GREEN TEAM COMPETITION

CENTRE FOR SUSTAINABLE HEALTHCARE

2025 IMPACT REPORT

Norfolk and Norwich University Hospitals NHS Foundation Trust

NHS
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NHS Foundation Trust

CENTRE *for* SUSTAINABLE HEALTHCARE
inspire • empower • transform

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BACKGROUND

In May 2025, Norfolk and Norwich University Hospitals NHS Foundation Trust (NNUH) commenced a Green Team Competition in partnership with The Centre for Sustainable Healthcare (CSH). The Green Team Competition is a clinical leadership & engagement programme for NHS organisations wishing to improve the sustainability of their service.

CSH has worked directly with six clinical teams across NNUH to add sustainable value within their service via mentoring in the use of Sustainability in Quality Improvement (SusQI) methodology. SusQI is an approach to improving healthcare in a holistic way, by assessing quality & value through the lens of the sustainable value equation (Figure 1). The 6 teams were encouraged to consider each element of sustainable value to identify high impact improvement ideas then plan, implement & measure the impact of their projects.

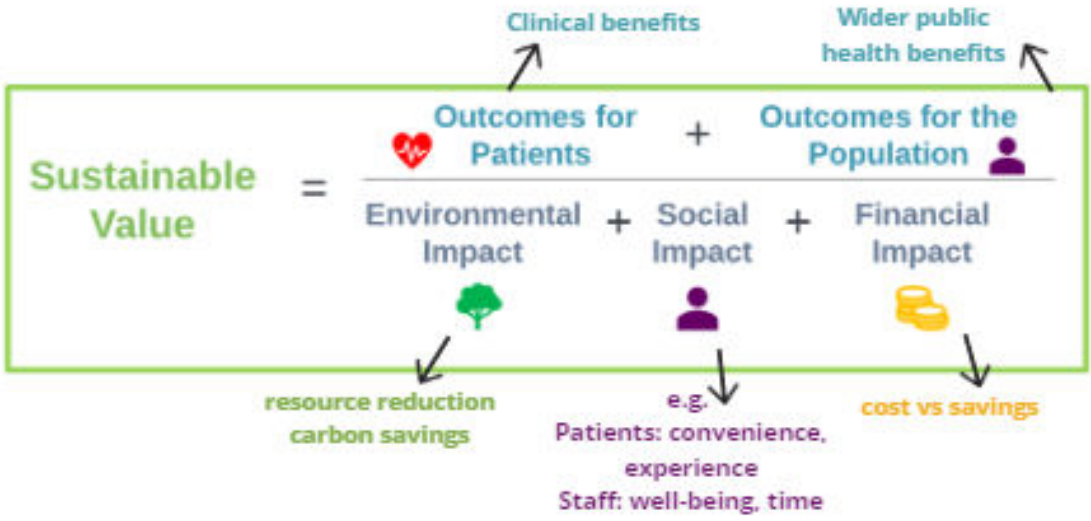
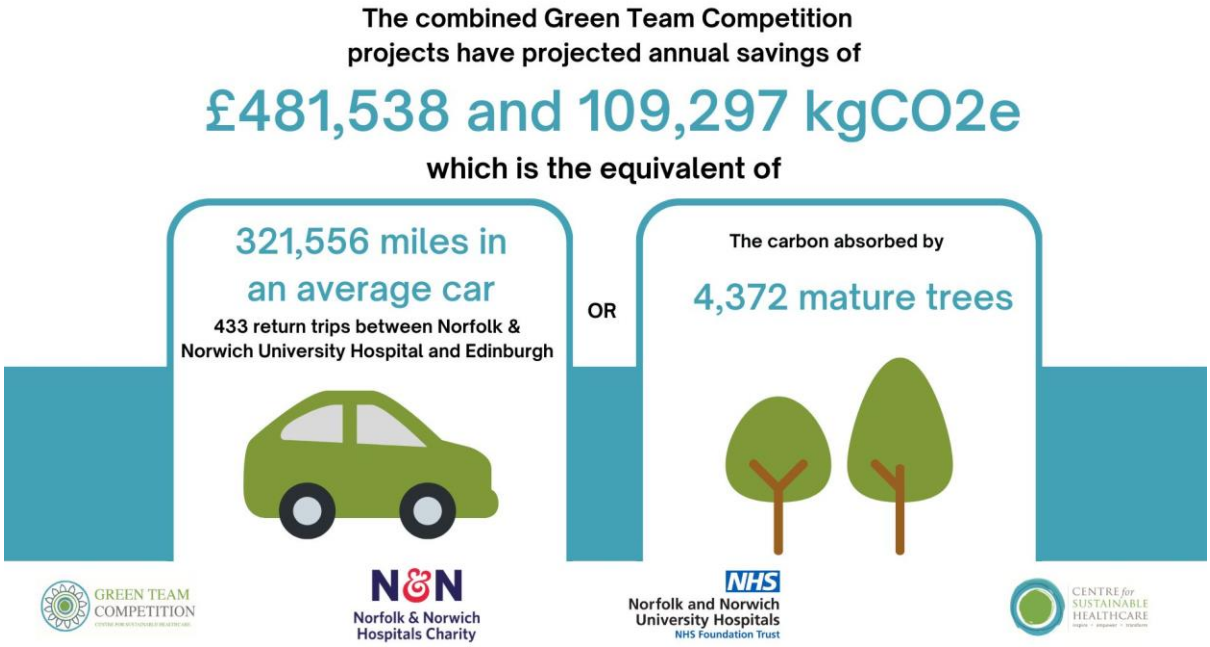


Figure 1. Sustainable Value Equation Source: Centre for Sustainable Healthcare

At the September 16th Showcase event, the teams presented their projects, including the anticipated savings & opportunities for next steps to their fellow teams and judging panel.

TRUST WIDE - POTENTIAL ANNUAL SAVINGS



For a breakdown of savings & impact across the sustainable value equation, please see Appendix 1.

"QUOTE"

PERSON AND TITLE,
Norfolk and Norwich University Hospitals NHS Foundation Trust

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COMPETITION ENTRIES - INDIVIDUAL PROJECT CASE STUDY REPORTS

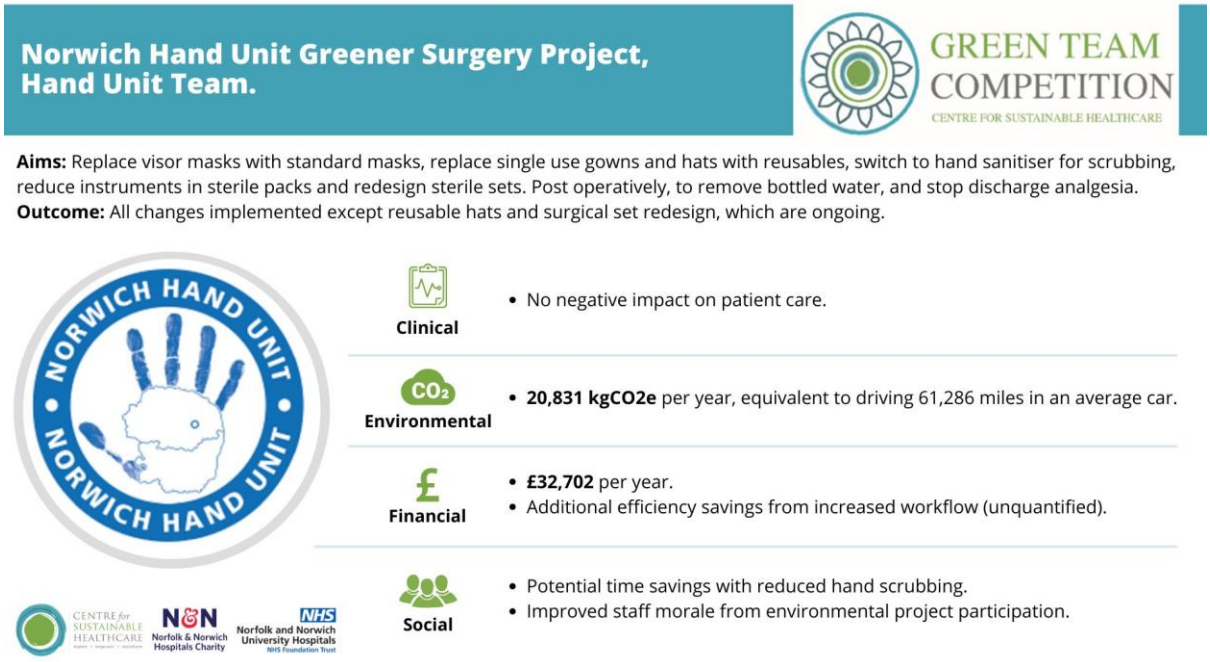
Please click the links below which will take you to the project summary and report in the CSH Sustainable Healthcare Resource Library.

1. Hand Surgery Team: Hand unit greener surgery
2. Emergency Department Nursing team: Encouraging slow IV push of antibiotics (tazocin, teicoplanin, ceftriazone) in place of saline bag administration
3. Recognise and respond team: Rehabilitation Assistants in supporting the recovery of critical care step-down patients
4. Clinical and biomedical sciences team: A sustainable clinical blood sample transport system
5. Anaesthetics team: Ditch the Incopad
6. Radiology team: Reducing patient travel by providing "same day" ultrasound and nuclear medicine appointments

HIGHLY COMMENDED: Emergency Department Nursing

WINNERS: Hand Surgery Team

The team introduced a series of improvements to their scrubbing and post-operative procedures, achieving meaningful change in a short space of time. This success reflects their strong teamwork and a proactive approach to making care safer and more effective for patients.



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NEXT STEPS

Having run these pilot projects, we encourage the teams and organisation to build on this initial phase by embedding and spreading projects, and/or continuing to work towards longer term aims. We encourage senior management, sustainability and improvement teams at WWL to provide ongoing support to the teams and to spread suitable projects to other areas to grow impact.

ACKNOWLEDGEMENTS

CSH would like to thank the teams for all their enthusiasm, dedicated work & creativity in devising and completing their projects.

Thank you to
Ellen Goodwin, Sustainability Manager and Dr Amy Greengrass, Consultant Paediatric Anaesthetist and Clinical Lead for Sustainability for partnering with us and their planning and coordination at NNUH to ensure the competition and event was a success.

Thank you to Hiroko Spooner, Clinical Quality Improvement Lead for Medicine, Katie Smith, Senior Quality Improvement Advisor and Stacy Hartshorn, Quality Improvement Lead form the Quality Improvement and Clinical Excellence Team for the support they provided to participating teams.

Thank you to our judging panel for your time and keen interest in the projects.

- Dr Mike Irvine, Clinical Director (Planned Care), NNUH
- Eva Zaprel, Patient Panel representative, NNUH
- Dr Hayley Pinto, Education and Training Lead, The Centre for Sustainable Healthcare

Thank you to Rosie Hillson, Sustainability Analyst, CSH, for her careful and highly skilled work in carbon footprinting. Rosie supported the teams in carrying out their own carbon footprinting and equipped teams with the knowledge and tools to carry out future calculations for projects in the future. Carbon calculations are essential to integrated project reporting and make plain the true cost and impacts of services to allow more responsible decisions to be made in healthcare organisations.

POTENTIAL ANNUAL SAVINGS

The following table provides detail on the projected **annual** savings to the Trust from the 2025 Green Team Competition. Savings in black text are based on actual changes implemented while savings in blue text are based on pending or proposed changes with impact modelled on available data and assumptions.

Project	Financial Outcomes	Environmental (CO2e) Outcomes	Scale of change	Social Outcomes	Clinical Outcomes
Paediatric Radiology	Neutral	595	Cohort of 23 patients across 1 year who require both tests within same timeframe.	• Parents valued only having to come to hospital once instead of twice, especially those who lived further away. • May reduce inconvenience to parents (time off work, childcare) etc and reduces days lost from school. • Potential for increased job satisfaction • May be short-term negative impact for booking staff due to increased time requirements.	• By having both US and NM scans on the same day, we anticipate this may reduce the risk of patient Did not attend (DNA) rates improving timeliness of care. • The change may reduce clinical admin time therefore releasing time for other patient activities.
Emergency Department Nursing team	2,954	450	ED Department	• 48% staff reported feeling more confident using IV push • 42% reported IV push improved workflow. 27% reported it delayed workflow which contradicts existing research that IV push can improve nursing satisfaction and efficiency • 69% staff said they will go with the environmentally sustainable option. • IV push shortens administration time which can increase patient comfort and allow greater mobility as they are not attached to a drip for 30 minutes.	• Patients continue to receive medication they require as per evidence based guidance. • Clarity of guidance across team has potential to optimise patient safety, though risks were already minimal. • Sepsis management may be more efficient and timely as IV push administration can reduce time between when antibiotic is ordered to administered.
Recognise and Respond Team	422,435	64,598	Based on average of 578 patients that meet rehab criteria (preventing 1,734 bed days).	• Both patients and rehabilitation staff benefited from continuity in patient care (patients seen by same staff during and post-critical care). • Patients highlighted benefits for mental health, mobilisation, and reassurance. Earlier discharge improves wellbeing and comfort for patients and families. • Rehabilitation assistants valued joint visits and phone support with recognise and respond team. • Rehabilitation assistants felt positive about both patient outcomes and the environmental impact of their roles.	• Average length of stay from critical care step down to hospital discharge reduced 3 days indicating more effective, timely and personalised care. • Patients discharged to usual residence increased from 82% to 83.73%. • Improved signposting to other services (e.g. mental health). • Literature supports continuation of therapy post critical care step down to optimise recovery.

Project	Financial Outcomes	Environmental (CO2e) Outcomes	Scale of change	Social Outcomes	Clinical Outcomes
Hand Surgery Team	32,702	20,831	Based on an average of 240 cases per month in Norwich Hand Unit, Ambulatory Procedure Unit theatre	• There have been no disruptions to patient experience • Positive staff feedback and improved morale. Staff report improved awareness of environmental issues indicating greater understanding of environmental responsibility. Sustainable practices have been embedded into team culture.	• There are no changes to patient care or outcomes anticipated.
Pathology Team	22,475	19,937	5 GP practices conducting approximately 3000 potassium tests per month.	• Reduction in complaints from patients woken by 111 overnight, only to have a normal potassium result when repeated in a hospital setting. • Reduced disruption in needing to attend hospital both for patients and family/carers. • Several laboratory reception staff have previously voiced concerns about the large number of single use plastic used. • Time saved from not needing to open plastic bags containing samples and from reduced time spent booking repeat blood tests and phone calls regarding raised results.	• Reduction in falsely raised potassium levels due to cold weather during transit reduced. This will prevent patients requiring repeat blood samples and for those potassium results of 6.5 mmol/L or above, a trip to A&E for an ECG investigation, supporting more timely and efficient care. • Potential for falsely reduced potassium levels due to high temperatures in summer to be reduced.
Anaesthetics Team	972	2,886	Prevention of approximately 13,892 incopads used by anaesthetics teams across theatres.	• Improves workflow efficiency: Reduced tasks such as ordering, stocking, and disposing large volumes of incopads • Staff agreed incopads were often used inappropriately and expressed support for change. • Staff reported frustration with wasted disposables • Opportunity for staff to feel empowered in making a positive environmental impact, which can improve morale and team cohesion. • Maintaining patient dignity supports staff in delivering care they feel proud of	• Using a reusable item designed to prevent pressure injuries may be more appropriate and dignified for patients compared to a single use incopad.
Total Savings	**£481,538**	**109,297 kgCO2e**			