of clinical expertise.

Quantitative and qualitative methods were applied to this work. This included data relating to nursing establishments, vacancies, bed configurations, electronic rostering systems and the safer nursing care tool. This information was supported by written evidence from senior stroke nursing leads. Analysis of fifteen acute stroke services was completed.

A detailed regional report has been compiled and shared system wide, with each provider being presented with an individual analysis.

Over 60 key findings and 19 recommendations covering four main themes were established including:

- Establishments against national guidance unrealised.
- Hyperacute Stroke Units (HASUs) staffed against Safecare sitting below Royal College of Physician (RCP) recommendations
- HASU beds are not recognised on electronic rosters leading to general ward theories being applied.
- Significant movement of band 5 nurses affecting retention.
- HASU beds poorly aligned with significant variations of admissions per bed.
- Specialist nursing team management influencing SSNAP attainment.
Rehabilitation Clinical Advisory Group

The Rehabilitation CAG has been looking at the impact of COVID-19 and winter pressures on the delivery of stroke services.

Following concerns around service delivery that had been raised by clinicians and service managers of stroke services, service pressures impact assessments were undertaken to understand the impact of winter pressures and the Omicron variant on service delivery in the period covering November and December 2021.

The ratings and narrative were taken back to the Group to formulate a potential action plan to report to the EoE Stroke Programme Board and this was actioned after March 2022.

Stroke Quality Improvement in Rehabilitation programme (SQuIRe)

Extensive scoping completed in relation to stroke prevention interventions, 7 day service provision and staffing establishment. Service directories for ESD and inpatient rehabilitation units have been completed. This work will inform the priority setting for the SQuIRe role in 2022/23.

SQuIRe is the Stroke Quality Improvement in Rehabilitation programme and is a nationally funded programme in addition to the ISDNs. In the East of England, it has been decided to maintain this programme in close collaboration with the ISDNs as part of the wider team to support the complete end-to-end pathway improvement. The SQuIRe programme was set up in 2021/22, but delays in recruitment meant that this could not be initiated in this year. The SQuIRe role has been successfully recruited to and will commence in May 2022.

Patient and Public Engagement

The Stroke Network has spent considerable time this year in developing its strategy for patient and carer input to the work of the ISDNs. The EoE Stroke Patient and Carer Assurance Group will ensure that people affected by stroke at any age, their carers and people at risk of stroke have the opportunity to contribute towards, and shape the work of, the ISDNs. The group will work together to consider and advise on current and future ISDN plans for improving care, drawing on the lived experience of stroke.

In 2021/22, the patient and Public Voice (PPV) strategy was developed and approved. Recruitment is planned to be completed by May 2022, with appointment of a Chair, Vice Chair and with input from the Stroke Association. Bi-monthly meetings will be set up with a go-live date of 1st June 2022.

Work has also been undertaken on the wider communication and engagement strategy in conjunction with NHSE Communications colleagues.

Stroke National Audit Programme (SSNAP) Peer Reviews

During 2021/22, the ISDNs undertook detailed reviews of the SSNAP metrics pre- and post-COVID. Action plans were requested from all providers and a plan in place to meet with all leadership teams in all acute service providers to appraise and discuss their action plans. This was delayed by the COVID-19 wave and mass vaccination programme of December 2021. All meetings are now in arranged and will take place in April and May of 2022, with follow up meeting for June/July 2022.
"As a national charity the Stroke Association have been warmly welcomed into the Integrated Stroke Delivery Networks in the East of England. Our expertise has been recognised and respected in the ISDN and our common visions and values, support our joint collaboration to deliver optimal stroke care across the pathway.

Key areas we have worked together on to date are the establishment of the Patient Public Voice Network (PPV), The implementation of the Patient Reported Experience Measures (PREMs) survey, the Health Inequalities project and an Education forum for all staff across the region."

Stroke Association
Challenges

Alongside the wider challenges facing all networks, the stroke ISDNs have faced some specific challenges;

**Mechanical thrombectomy.**
- Timely access to MT in the region continues to remain a challenge but regional MT service is improving as we start to see an impact of activities set up to address some of the key barriers.

**Stroke Artificial Intelligence**
- Delays to the publication of the SBS framework for procurement resulted in some delays to the AI procurement timelines.
- Engaging 8 Trusts with some lack of clarification of on-going funding and through a time of crisis with the Omicron variant of COVID-19 also resulted in some delays to the start of the project.

**SQuIRe**
- Delays to recruitment into SQuIRe post resulting in pressures on delivery of the Integrated Community Stroke Service model (ICSS).

**SSNAP**
- Deterioration of SSNAP audit performance region wide in relation to the stroke unit domain.
- Infection control measures during, and post-COVID, resulting in stroke patients not always being admitted to stroke beds
- Workforce pressures in all areas of the stroke pathway, with stroke specialist nurses being re-deployed to cover other staff shortages impacting on emergency stroke care delivery.
Areas of Focus for 2022/23

**Stroke Artificial Intelligence**
Deployment and mobilisation of AI across the 8 trusts once the regional procurement has been completed and work with the Clinical Policy Unit (CPU) and/or ICBs to future proof potential contract extensions.

**Pre-hospital Clinical Advisory Group**
Continue piloting pre-alert proforma prior to development of wider regional use. Monitor CAT 2 transfer data.

**Pre-hospital Stroke Video Triage (SVT)**
Continue supporting EEAST with implementation of NWAFT pathway so that by mid Sept at least 33% of suspected stroke patients in the pilot area are assessed via video triage, by mid Nov at least 66% of suspected stroke patients are assessed and by end of January 23 all suspected stroke patients are assessed.

**Admissions Pathway Improvement CAG**
- Prioritise and undertake projects aimed at reducing breaches across the region.
- Utilise information gathered as part of the EoE ISDN SSNAP review meetings to inform QI opportunities and change.

**Health Inequalities in Stroke- Tertiary prevention pilot**
- To run the pilot until all patients involved have been offered the full intervention – from initial assessment and follow up visit(s) with a plan to have a six-month review.
- To collect data in the duration of the intervention which will be used as an evidence base for future health inequality and tertiary prevention projects.

**Mechanical thrombectomy**
- Continue to develop regional services at CUH and NNUH as per the presented phased plans.
- Support and maintain the interim pathways into London MT service.
- Continue to monitor effective and timely repatriations.

**SSNAP**
Realise the ambitions of the East of England SSNAP improvement programme, supporting acute service providers to work towards A grade attainment for SSNAP acute care KPIs.

**Patient Participation Voice**
Continuous collaboration and partnership working with the East of England PPV assurance group enabling co-production of priorities and associated projects.

**GIRFT recommendations**
Achieve compliance with the recommendations of the 2022 Stroke GIRFT report aligned to the ISDNs.

**Tertiary prevention pilot review outputs**
- Participate in the thrombectomy quality review meetings for each community of practice.
- Implement actions identified and allocated to the ISDNs for completion.
- Support providers to realise identified actions and improvements.

**Post acute / Rehabilitation CAG**
- To support the delivery of the SQuIRe objectives.
- To deliver all recommendations presented in the rehabilitation impact assessment report.
- Workforce analysis and the development of work force strategy for acute rehabilitation services.
- Stroke rehabilitation unit bed modelling.
**SQuIRe**

The East of England (EoE) ISDNs priorities for the SQuIRe Regional Quality Improvement (QI) projects will be based on work with the ISDN Clinical Leads, the Senior Programme Manager, the Stroke PPV Assurance Group, ISDN Stroke Boards (North and South) and the Rehabilitation Clinical Advisory Group (CAG), they are likely to focus on:

- Specialist Stroke Workforce including access to Clinical Psychology for delivery of the ICSS
- 7/7 day working including MDT integration on ICSS pathways
- Stroke training for registered and non-registered staff based on use of the SSEF and stroke competencies
- 6/12 reviews using a validated tool, linking into Life after Stroke and community integration.

These priorities will be aligned to the current service provision gaps identified across the East of England by a Post-acute rehabilitation Gap Analysis in the Region. These priorities will be reviewed within the context of the ICSS model, Post Acute Organisational Audit data and recommendations, the Stroke GIRFT Report and recommendations and using the RightCare Toolkit.

Work on SQuIRe regional priorities will support delivery of the ICSSs across the region with the aim to reduce inequality in implementation across the region. This will involve both improvement initiatives and supporting staff as they begin to move through the change processes involving potential service re-configuration.
Small executive group with representation from each ISDN Clinical Leads, patient voice, regional representation including PHE and EAHSN. Monitors the progress of the network against the workplan and identifying areas of work.

Provides strategic oversight supporting the delivery of ISDN priorities and workplan by providing clear direction. Supporting a culture of collaborative, partnership working and effective communication between provider organisation.

Reviews the work produced by the Clinical Advisory Groups for each workstream and provides clinical, operational input and overview into this work before it is passed onto the ISDN Boards. Identifies areas of regional or local concern and raises this to the ISDN Boards.

Examine region-wide issues, performance and best practice in relation to workstreams and identify and lead on actions. Small groups which feed up into the CRG for a wider clinical view and out to the T&F forums to share learning and best practice.
3. Respiratory Clinical Network

» Highlights
Respiratory Clinical Network

The East of England Respiratory Clinical Network is part of the CVDR Clinical Networks team and was established in its current form in August 2020. Its role is to provide leadership to support to quality improvements the East of England can make with respect to the Long Term Plan’s goals, recovery from COVID-19, and other local, regional and national priorities.

The Network established several different groups of professionals all looking at quality improvements that can be made in the diagnosis, treatment, rehabilitation and prevention of respiratory disease in the East of England.

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NETWORK PRIORITIES FOR 2021-22

Within the NHS Long Term Plan, respiratory disease is a key area of focus. It affects one in five people in England and is the third biggest cause of death. The priorities for respiratory disease set out in the NHS Long-Term Plan are:

- Improving outcomes of respiratory disease to equal, or better, than our international counterparts.
- Early and accurate diagnosis
- Increase case finding in COPD patients for pulmonary rehabilitation
- New models of care in Pulmonary rehabilitation, including digital tools
- Increase the number of patients with COPD referred to pulmonary rehabilitation through the use of the COPD discharge care bundle
- Reduce use of SABA inhalers for asthma management and pharmacy support to increase uptake of new smart inhalers where clinically indicated
- Consistent use, and application, of risk scoring for community acquired pneumonia
- Out-of-hospital nurse led supported discharge services for community acquired pneumonia to prevent admission.

Additionally, the national specification for networks has included aims to:

- Increase access to spirometry in primary/community care
- Work towards the accreditation of pulmonary rehabilitation services
- Implement digitally enabled virtual wards/remote monitoring
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Network Team

Dr Ellen Makings
Senior Responsible Officer, Medical Director for System Improvement

Dr Jonathan Fuld
Clinical Lead, Pulmonary Rehabilitation & Long COVID

Dr Abigail Moore
Clinical Lead, Asthma, Diagnostics, ARCU

Kirsty Goddard
Quality Improvement Manager (until November 2021); Quality Improvement Manager for Long COVID from November 2021

Alan Jensen
Quality Improvement Manager (January 2022-Present)

Roxana Mojoo-Jones
Quality Improvement Project Officer

Ryan O’Neill
Senior Informatics Data Analyst from February 2022

Caron Tozer
Business Manager for CVDR and Diabetes Clinical Networks

Amanda Harrington
Business Support Officer
Network Performance and Achievements

The network’s development began in August 2020, and it was fully established by December 2020 during the peak of the second wave of COVID-19. The first half of the year was dedicated to the appointment of clinical leads, the network infrastructure, identifying key stakeholders in the region and in the establishment of a governance structure and steering groups to focus on key issues within respiratory care.

Pulmonary Rehabilitation (PR)

PR is an exercise and education programme designed for people with lung conditions who experience symptoms of breathlessness. PR focuses on tailored physical exercise and information that helps people to better understand and manage their condition/s and symptoms, including feeling short of breath.

PR was significantly impacted by the COVID-19 pandemic, as many services moved to virtual-only provision to prevent the spread of infection. The network established a steering group for PR in March 2021, engaging with experienced clinicians and commissioners across the region. The initial focus of the group was on restarting services safely and how to provide equitable, safe service in a virtual format.

In April 2021, a non-recurrent boost to funding was announced for PR services, to address specific challenges around improving access and raising referral and completion rates. In May 2021, the network held a focussed workshop to allow clinicians and commissioners across the region to share case studies and discuss the most beneficial ways to invest in services using this boost in funding. These conversations helped both commissioners and clinicians to identify the best way to use additional funds to increase access, address inequalities and raise referral rates.

The network also established a quarterly data return to gain a baseline of the PR provision being provided, to identify how the network could support the region (see Figure 12-14). Common themes identified from the data returns in 2021-22 showed that; there are high numbers of people being referred, the number of people who have completed the programme is low, and that there are significant numbers of people waiting for PR services.
This data has helped inform and develop the ICS delivery plans for 2022-23 in partnership with service providers.

Figure 12 | Number of PR Referrals Received

Figure 13 | Number of Patients completed PR programme (As evidenced by a discharge bundle)

Figure 14 | Number of patients waiting to start PR
"I think the achievements for the PR group are: the data sets that are collected; increase in services signed up for accreditation and support for accreditation; the education support for the PR group via MS teams; and the funding that the services applied for that will reduce inequalities, increase PR numbers etc."

Ruth Barlow
Chair of the Pulmonary Rehab Steering Group
Pulmonary Rehabilitation (PR) Accreditation

The network also recognises the importance of PR being delivered by accredited providers and therefore decided in March 2022 to deliver a regional workshop to PR providers and commissioners on the accreditation requirements.

The following key themes were identified from the workshop:

1. Service providers would welcome peer support especially for small providers.
2. Service providers would welcome the network providing some guidance to the ICSs on the use of funding and on how to support services with achieving accreditation, including how much project, admin and clinical time should be provided.
3. Network could look at buddying cohorts through the accreditation process and at seeking the discounts available for the Pulmonary Rehabilitation Services Accreditation Scheme (PRSAS).
4. ICS need to develop their 5-year vision for PR services factoring in the requirements of accreditation.

The above themes were reviewed and considered by the network, this has led to the network starting up a regional accreditation project. ICSs will be invited to put forward individual providers working within the East of England Region to be part of an initial cohort of 10 providers to progress through the whole accreditation process. With each provider taking part receiving funding to support with the costs associated with accreditation. In addition to this funding, the network has set aside some additional funding for the recruitment of a fixed term project manager to provide a central project management function to support providers through the accreditation process.

Respiratory Diagnostics

Respiratory diagnostics play a crucial part in the care of patients with chronic lung conditions. However, during the COVID-19 pandemic many non-essential services were stood down including lung diagnostic tests. However, due to lung function testing being highly important, there was recognition that these diagnostic tests needed to be restarted as soon as possible as it was having a knock on effect onto other respiratory services.

The restarting of spirometry testing in particular was seen as a high priority as it is used to help identify many lung conditions including; asthma, chronic obstructive pulmonary disease (COPD), cystic fibrosis and pulmonary fibrosis. However the restarting of spirometry services was one of particular challenge for systems for many reasons including:

- IPC concerns
- Staff recruitment & skill mixes
- Sufficient estate; i.e. space available & sufficient ventilation in order to complete spirometry testing
- Challenges with ARTP accreditation and the training of staff to be able to conduct spirometry tests.

During 2021, the network took more of an individual approach to supporting the restart of spirometry services, this was to support systems to consider diagnostic services such as spirometry as high priority area in order to drive the restart of diagnostic services and the possible ways they could address the above challenges. As well as to help systems to consider how the additional funding being provided by NHS England could support them in addressing the above challenges.
The Respiratory Clinical Network established a Respiratory Diagnostic Steering Group in April 2021, bringing together clinicians and commissioners across the region. The group has allowed each ICS to share the various models being used to deliver spirometry across the region along with the issues and challenges they have encountered with the restart of spirometry. This has given every system the opportunity to share learning with each other and to seek advice and support from the group.

Also, in March 2022, the network invited the Community Diagnostic Hub team to present to the group to help systems to understand the way they might want to configure diagnostic services in the future.

Figure 15: Estimated number of patients awaiting spirometry testing (Data submitted as part of the 2021-22 spirometry funding application)
Asthma

This workstream made good progress since its launch in December 2021, with the Steering group agreeing its initial objectives as:

1. To review, consider and design adjustments to the asthma referral and patient pathways to secondary and tertiary care, supporting their implementation.
2. To support systems in ensuring that asthma medicines are optimally used to promote good asthma care, improve asthma control and prevent asthma attacks.
3. To improve the timely and equitable access to initial assessment and diagnostic tests of asthma patients.

As part of the work in progressing its objectives, the network conducted an asthma pathway mapping exercise with a mix of clinical professionals and reviewed the findings (see Figure 16, 17 A-D).

Key Outputs from the asthma mapping review:
1. Education of both patients and clinicians was key to achieving improvements in asthma care empowering the patient to take a role in managing their condition.
2. Recommendations that health care professionals have sufficient time to do reviews and primary care should have system flags and guidance.
3. Development of a working group to look at the risk stratification tools being used.

The key findings from this review have been incorporated into the network’s 2022-23 programme plan with an initial focus on education around SABA inhaler use. As not only is this a key area to improve for patient outcomes but it also part of the NHS’s green agenda to target reduction in carbon emissions.
Figure 16 | The Asthma UK ideal Pathway to specialist care for patients with difficult or severe asthma.

Figure 17 A-D | Asthma Pathway Mapping Results
Respiratory Clinical Network

C

Local hospital respiratory clinic

- Staff
  - Low priority of asthma in hospitals with other services (i.e., orthopaedic) means little impact from Trust to invest in asthma services
  - Bottleneck
    - Lack of capacity to see patients in a timely way. Two-year waiting times for outpatients

- Process
  - High staff turnover means poor performance in processes. No robust system processing staff from most staff are insufficient,
    especially in a highly porous D2 system
  - Process
    - A lack of recognition in the same area by same numbers. The GP is not informing
    - Areas lack necessary managed. Add admissions to always gather up by respiratory
      teams
  - Process
    - Area structure and type 2 case
      - Area is not giving greater amount across boundaries

- Process
  - Coordination of different entry points to asthma service e.g., GP in practice/other national
    patients to respiratory clinics found

- Process
  - Coordination of different entry points to asthma service e.g., GP in practice/other national
    patients to respiratory clinics found

D

Specialist asthma clinic

- Gap
  - Marked inequality in case finding for severe asthma between different 2y care centres

- Process
  - GP has little access to specialist Southend areas, not enough Respir consultants. All packs
    still have to go to London. Lack capacity in clinics to manage either adult or child

- Gap
  - Funding for specialist services needs to follow
    - to allow service development

- Gap
  - Lack of capacity in 2y care means patients spend too long in 3y care after assessment

- Gap
  - Lot GPs not aware of new Tx for severe asthma or where to refer or who to Usually refer
cy or local respi who then have to refer on

- INEFCIENT
  - Distance to tertiary centre is an impediment for many patients. Closer highly specialist care
    would improve access and concordance (one hopes)
Acute Respiratory Care Units (ARCU)

ARCU are an integral part of the hospital care for patients with Acute Respiratory Disease. They have developed from ward areas that provide Acute Non-Invasive Ventilation (NIV). NIV is a highly effective treatment for Acute Hypercapnic Respiratory Failure and although safe delivery of NIV is possible in a ward environment, other countries with developed healthcare infrastructure usually provide acute NIV only in a Critical Care environment. To ensure safe ward-based delivery of complex respiratory care, ARCU were established to provide a higher level of monitoring and respiratory intervention than expected for a routine ward environment.

In order to support acute colleagues during seasonal pressures with additional pressure brought about by the COVID19 pandemic, the network established a weekly acute winter response working group for acute trusts to receive regional updates and to provide updates on their position. Along with these response meetings a regional ARCU Sit-Rep was created to run alongside the Trust’s Critical Care capacity.

The report showed the percentage of beds each Trust had filled within their ARCU, along with staffing numbers, how many beds were occupied by patients with COVID and any patients that may need escalating to intensive care. The purpose of the report was to support acute trusts across the region to be able to understand ARCU capacity not only within their own acute trust but within other acute trusts across the region.

ARCU Peer Reviews. Once the peak of seasonal and COVID19 pandemic pressures had subsided, the working group looked at how the region could support trusts in achieving the national service standards for ARCU, as successive national audits have shown wide variation in service infrastructure and patient outcomes. The group agreed to introduce and offer a Peer Review process, with the aim for Trusts to learn from each other; provide a stimulus for quality improvement; and to be an opportunity to share good practice more widely and to support units in their work to achieve service improvement. The network therefore went on to develop comprehensive documentation for the peer reviews including:

1. Framework
2. Safety and Attitudes Questionnaire
3. Expressions of Interest Form for Peer Review Team
4. Peer Review Self Assessment Form
5. Peer Review Report

The Network Board agreed the standards and the designed the framework for the ARCU peer reviews and recommended the peer review process should be piloted before rolling out regionally. The network factored in the board’s recommendations and scheduled a pilot peer review for June 2022.
Community Acquired Pneumonia

The network worked with systems over concerns of the achievability of the pneumonia Commissioning for Quality and Innovation (CQUIN), due to winter pathway pressures in acute trusts. At the same time, the network became aware of problems with the transition of patients from paediatric to adult care who have neuro disabilities and investigated other options on how the region can make improvements in pneumonia care including the potential opportunities for network collaboration with the Learning Disabilities and Autism network to address health inequalities for these patients.

As a result the network is establishing a steering group in 2022-23 to improve the quality of care and thereby patient outcomes by providing a forum for collaboration and improvement, with the agreed initial areas of focus for this steering group being the above patient cohorts.

Establishment of a Respiratory Specialist Nurse Community of Practice

In October 2021, the network established a forum for all nursing colleagues forum for all respiratory nursing colleagues, across primary, community and acute care. The forum’s aim is to improve quality of service and thereby patient outcomes by providing a forum for nurses within the region who are providing respiratory services, across primary, community, secondary and tertiary care to share knowledge, experience and concerns and find a way to address issues by collaboration.

The forum has discussed a host of topics associated with respiratory care in 2021-22 including:

1. COPD and asthma discharge care bundles.
2. Transition of children with respiratory illness and neurodisabilities from paediatric respiratory services into adult respiratory services.
3. Lung Volume Reduction procedures.

The forum has proven to be a valuable resource for the network to be able to seek advice and guidance from respiratory nurses and has been factored in as an integral part of the network’s 2022-23 workplans and meeting structures.

“I think from my perspective the clinical network has provided impetus and opportunity to relaunch a respiratory nurses network across the East of England. The initial support the network provided to start up the group and spread the word was invaluable as is the continued administrative support to Linda and I as co-chairs.

It has helped to resume some ‘normality’ of respiratory services post COVID and to share experiences, ideas and how to move forward with challenges we are all facing as well as networking once again with one another. I have also found that I have been able to share and devolve the respiratory plan/vision from network helping me link policy and funding into practice and clinical services."

Sam Oughton
Chair of the Respiratory Nurses Forum
Challenges

**Pulmonary Rehabilitation.** PR Services returning to full Face to Face sessions from April 2022, this was due to a variety of challenges including staffing numbers, patients unable to attend face to face sessions, sufficient estate to be able to deliver sessions, etc. The network looked at how it can support systems to return to face to face and looked at:
- The impact of redeployed workforce on services provided
- Challenges with accreditation.
- Ensuring there is the adequate PR commissioned services across the systems to meet demand.
- Seeking updates on the release date of the BTS guidance document.

**Diagnostics.** Encouraging systems to consider diagnostic services such as spirometry as high priority area due to the challenges of restarting services with changing COVID-19 guidance, services not bring properly funded, the development of Community Diagnostic Centres (CDC), etc. The network therefore met with each ICS approach to support the restart of diagnostic services and established a steering group for ICSs to share best practice and learning with each other. As well as providing a forum for other groups such as the CDC team to meet with ICS respiratory leads.

**Patient and Public Engagement (PPV).** The network recognises how important PPV is within its structure. As mentioned within the update section, progress was made within 2021-22 with this identified as a priority area for further improvement in 2022-23.

**Data.** There was a lack of access to the appropriate respiratory data to support network discussions, due to an inability to find meaningful data to help in the establishment of good targeted Quality Improvement (QI) work. The network therefore met with CVDR Data Analyst to discuss metrics and dashboard capabilities. Linked with the national team to discuss and review the national dashboard. As well as linking with third parties such as Eclipse, Astra Zeneca, etc.
Areas of Focus for 2022/23

**Pulmonary Rehabilitation**
1. To support services to work towards achieving fully accredited PR services.
2. To support the increase referrals, completion rates and reduce waiting times for PR services

**Diagnostics**
1. To ensure that patients have good access to diagnostic services across the region, including considering how health inequalities impact on access to services.
2. To increase accreditation of practitioners performing spirometry test and diagnosis of results, sharing good practice.

**Asthma**
1. To ensure that patients have good access to services across the region, including considering how health inequalities impact on access to services.
2. To support systems in ensuring that asthma medicines are optimally used (clinically & environmentally) to promote good asthma care, improve asthma control and prevent asthma attacks.

**Acute Respiratory Care Units (ARCU)**
To support the establishment of ARCUS to achieve national standards, optimise patient outcomes and reduce pressure on critical care units across the region.

**Community Acquired Pneumonia**. Establish a steering group to look at the health inequalities of patient’s with learning disabilities, autism and complex neuro disabilities.

Patient and Public Engagement. The network will work in collaboration with the other CVDR networks to develop an overarching Patient and Carer Assurance Group. The vision is that this group will be made up of representatives from each of the six ICS systems in the region. We want to engage and recruit a diverse patient representation to reflect the opinions from as broad a group of patient representation as possible.
Figure 18 | Respiratory Clinical Network Governance

The national CVDR Board oversees progress in delivery of regional respiratory services against the NHS Long Term Plan.

Small executive group with representation from each system, patient voice, regional representation. Monitoring the progress of the network against the workplan and identifying areas of work.

Examine region-wide issues, performance and best practice in relation to the workstream, identify and lead on actions. Small groups which feed up into the clinical reference group for a wider clinical view and out to the practitioner forums to share learning and progress.

Established
To Be Established

Forums share best practice, and discuss common challenges. Working groups are established due to a need identified by a steering group, CRG or board to support a specific subject area.
4. Long COVID Clinical Network

» Highlights
Long COVID encompasses both ongoing symptomatic COVID (4-12 weeks after infection) and Post-COVID Syndrome (12 weeks after infection). In October 2020, the Five Point Plan for Long COVID confirmed that £10 million will be invested to set up specialist post-COVID Assessment Services (PCAS) across England, to complement existing primary, community and rehabilitation care and £2.6m of this would go to the East of England.

The country’s Respiratory Networks were asked to oversee the commissioning and establishment of these Post-COVID Assessment Services (PCAS). Regions were asked to support provision of PCASs across the region where GPs and others could refer patients after other underlying conditions had been ruled out via appropriate diagnostic tests. Centres needed to provide assessment of each patient’s complex needs and referral onward to appropriate services to support these needs, via a multi-disciplinary team to support this assessment and avoid patients being wrongly referred or rejected by those onward services.

In June of 2021, further funding of £70 million was announced to support development of treatment and rehabilitation for Long COVID alongside assessment. Funding was now to be allocated based on COVID infection rates at ICB levels. The East of England received £6.9m of this in total.

Regions were now asked to ensure existing services providing treatment to Long COVID patients were staffed and funded to provide this treatment, systems were developing tailored rehabilitation for Long COVID patients, services had Care Co-ordinators to track and support patient journeys, and that face to face assessment was available as needed for those patients whose needs would not be met by a virtual or telephone assessment.

Regions were also required to provide a regional tertiary hub for Children and Young People diagnosed with Long COVID who needed further support than was available locally. This funding also included £100,000 for each Respiratory Network to provide dedicate programme support for Long COVID.

“I have found the network to be invaluable for support and navigating my way round unchartered waters. The network has provided a chance to reflect, celebrate and innovate.”

Claire Langley
Clinical Lead for the Long COVID service
Central London Community Healthcare, Herts Valleys
**Network Priorities for 2021-22**

- Reduction of waiting times from referral to Post COVID services to initial assessment
- Reduction of Post COVID assessment waiting lists
- Reduction of Post COVID service referral rejection rates
- Development of rehabilitation pathways across the region making use of existing services where possible
- Developing face to face assessment pathways in all systems
- Developing and improving access to diagnostics at the point of assessment
- Development of the Long COVID pathway for Children and Young People, including ensuring provision for 16-17 year-olds across the region.
- Improving regional knowledge sharing on treatment and delivery of services
- Improving access to all for assessment and treatment for Long COVID at a system level, advocating, supporting and enabling targeted work to address health inequalities
- Ensuring data compliance and validity as a region to enable more evidence-based future planning

**Network Team**

The Long COVID Programme sits within the Respiratory Network in the CVDR Networks Team in the East of England.

**Dr Ellie Makings**  
Senior Responsible Officer, Deputy Regional Medical Director

**Dr Jonathan Fuld**  
Clinical Lead for the Long COVID Programme

**Kirsty Goddard**  
Quality Improvement Manager, on secondment from the Respiratory Network until March 2023

**Ryan O’Neill**  
Senior Informatics Data Analyst from February 2022

**Sarah Fowler**  
Long COVID Clinical Champion, Service Lead for Suffolk and North East Essex Long COVID service
Network Performance and Achievements

Summary of Programme Achievements 2021-22:

- 8 PCAS operational across the region, all operating to commissioning guidance just months after the mandate and funding for services was announced in October 2020. Seven had been established by the end of 2020, with the eighth becoming operational in April 2021.
- Local and regional Post-COVID Syndrome pathways established for all ages in line with national mandate and NICE guidance
- Regional Children and Young People’s tertiary hub established. Clinics began at Addenbrookes through CUHFT in Dec 2021.
- All systems either developed a tailored programme or worked with other agencies and providers to source appropriate rehabilitation for Long COVID’s diverse range of symptoms, employing a treatable traits approach.
- Regional governance and assurance processes refined and in place
- Local governance and assurance processes established via CCGs, ICSs and providers, collaborative innovative approach
- Regional fora for discussion, assurance and sharing of best practice – steering group, clinical workshops
- Dedicated Programme Manager from November 2021
- 7,480 patients appropriately referred to Post-COVID Assessment Services
- 6,164 patients assessed by Post-COVID Assessment Services
- Activity throughout: assurance and improvement meetings held with each system on a 6-weekly basis. All national assurance reporting templates completed within deadline. Active participation on national steering group and programme board to ensure our services and the needs of our patient population were represented.

COVID-19 rates and PCAS referral rates

Figure 19 shows the COVID-19 incidence rates in England in the period which could have led to referrals into PCAS from April 21 – March 22 (see Figure 19). The referral rate for PCAS across the region has remained steadily high, rather than following the peaks and troughs of COVID-19 infection (see Figure 20,21). This may be as those from the earlier period of infection did not come forward to PCAS until 6-12 months after infection in many cases.

Figure 21 demonstrates the challenge PCAS across the East of England faced over 2021-22, as they worked towards the goal of the number of assessments completed exceeding the number of referrals received. Peaks and troughs in referrals and in staff availability meant services had to be flexible to avoid mounting waiting lists, which had accumulated as services for this new condition got off the ground. While still a challenge at the end of March 2022, the gap between referrals and assessments had significantly reduced and had on several occasions assessments had exceeded referrals.
Figure 19 | Estimated COVID-19 incidence rate per 10,000 people per day in England: Jun 20 - Dec 21

Figure 20 | East of England: Accepted referrals into Post COVID Assessment Centres, April 2021 to March 2022
Figure 21: Assessments vs Referrals 2021-22
Spreading Innovation

The network has supported providers and commissioners of Long COVID services in the East of England by raising the profile of the excellent and innovative work they have carried out since services were first developed. Regionally, the steering group and clinical workshops have allowed productive and engaging discussion and the sharing of ideas across teams, resulting in better services for patients. Nationally, the network has highlighted the work of Cambridgeshire and Peterborough’s service in developing educational videos that were then funded at a national level to be available to services across the country, saving providers clinical time need to reproduce videos and commissioners the funding needed for this work. The work of the Mid and South Essex team to reach isolated and deprived areas with their Long COVID van was also brought to national attention by the network, leading to the promotion of alternative ways to reach isolated communities across the country.
“The NHSE East of England Region has provided significant support to all Post COVID Assessment and Support/Long COVID Services within the region. As Programme Manager, Kirsty Goddard has worked tirelessly to organise the necessary structures for brand new services to operate in. Establishing both operational meeting and clinical forums, with an open invite for the PCAS/LC services to attend, has proved to be extremely supportive. These forums are chaired by Kirsty and have enabled us all to share operational issues, learning needs, discuss new guidance, provide peer support and generally helped us to all work collaboratively, for consistent patient care. To bring so many people together to provide support, listen to issues and seek solutions has been due to the CVDR and Kirsty’s tireless efforts.

Kirsty also maintained open communication between services, region and the national teams. Later when the Service Assurance Framework was introduced, Kirsty helpfully coordinated meetings with services and the respective CCG to complete the AF at regular intervals. This was very helpful as services were overwhelmed with caseloads. They remain this way today but by having a regularly organised meeting to help complete the required timelines, this took a huge weight off our shoulders, helping us to focus on our individual caseloads. Overall, the CVDR and especially Kirsty have been approachable, accessible and extremely supportive and we look forward to continuing this collaborative and successful initiative.”

Alison Wilcox
COVID-19 Rehabilitation Coordinator,
Herts Community Healthcare Trust, East and North Herts
<table>
<thead>
<tr>
<th>Date</th>
<th>Event</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mar 21</td>
<td>Established Post COVID Assessment section of regional Respiratory Network FutureNHS platform site for information sharing. Assurance meetings held with all providers and commissioners to review progress, troubleshoot, and share learning. Report produced on system models and circulated to all.</td>
</tr>
<tr>
<td>Apr 21</td>
<td>8th PCAS operational - Final PCAS in region, in Cambridge &amp; Peterborough.</td>
</tr>
<tr>
<td>May 21</td>
<td>Identification of provider for regional CYP Hub (CUHFT) and development of pathway.</td>
</tr>
<tr>
<td>Jun 21</td>
<td>Additional funding confirmed. Meetings held with commissioners and providers to discuss planning and assurance. PCAS development plans submitted by each system and reviewed by panel. MOUs agreed. Funding released to systems.</td>
</tr>
<tr>
<td>Jul 21</td>
<td>First clinical workshop held – clinical workshops covered a variety of topics every other month, including brain fog, speech and language therapy, peer support.</td>
</tr>
<tr>
<td>Aug 21</td>
<td>UoE PCAS programme manager post advertised, 12 month secondment, working alongside Respiratory Network.</td>
</tr>
<tr>
<td>Sep 21</td>
<td>Recurring 6-weekly assurance meetings established with each system to discuss emerging issues and trends, areas for improvement, share learning, facilitate escalation of risks and issues.</td>
</tr>
<tr>
<td>Oct 21</td>
<td>Programme Manager recruited, start date delayed to allow for backfill of Respiratory post.</td>
</tr>
<tr>
<td>Nov 21</td>
<td>Regional dashboard developed to allow for monthly reporting of key figures, improved data and charts at regional and system level to aid monitoring of progress, identifying trends, lead discussions with national team and systems. Long COVID Clinical Champion post agreed, to support programme.</td>
</tr>
<tr>
<td>Dec 21</td>
<td>Programme Manager began working in Long COVID post full-time</td>
</tr>
<tr>
<td>Jan 22</td>
<td>In contrast to other regions in England, all PCAS in EoE maintained services over Dec 21 - Jan 22 high pressure winter period. 16-17 pathway – ensured this group had access to assessment and treatment where paediatric services are not available - CYP Hub agreed to take direct referrals where appropriate for this group.</td>
</tr>
<tr>
<td>Feb 22</td>
<td>Q4 assurance round confirmed all services offering face to face assessment where needed and appropriate and all had access to some level of diagnostics. Worked with national team to develop national rehabilitation and education video resources using Cambridgeshire &amp; Peterborough service videos.</td>
</tr>
<tr>
<td>Mar 22</td>
<td>Terms of Reference drafted for a specialist GP group to be established to bring together GPs working in Long COVID MDTs, share insights and experience, best practice, innovation, discuss ways to provide education and information for GP colleagues not working within services.</td>
</tr>
</tbody>
</table>
Challenges

- Lack of confirmed long-term funding for services or certainty over financial envelope
- Risk of staff burnout
- Staff sickness (COVID)
- Risk of staff redeployment (COVID and vaccination programme)
- Workforce is limited and heavily drawn on, particularly respiratory physios and Occupational Therapists
- Lack of a knowledge base on Post-COVID - treatable traits approach must be employed as no treatment is available and research not in established phase, expertise is developing rather than being in place
- Continuing development of knowledge around long COVID assessment and treatment means services have to adapt rapidly
- Programme support for Long COVID was combined with Respiratory Network Quality Improvement role – recruitment delays meant Programme Manager undertook dual roles until November 2021.
- Small programme team for Long COVID at a regional level
- Challenges over acceptance of Post-COVID syndrome as a recognised condition – harder for patients to reach services
- Difficult to predict demand for services as new variants have differing impact with regards to acute COVID and Post-COVID syndrome
- Direct access to diagnostics across the region varies
- Data recording and interpretation - systems had to submit data via two reporting mechanisms, concerns re validity of the detail in data (especially re deprivation, ethnicity).

Areas of Focus for 2022/23

- Recruitment of Clinical Champion – completed, in post August 2022
- Health Inequalities group - established and work begun – workshop to be developed
- GP group established to foster discussion and best practice for targeted group – established June 2022
- Peer Review programme – structure to be developed and finalised Q3, first reviews to begin in Q4
- Improving involvement of people with lived experience
- Sustainability of services – looking at how to develop, integrate and sustain services and build services into business as usual at ICS level
- Reduction of rejection rates to below 10% across the region
- Reduction of waits until assessment – target average wait of 6 weeks, no patient to wait longer than 15 weeks.
- Sharing lessons learned from Long COVID work at system and region level to benefit other services
"The network has been invaluable in supporting, educating and guiding my long COVID team. The network give an opportunity to share best practice, ask questions and be supported by other teams to help solve issues. The face to face meeting has given me lots of practical suggestions of how to access difficult to reach groups and a better understanding of what is happening nationally.

Without the support of the regional team and regional network we would have not been able to reduce our waiting list so quickly and accessing difficult to reach groups."

Ruth Barlow
Team Lead for the Long COVID Clinics,
Provide, Mid and South Essex
Our vision at the East of England Diabetes Clinical Network is to improve quality of life and outcomes for people with diabetes, and those at risk of diabetes, by reducing inequality of access to optimal care; driving out unacceptable variation in pathways of care; sharing good practice and supporting clinicians, providers and commissioners to deliver excellence in all aspects of diabetes prevention and care.

This is pursued through regional support for local management and national programmes.

With several new staff starting in 2022 after a hiatus following previous retirement and redeployment, the Diabetes Clinical Network started to progress work on priorities, along with our two clinical leads, Professor Gerry Rayman and Dr Chirag Bakhai.

- Post-pandemic we were at an early stage with developing governance structures but continued to develop excellent relationships with all 6 newly forming ICSs and other stakeholders, including Diabetes UK.

- Assurance processes were set up for the next year via quarterly regional Oversight Group meetings and Diabetes Programme Board meetings, as well as ad hoc meetings for specific projects and programmes.

- Regular attendance and contribution to ICS meetings related to diabetes was instigated, for assurance and to explain potential pilots and funding for the region alongside championing national policy and guidance.

- Primary care/ICS business planning assurance processes were ongoing with a focus on the use of Transformation Funding and Recovery Innovation Funding; some implementation was delayed - looking towards further restoration of services in 2022/23.

- Dissemination of data on diabetes care processes and outcomes was an important part of supporting the ICS to set up and plan for the next year.

- Health inequalities data was reviewed and disseminated, and used to inform local plans, especially for the use of specific diabetes programme funding – for example deprivation data for the diabetes prevention programme, and flash glucose monitoring.

- Webinars to support ICSs, attended by 52-89 people from every area:
  - Recovery in Diabetes Care - 3rd March 2022
  - Diabetes in Pregnancy - 8th March 2022
  - Implementing Diabetes Technology - 5th July 2022
NETWORK PRIORITIES FOR 2021-22

Long Term Plan and national priorities for people with diabetes:

- Universal access to Multi-Disciplinary Footcare Teams
- Universal access to Diabetes Inpatient Specialist Nurses
- Further expansion of provision of structured education
- Recovery of diabetes management within primary care to include achievement of diabetes treatment targets and reduction in variation
- An increase referrals and uptake of the NHS Diabetes Prevention Programme
- Minimum of 20% of people living with Type 1 diabetes to access flash glucose monitoring devices subject to clinical criteria
- Support Low Calorie Diet national pilot within Bedfordshire, Luton and Milton Keynes

- From March 2021 all pregnant women with type 1 diabetes to be offered continuous glucose monitoring (CGM)
- From October 2021: new national plan for improving care and outcomes for children and young adults with diabetes (CYA) aged up to 25 years. To work jointly with NHSEI Children & Young People Clinical Network and local CYP Diabetes Network
- Start of pilot in the East of England region and Wales, for a national diabetes inpatient accreditation scheme with the Royal College of Physicians (RCP)
Network Team

Wayne Bartlett-Syree
Senior Responsible Officer to January 2022

Dr Melanie Iles
Senior Responsible Officer from January 2022

Professor Gerry Rayman
Clinical lead, Secondary Care (new in 2021)

Dr Chirag Bakhai
Clinical lead, Primary Care

Fiona Oliver
Quality Improvement Manager to December 2021

Clare MacArthur
Quality Improvement Manager from December 2021

Mansi Khadia
Quality Improvement Project Officer from February 2022

Ryan O’Neill
Senior Informatics Data Analyst from February 2022

Paula Sumray
Business Support Officer to January 2022

Claire Doney
Business Support Officer from January 2022
"As an integral member of the East of England Strategic Diabetes Oversight Group, along with our excellent direct working relationship with the NHSE Quality Improvement team, we have been able to share and develop initiatives and enhance patient experience across the region. Diabetes UK have enjoyed working collaboratively and productively with East of England NHS England on a number of projects and initiatives. Patients across the region will have benefited from our joint work, leading towards improved health outcomes and in equalising variations in care."

Peter Shorrick
Head of Midlands & East of England at Diabetes UK

David Robinson
Health Systems Engagement Manager at Diabetes UK
Network Performance and Achievements

Diabetes Transformation Fund

Transformation funding was designed to be used to improve treatment and care for adults and children diagnosed with Type 1 or Type 2 diabetes. This included:

- reducing the number of amputations by improving access to multi-disciplinary foot care teams (MDFT)
- reducing lengths of hospital stays by improving access to specialist inpatient support (DISN)
- increasing uptake of structured education
- improving achievement of the NICE recommended treatment targets (HbA1c, blood pressure and cholesterol for adults, HbA1c only for children).

Access to MDFT in the East of England. By autumn 2021, 7/13 Trust’s patients had access to MDFT services; by March 2022, all had MDFT recruited or had plans in place with the exception of one Trust which continues to be supported by the network.

Access to DISN in the East of England. By November 2021, 12/13 relevant Trusts had a DISN service, the remaining Trust was funded and recruiting.

Structured Education. Further expansion of provision of structured education – people being offered a validated course within 12 months of diagnosis of diabetes – this was not an immediate priority following the COVID pandemic, although achievement was very low, and will be a focus in 2023/24. However, for reporting purposes from the national diabetes audit (NDA) data recorded for 2020/21 (see Table 1 and 2).

**Table 1-2** Patients with Type 1 and Type 2/other diabetes being offered structured education

<table>
<thead>
<tr>
<th>People with type 1 diabetes</th>
<th>NDA 2020/21 data by ICS</th>
<th>Offered structured education %</th>
<th>Attended structured education %</th>
</tr>
</thead>
<tbody>
<tr>
<td>BLMK</td>
<td>40.6</td>
<td>12.5</td>
<td></td>
</tr>
<tr>
<td>C&amp;P</td>
<td>47.4</td>
<td>7.9</td>
<td></td>
</tr>
<tr>
<td>HWE</td>
<td><strong>36.2</strong></td>
<td>4.3</td>
<td></td>
</tr>
<tr>
<td>MSE</td>
<td>44.4</td>
<td>11.1</td>
<td></td>
</tr>
<tr>
<td>N&amp;W</td>
<td>40.0</td>
<td>5.7</td>
<td></td>
</tr>
<tr>
<td>SNEE</td>
<td>50.0</td>
<td>27.3</td>
<td></td>
</tr>
<tr>
<td><strong>East of England average</strong></td>
<td><strong>43.2%</strong></td>
<td>11.2%</td>
<td></td>
</tr>
<tr>
<td><strong>England average</strong></td>
<td><strong>40.0%</strong></td>
<td>7.2%</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>People with type 2 diabetes/other types</th>
<th>NDA 2020/21 data by ICS</th>
<th>Offered structured education %</th>
<th>Attended structured education %</th>
</tr>
</thead>
<tbody>
<tr>
<td>BLMK</td>
<td>70.4</td>
<td>21.1</td>
<td></td>
</tr>
<tr>
<td>C&amp;P</td>
<td>73.5</td>
<td>16.2</td>
<td></td>
</tr>
<tr>
<td>HWE</td>
<td>70.5</td>
<td>14.3</td>
<td></td>
</tr>
<tr>
<td>MSE</td>
<td>73.4</td>
<td>17.7</td>
<td></td>
</tr>
<tr>
<td>N&amp;W</td>
<td>73.2</td>
<td>10.0</td>
<td></td>
</tr>
<tr>
<td>SNEE</td>
<td>70.8</td>
<td>20.4</td>
<td></td>
</tr>
<tr>
<td><strong>East of England average</strong></td>
<td><strong>72.0%</strong></td>
<td><strong>16.4%</strong></td>
<td></td>
</tr>
<tr>
<td><strong>England average</strong></td>
<td><strong>75.4%</strong></td>
<td><strong>13.0%</strong></td>
<td></td>
</tr>
</tbody>
</table>
Recovery of diabetes care within primary care in 2021/22 (Eight Routine Care Processes)

As the relevant NICE guidance states, people should be offered their eight routine care processes (e.g., HbA1c, BP, foot checks) by their GP/Primary Care provider annually. Retinal screening, the ninth care process is mostly biennial and is part of the national screening programme, so is not reported here. Comprehensive measurement of the eight care processes enables more people to be supported to meet their treatment targets and diabetes-related deterioration or complications are more likely to be avoided. In 2021/22 there was a stronger focus on return to pre-COVID achievement as a minimum.

In East of England most systems were still below pre-COVID achievement and at low levels, but performing well comparatively (see Figure 23). In 2021/22:
- 49.8% of people with type 2 diabetes had all 8 CPs measured
- Second highest in England - national average of 47.8%
- 35.6% of people with type 1 diabetes had all 8 CPs measured
- Joint highest in England - national average of 32.8%
- All systems are improving measurement and attainment in comparison to 2020/21 (pandemic). MSE exceeded their pre-pandemic achievement, however they were the lowest achievers in region beforehand
- 3 PCNs, in MSE Basildon & Brentwood and Thurrock, and in North-East Essex CCG, were specially commended for recovery of services by the national diabetes audit team. Only two other sites in England were highlighted.

Figure 22| Percentage of Type 2/other patients who attended structured education

![Percentage of Type 2/other patients who attended structured education](image)
Recovery Innovation Fund outcomes

In response to challenges resulting from COVID-19, the Diabetes Recovery Innovation Fund (RIF) was to support targeted projects that enabled more people to have routine care processes, so that diabetes-related deterioration or complications were avoided, and people were supported to meet their treatment targets. Recovery innovation funding from the national diabetes team was awarded to the following systems:

- Mid and South Essex
- Hertfordshire and West Essex
- Norfolk and Waveney
- West Suffolk CCG

Figure 23 | Percentage of Type 2/other patients who received all eight care process checks
Referrals are steady overall with Norfolk and Waveney having increased their attainment significantly over the last year from a lower base.

Attendance (MS1 as below) is good overall. Cambridge and Peterborough (C&P) referrals and subsequent attendance were particularly affected and remain low since the pandemic.

To date, there have been 15840 participants who have been referred and then gone on to attend the 6 month session (see Figure 24); 13169 have a valid weight recorded at both IA and 6 months. The mean weight change is -3.2kgs although this is not the only target as not all are overweight.

Other highlights include:
- Referrals are steady overall with Norfolk and Waveney having increased their attainment significantly over the last year from a lower base.
- Attendance (MS1 as below) is good overall.
- Cambridge and Peterborough (C&P) referrals and subsequent attendance were particularly affected and remain low since the pandemic.

The NHS Diabetes Prevention Programme identifies people at risk of developing type 2 diabetes and refers them onto a nine-month, evidence-based lifestyle change programme. This is available both as a face-to-face group service and as a digital service.

To date, there have been 15840 participants who have been referred and then gone on to attend the 6 month session (see Figure 24); 13169 have a valid weight recorded at both IA and 6 months. The mean weight change is -3.2kgs although this is not the only target as not all are overweight.

Other highlights include:
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- Attendance (MS1 as below) is good overall.
- Cambridge and Peterborough (C&P) referrals and subsequent attendance were particularly affected and remain low since the pandemic.

All similar to the England position, of the referrals who have attended an initial assessment:
- 47% were male and 63% were aged less than 70
- 14% were of black, Asian, mixed or ‘other’ ethnicity
- 9% were from the most deprived quintile compared to 25% from the least deprived
- 16% are of normal weight (BMI 18-24.9), 33% overweight (BMI 25-29.9) and 45% obese (BMI >30)

Figure 24| Referrals and Milestone 1 from Healthier You Programme in the East of England (April 2021 - March 2022)
National low calorie diet pilots for people with type 2 diabetes

Low calorie diets (LCD) are being piloted in England as they have been shown to put type 2 diabetes in remission in those diagnosed within 6 years. Helping people with type 2 diabetes to lose weight and make better decisions about their health, low calorie diets enable better control of blood sugar levels – reducing the need for diabetes-related medication and potentially achieving remission of type 2 diabetes when their levels return to a non-diabetic range.

In the research, after 2 years, 36% of participants were in remission, with a non-diabetic range HbA1c after withdrawal of diabetic medication. Participants are supported to replace all meals with total diet replacement products “soups and shakes” for the first 12 weeks, and then receive support and monitoring up to 12 months including help to re-introduce real food after the initial 12-week period.

- BLMK were in the first-wave pilots and from autumn 2020 – March 2022, 339 people had started total diet replacement; the target is 750 people by May 2023 In BLMK average weight loss is strong, with a mean weight loss of 12.3kg at 12 weeks, rising to 12.8kg at 6 months. This shows ‘real-world’ achievement even during the pandemic, and matches the research

- MSE are in the second wave with their programme due to be operational after March 2022

Continuous glucose monitoring in pregnancy (CGM)

Funding allows pregnant women with Type 1 diabetes to access a Continuous Glucose Monitor for 12 months, which is worn on the skin, monitors the glucose level and automatically alerts users if their blood sugar is high or low, to help them control their diabetes throughout their pregnancy. This helps lower risk during pregnancy. Trials link CGM with a reduction in rates of pre-eclampsia for pregnant women with type 1 diabetes, and a reduction in adverse neonatal outcomes (large for gestational age, neonatal hypoglycaemia and neonatal intensive care admission) for their babies.

Target:- from March 2021 all pregnant women with type 1 diabetes to be offered continuous glucose monitoring (CGM). Local Maternity and Neonatal Services are responsible for returns to the national team and all areas performed well and in line with other regions (see Table 3).

As an illustration, the 86 CGMs started in three months (Oct – Dec 2021) would avoid:
- 14 neonatal unit admissions
- 14 large-for-gestational-age infants
- 10 neonatal hypoglycaemia events (and more)

Table 3 | CGM in Pregnancy Submissions for Q3 and Q4

<table>
<thead>
<tr>
<th></th>
<th>No. newly pregnant with type 1</th>
<th>Ineligible for CGM funding (may already be using)</th>
<th>Eligible for funded CGM</th>
<th>Offered</th>
<th>Declined</th>
<th>Unable to access</th>
<th>No. prescribed</th>
<th>No. not tolerating</th>
<th>% offered (eligible/offered)</th>
<th>% prescribed (prescribed/eligible)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Q3 2021/22</td>
<td>106</td>
<td>7</td>
<td>99</td>
<td>99</td>
<td>13</td>
<td>7</td>
<td>86</td>
<td>2</td>
<td>100%</td>
<td>87%</td>
</tr>
<tr>
<td>Q4 2021/22</td>
<td>105</td>
<td>3</td>
<td>102</td>
<td>102</td>
<td>8</td>
<td>6</td>
<td>88</td>
<td>4</td>
<td>100%</td>
<td>86%</td>
</tr>
</tbody>
</table>
Collaborative working with Children and Young People Network

From Autumn 2021 plans and funding for a new programme for children and young adults with diabetes (CYA) were announced – to work jointly with NHSE Children & Young People (CYP) Clinical Network and the local CYP Diabetes Network. Two of the programme aims are specific to our network:

- Improving care for those with diabetes transitioning from paediatric to adult care and addressing the poorer outcomes for children and young adults aged up to 25 years at transition – funding for national pilots to improve outcomes was announced in March 2022
- Reducing health inequalities and variation in outcomes for children and young adults with diabetes, including more equitable access to treatment technology – this is to be started in 2022/23

A CYA steering group was set up with all stakeholders to plan for future work with a view to setting up the process of assessing Expressions of Interest and recommending areas to the National Diabetes Programme Team for the Transition and Young Adult pilots – initially collating data, and planning to recruit clinical leads.

The Diabetes Inpatient Care Accreditation Programme

The Diabetes Inpatient Care Accreditation Programme, in collaboration with the Royal College of Physicians, aims to enable standardisation and improvement in care for inpatients with diabetes. An accreditation process was to be trialled in the East of England and Wales, prior to a national roll-out, expected in 2023/24.

- Standards were written and tested locally to inform national plans

- With promotion from the network, by March 2022 nine pilot sites representing every ICS in the East of England had been recruited successfully

Flash Glucose Monitoring

A glucose monitoring device (currently Libre) is worn on the upper arm to monitor glucose levels when scanned by a reader or mobile phone, reducing the need for finger pricking. This enables a review of blood glucose levels day and night. Thus people can see and understand how food, activity, and other things affect their blood glucose levels, thereby enabling them to improve their control. Previously, most people would have had to self-fund these devices at a cost of around £100 per month – leading to evident and persistent disadvantage for those that could not fund or chose not to.

Key Programme Highlights include:

- National priority: by March 2021, minimum 20% of people living with Type 1 diabetes who were eligible under clinical criteria should be accessing flash glucose monitoring devices - all East of England ICS achieved this measure
- In 2021/22 this 20% funding was added to baseline – the uptake increased over the year but remained well below the England average and NICE guidance in spring 2022 was expected to increase eligibility without extra funding attached
- Inequality will be monitored and highlighted where needed, to promote mitigating action
- Q3 data shows that the region achieved the minimum target of 20% but is behind the national implementation of flash glucose monitoring (see Figure 25).
Figures 25: Flash Glucose Monitoring - Q1, Q2, Q3 & Q4: 21/22

Proportion of identified patients with Type 1 Diabetes prescribed Flash by ICS for East of England (based on CCG data and T1 population data for 2020/21)

<table>
<thead>
<tr>
<th>STP</th>
<th>Total spend</th>
<th>Sensors prescribed</th>
<th>Number of patients</th>
</tr>
</thead>
<tbody>
<tr>
<td>Bedfordshire, Luton and Milton Keynes STP</td>
<td>£335,808.48</td>
<td>11,758</td>
<td>1,996</td>
</tr>
<tr>
<td>Cambridgeshire and Peterborough STP</td>
<td>£250,414.08</td>
<td>8,766</td>
<td>1,454</td>
</tr>
<tr>
<td>Hertfordshire and West Essex STP</td>
<td>£460,613.28</td>
<td>16,338</td>
<td>2,741</td>
</tr>
<tr>
<td>Mid and South Essex STP</td>
<td>£475,806.60</td>
<td>16,660</td>
<td>2,810</td>
</tr>
<tr>
<td>Norfolk and Waveney Health &amp; Care Partnership (STP)</td>
<td>£395,126.00</td>
<td>13,975</td>
<td>2,413</td>
</tr>
<tr>
<td>Suffolk and North East Essex STP</td>
<td>£454,732.32</td>
<td>15,922</td>
<td>2,713</td>
</tr>
</tbody>
</table>

Suffolk and North-East Essex 53%
Mid and South Essex 49%
Bedfordshire, Luton and Milton Keynes 45%
Norfolk and Waveney Health & Care Partnership 43%
Hertfordshire and West Essex 41%
Cambridgeshire and Peterborough 33%

Annual Report 2021-22
Latest flash glucose monitoring results for England – deprivation inequality

The inequality ratio refers to the ratio between the proportion of people with Type 1 Diabetes prescribed flash in the least deprived quintile, compared to the most deprived quintile. The closer the inequality ratio is to 1, the more equal the prescription patterns are for that geographical area.

Historically the East of England has performed well – least inequality - but the ICS detail shows variation: Hertfordshire and West Essex were at 1.6 in Q3 – above the national average (see Figure 26).

Health inequalities data was reviewed and disseminated, and used to inform local plans, especially for the use of specific diabetes programme funding – for example deprivation data for the diabetes prevention programme, and flash glucose monitoring.

Webinars to support ICSs, attended by 52-89 people from every area:
- Recovery in Diabetes Care - 3rd March 2022
- Diabetes in Pregnancy - 8th March 2022
- Implementing Diabetes Technology - 5th July 2022

Figure 26: Prescribing inequality ratio by region over time (based on patient deprivation)
"Our jointly organised Implementing Technology webinar on 5th July attended by just under 100 delegates including Commissioners, Clinicians and medicines management leads was well received by all attendees. In gaining an understanding of the barriers to access, this has enabled practical steps to be taken towards improving uptake in technology for patients including flash glucose monitoring.

Through NHSE regional funding we are in the process of delivering an innovative patient and public involvement two year programme, which will benefit thousands of people with diabetes through a series of patient engagement events, living with diabetes days, distribution of thousands of patient information packs supporting self-management and signposting patients to key support services.

We will also be disseminating our healthcare essentials leaflets through ICS’s and retinal screening programmes.

Last year we worked with the East of England Maternity Services and Royal College of Midwifery in delivering our 10th Diabetes in Pregnancy UK Conference. With over 700 healthcare professionals attending, this has now become the largest single specialist diabetes in pregnancy conference in Europe.

Our partnership working is enabling us to reach, support and enhance the quality of care for so many patients across the East of England. The work and promotional support from the CVDR Clinical Network has contributed significantly to the success of our collaborative efforts."

Peter Shorrick
Head of Midlands & East of England at Diabetes UK

David Robinson
Health Systems Engagement Manager at Diabetes UK
Challenges

- A full personnel change in the network team resulted in some delays and reorganisation.

- Several new programmes/pilots became available with funding in 2022 from the National Diabetes Programme.

- ICS personnel that work on the diabetes programmes, and Trust, community and primary care staff were significantly affected by the continuing pandemic, with the Omicron variant leading to many being redeployed or ‘less urgent work’ being delayed, over winter 21/22, all of which affected recovery as operational plans were delayed.

- ICS staff roles were also under some uncertainty due to the formal process for CCG to ICS transition.

- Cost pressures and specialist workforce scarcity also delayed achievement of the objectives, for example in recruitment to podiatry posts.
Areas of Focus for 2022/23

National policy drives much of the Diabetes Clinical Network agenda and will continue to do so in future years, with regular assurance and delivery meetings with the National Diabetes programme team for the various programmes described above. In addition, two Deep Dives occur each year to focus on this work.

Further work will be undertaken around the governance and the most effective way to support and assure local diabetes programmes, with a specific emphasis on the following areas:

- Focus on restoring the identification, monitoring and management of all types of diabetes; urgent return to pre-COVID achievement as a minimum, with assurance of plans in place.

- Increase primary care referrals to the NHS Diabetes Prevention Programme (all ICS).

- Increase primary care referrals to the NHS Low Calorie Diet programme pilots - now two ICS have LCD pilots, further support and assurance required.

- Refocus on structured education, including facilitating access to nationally commissioned digital structured education programmes.

- Trusts should have a DISN service and all people with diabetes have access to a MDFT (if required) by March 2023. Local sustainability plans should be in place to ensure that these services are locally funded from April 2023.

- New emphasis expected on specialist care outcomes – diabetes-related emergency admissions, amputations, length of stay.

- Ensuring people with diabetes can access glucose monitoring (flash/continuous glucose monitoring) in line with updated NICE guidance (NG 17, 18 & 28, April 22) - increasing uptake and reducing variation from a low start compared to rest of England.

- Planning for Living with Diabetes days for each ICS x 2 in 2022/23; facilitated by Diabetes UK using a memorandum of understanding, we are offering patient and public engagement events based around previously successful ‘Living with Diabetes’ days, where we have added in a process for gathering feedback and patient voice. These will be targeted to areas that have traditionally had less engagement in patient and public voice.

- Others:
  a. Promoting participation in the National Diabetes in Pregnancy audit in conjunction with Maternity Clinical Network
  b. Promoting participation in National Diabetes Footcare Audit
  c. Improving outcomes for children & young adults with diabetes
     i. Supporting/assuring our two new national pilot sites (Ipswich & ES and NNUH) for improving transition and young adult care
     ii. Further programme expected around variation in tech use for children and young adults with diabetes
  d. Supporting/assuring the new Type 1 Disordered Eating (T1DE) national pilot site (NNUH)

- Diabetes Inpatient Care Accreditation Programme pilots with the Royal College of Physicians - national diabetes inpatient accreditation scheme for England and Wales – for England the 9 sites are all in our region.

- Health inequalities to be addressed especially in provision of care from planning to evaluation of outcomes.
Diabetes Network

EoE Diabetes Clinical Network:
Diabetes Oversight Group

Joint CYA &
Diabetes Steering Group

Technologies Group

Primary Care Group

Practitioner forums:
Independent Prescriber’s

Established to review and provide constructive feedback regarding the ICS implementation of the national diabetes programme and the diabetes commitments set out in the NHS Long Term Plan.

Small executive group with representation from each system, patient voice, regional representation. Monitoring the progress of the network against the workplan and identifying areas of work.

Examine region wide issues performance and best practice to identify and lead on actions.

Share best practice, common problems, forum for workshops and talks. Use NHS Futures to collaborate.
To find out more about the work of the East of England CVDR and Diabetes Clinical Networks, please visit our websites:


Cardiac Clinical Network Microsite: https://future.nhs.uk/NationalCardiacImprovement/view?objectId=31908688


Respiratory and Long COVID Clinical Networks: www.future.nhs.uk/EOErespiratorynetwork

Diabetes Clinical Network: https://future.nhs.uk/EOEDCN

For general enquiries, please find the below email addresses for each clinical network:

Cardiac Clinical Network: england.eoecardiacnetwork@nhs.net

Integrated Stroke Delivery Networks: england.eoestroke@nhs.net

Respiratory and Long COVID Clinical Networks: england.eoerespiratorynetwork@nhs.net

Diabetes Clinical Network: england.eoediabetescn@nhs.net

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