



Handmade in Epsom and Ewell: local makers unite to support Epsom Foodbank

Handmade in Epsom and Ewell (HiEE) will hold its first community event, *The Festive Makers Fair*, on Saturday 29th November 2025 from 10am to 3pm in the Youth Hall at Epsom Methodist Church, Ashley Road (KT18 5AQ).

The fair will offer an affordable platform for local artisans to showcase their handmade products while supporting a vital community cause. All proceeds from the event, apart from stallholder sales, will be donated to Epsom Foodbank.

HiEE was founded by a group of local makers keen to create a space where craftspeople from within the borough can share their work and at the same time raise funds for charity. The organisers are particularly encouraging new makers to take part, alongside some of the area's more established names.

Visitors will find a range of handmade gifts and festive items including soaps, ceramics, upcycled furniture, art, jewellery and metalwork, all produced in Epsom and Ewell. Prices will range from pocket-money treats to larger special gifts. Twenty-two local makers are already confirmed, including Annette's Gemstones Jewellery, Bird & Bear Soaps, Colour and Sparkle, EpsomPots, H for Handmade, Martha Moon Creations, Surrey Woodcraft and Wadey Smithing.

Adding to the festive spirit, The AMP Voices choir from Nescot College will perform in the Roots Coffee Shop at the Methodist Church, which will be open for refreshments and cakes throughout the day.

All funds raised from event profits and entrance donations will go directly to Epsom Foodbank. Entry is by a suggested £1 donation. Attendees are also invited to bring non-perishable food items for the foodbank's Christmas drive. A list of items particularly needed can be found at epsomewell.foodbank.org.uk/give-help/donate-food.

Organiser Janice Heyes said: "We really hope the Epsom and Ewell community will support this event which is taking place right in the heart of town. Shoppers will find unique handmade Christmas gifts made with care and passion while giving something back via the Epsom Foodbank. This really is an event run by the community for the community."

The event is being coordinated by volunteers Imogen Curran, Janice Heyes, Jo Jones and Helen Worwood, supported by local craftspeople and small businesses. The group hopes that this first fair will be the start of an annual tradition, with future events expanding the initiative's reach and community impact.

For more information visit www.handmadeinepsomandewell.co.uk or follow @Handmadeinepsomandewell on Facebook and Instagram. Enquiries can be sent to handmadeinepsomandewell@gmail.com.

Event details

Date: Saturday 29 November 2025

Time: 10am-3pm

Venue: Epsom Methodist Church, Ashley Road, KT18 5AQ

Admission: Suggested £1 donation

Parking: Please walk, use public transport, or park in town centre car parks. Limited on-site parking for Blue Badge holders only.

Surrey solar study shows cheapest energy source

Solar energy is now so cost-effective that, in some of the sunniest parts of the world, it costs as little as two pence to produce one unit of electricity – cheaper than power generated from coal, gas or wind. That is the finding of a new study by researchers at the University of Surrey's Advanced Technology Institute (ATI), who say solar photovoltaic (PV) technology has become the key driver of the world's shift to clean, renewable energy.

Publishing their work in *Energy and Environment Materials*, the Surrey team point out that the global capacity of installed solar power passed 1.5 terawatts in 2024 – double the figure in 2020 and now enough to supply hundreds of millions of homes.

Professor Ravi Silva, Director of the ATI and co-author of the study, said: "Even here in the UK, a country that sits 50 degrees north of the equator, solar is the cheapest option for large-scale energy generation. Simply put, this technology is no longer a moonshot prospect but a foundational part of the resilient, low-carbon energy future that we all want to bring to reality."



The study notes that the price of lithium-ion batteries has fallen by almost 90 per cent since 2010, making combined solar-plus-storage systems as cost-effective as gas power plants. Such hybrid installations allow solar energy to be stored and released when required, turning an intermittent source into a dispatchable one that helps balance grid demand.

However, the researchers warn that the next major challenge lies in connecting vast amounts of solar generation to existing electricity networks. In regions such as California and China, high solar output has already caused congestion on power lines and wasted energy when supply outstrips demand. Co-author Dr Ehsan Rezaee said: "Connecting growing levels of solar power to electricity networks is now one of the biggest challenges. Smart grids, artificial-intelligence forecasting and stronger links between regions will be vital to keep power systems stable as renewable energy use rises."

Professor Silva added that advances in materials such as perovskite solar cells could raise energy output by up to 50 per cent without using additional land. "With the integration of energy storage and smart grid technologies, solar is now capable of delivering reliable, affordable and clean power at scale," he said. "But progress depends on consistent, long-term policy support. The US Inflation Reduction Act, the EU's REPowerEU plan and India's Production Linked Incentive scheme show how clear direction can drive investment and innovation. Sustained commitment and international collaboration will be essential if we are to accelerate the world's transition to a clean and reliable energy system."

Across the UK, renewable sources supplied just over half of all electricity in 2024 – the first time that clean generation surpassed fossil fuels. Wind power dominated with nearly 30 per cent of total generation, while solar contributed about 5 per cent, equivalent to one unit in every ten generated from renewables. Biomass, biogas and hydro made up most of the rest. When nuclear is included, low-carbon sources together delivered around two-thirds of the UK's electricity.

Globally, renewables produced about 30 per cent of electricity in 2024, with wind and solar together accounting for roughly 15 per cent and expanding faster than any other energy source. The International Energy Agency expects global renewable capacity to rise by almost half again before 2030, with most new investment in solar.

While Britain's relatively low sunshine hours limit its solar potential compared with southern Europe or Asia, domestic generation costs have plunged, making rooftop and community-scale arrays increasingly popular. Planning delays and grid connection backlogs remain obstacles, but the UK Government has set a target to increase installed solar capacity fivefold by 2035.

As Professor Silva observed, solar power has crossed the threshold from promise to practicality. The next test, he said, is building the smart, interconnected systems and political consensus needed to make affordable solar energy work everywhere – even in less sunny countries like the UK.

Sam Jones – Reporter



Parabel GmbH – Solarpark Jännersdorf. CC BY-SA 3.0

Surrey inequality report challenges 'leafy county' myth

The idea that Surrey is all leafy lanes, golf courses and big houses is a myth, according to a new report. Despite being a prosperous area of the country, the county still has thousands of residents struggling with inequality, isolation and poverty.

The report, *Understanding Inequality in Surrey*, lays bare the scale of the challenge. It found that residents from Bangladeshi, Pakistani, Black African, Roma and Gypsy/Traveller communities are far more likely to live in poverty, overcrowded housing and poor health. Gypsy and Irish Traveller residents experience the worst health among working-age people, and Bangladeshi-origin residents experience the worst health among over-65s.

The study also found that, while unemployment is rising more generally, racial minority groups are more than twice as likely to be unemployed compared to White British residents. Even degree-holders from minority backgrounds are still less likely to get into senior jobs or management positions than their white counterparts.



Cllr Mark Nuti, Cabinet Member for Health and Wellbeing, said: "We're in a very changing world at the moment. There is a lot going on politically in our society and people are feeling quite fragile in places. Especially when we're looking at equality, diversity and inclusion, there are people out there who are feeling very alone at the moment. We do have people that are living on the poverty line, we do have from different races [and] different ethnicities that aren't feeling part of these communities who are feeling alone - as everywhere else in the country. The most urgent action we need to do as a council, and as individuals, is to make sure that we identify where those people are and we have wraparound support for people to make sure they aren't feeling alone or feeling scared in their own home. And they do know the majority of us respect and love them, and want them to be part of our community and our county."

The fresh report comes after a 2023 peer review which praised Surrey County Council for improving its culture but also found it lacked a real understanding of how inequality shows up in local communities, prompting this study.

Cllr Robert Hughes added: "I think the image of Surrey being a county of golf courses, wealthy people and pretty villages are a small part of what Surrey is in reality."

The county boasts around 120 golf clubs - many of which are world class - alongside million-pound mansions, outstanding private schools and leafy green countryside. Yet the report exposed how 20,000 children are growing up in poverty, disabled residents are far less likely to find work, and young people with additional needs and disabilities are four times as likely to have experienced mental ill health compared to the wider population. Women are also hit harder by the cost of living, with the gender pay gap in Surrey reaching a staggering 21 per cent, well above the national average, according to the study.

Officers told a Resources and Performance Select Committee on October 2 that the study will help to alert council departments to how these disadvantages are often linked to an exacerbated socio-economic disadvantage. The new Equality, Diversity and Inclusion framework aims to bring councils, charities and communities together to make sure support actually reaches the people who need it. It looks at everything from jobs and housing to health, education and digital access.

Local groups have already started using the data to apply for funding and shape projects - a sign, councillors say, that the work is already making a difference. The data will be used to make services easier to access, tackle inequality in schools and workplaces, and build stronger communities.

Council officers admit the financial squeeze is real, but argue investing now will save money long-term. The idea is that better support means fewer people reaching crisis point and more residents able to thrive. The next stage is running focus groups with young people, disabled residents and minority communities to make sure the priorities match lived experience.

Emily Dalton LDRS

Aerial view of one of Surrey's less well of wards - Tattenham and Preston Hawe

Defibrillators delivered by drone?

A groundbreaking project testing how drones could be integrated into the UK's 999 emergency response system to deliver defibrillators to out-of-hospital cardiac arrest patients has been launched by the **University of Surrey**, **Air Ambulance Charity Kent Surrey Sussex**, and the **South East Coast Ambulance Service NHS Foundation Trust (SECamb)**.

Funded by the **National Institute for Health and Care Research (NIHR)**, the 16-month initiative will explore how drones can rapidly deliver Automated External Defibrillators (AEDs) to the scene of an emergency — potentially saving lives where every second counts.

The research will take place in two phases. The first will simulate 999 call handling, Air Traffic Control coordination, ambulance dispatch, and drone operations to develop and refine delivery procedures. The second will involve interviews with out-of-hospital cardiac arrest survivors, family members, emergency responders and members of the public to assess perceptions of drone technology, ease of use, and any concerns.

Dr Scott Munro, Lecturer in Paramedic Practice at the University of Surrey and project co-lead, said:

"This research is the first step towards integrating drone technology into our emergency response systems. Our ultimate goal is to develop and test the procedures needed to seamlessly introduce drone delivery of AEDs into the 999-emergency system."

Professor Kevin Munro, Director of the NIHR Research for Patient Benefit Programme, added:

"Using drones to deliver defibrillators could help emergency teams reach patients faster, improve survival after cardiac arrest,



and bring cutting-edge technology directly to the NHS frontline.”

Dr Craig Mortimer, Research Manager at SECamb, said:

“Rapid intervention is vital in managing out-of-hospital cardiac arrests. Integrating this technology into future healthcare systems represents real progress in strengthening the chain of survival and giving patients the best chance of a positive outcome.”

With UK survival rates for out-of-hospital cardiac arrest currently below 10%, the research aims to tackle one of the biggest challenges in emergency care: getting a defibrillator to the patient in time.

About NIHR

The **National Institute for Health and Care Research (NIHR)** is the UK’s largest funder of health and social care research. It invests in high-quality studies that benefit the NHS, public health and social care, supports researchers and facilities, and partners with patients and communities to improve outcomes both in the UK and globally.

Surrey University



Epsom and Ewell College Principal wins Silver at National Business Women’s Awards

Julie Kapsalis recognised for bridging the gap between boardroom and classroom.

Nescot’s Principal and CEO, Julie Kapsalis, won silver in the ‘Community Champion’ category at the National Business Women’s Awards in London last night. Julie was also a finalist for the ‘Corporate Leader of the Year’ award, highlighting how the college brings together corporates, the community and students, offering young people exciting opportunities to shine.

Under Julie’s tenure, Nescot has made business and community partnerships a primary focus, consistently opening doors for students. Examples include collaborations with the cruise industry and Epsom Downs Racecourse which have given students hands-on experience and led to new apprenticeships. Other students have gone behind-the-scenes at darts tournaments, hotels, museums, airports and at the Hampton Court Palace Garden Festival, while the art department has revitalised community spaces in Epsom with vibrant murals.

Julie Kapsalis, Principal and CEO at Nescot said: “Congratulations to the worthy and inspirational winners last night. It was great to win silver and to be in such illustrious company. The recognition reflects the hard work that goes on across Nescot, where we’re always creating and taking opportunities to help our students thrive. I love my role, which I see as an enabler, and being able to make things happen. I get huge job satisfaction from bringing employers and students together so they benefit, either through an apprenticeship, a placement or even just an introduction that changes their path.

“The joy of attending awards is the connections you make and the inspirational stories you hear. Networking is key and I love meeting people, as I know that each business, community or civic connection we make has the potential to change a student’s life.”

Julie established a Women in Business Network, which hosts local leaders from organisations including KPMG, NatWest, Ringway, Wates and Atkins Realis. This year, she is especially proud of a partnership that Nescot has formed with the Royal Society for Blind Children which has enabled the establishment of a new Centre of Excellence for Blind and Visually Impaired students at Nescot, meaning young people from Surrey no longer need to travel outside the county for a college education.

The National Business Women’s Awards aims to raise the profile of industrious, hardworking and enterprising Business Women nationally. The awards are made up of 23 categories and winners are chosen by an expert panel of judges. Find out more here.

NESCOT



Ewell East underpass transformed by new community mural

A once grim and intimidating underpass in Ewell East has been given a striking new look thanks to a community mural designed to tackle anti-social behaviour and instil pride in the area.

The tunnel, connecting Nescot College with Ewell East railway station, has long been identified as a hotspot for crime and intimidation. Following reports from residents and students, the Epsom & Ewell Community Safety Partnership's Joint Action Group coordinated a project to reclaim the space.

Work began in September after Epsom & Ewell Borough Council successfully applied for funding from the Office of the Police and Crime Commissioner's Community Safety Fund. The mural was unveiled on 9 October by Surrey's Police and Crime Commissioner, Lisa Townsend.

The artwork was created by the street art organisation Positive Arts in collaboration with Level 1 and 2 Art & Design students from Nescot. It draws inspiration from the college's 70-year history, incorporating elements from old prospectus covers, the Spirit of the Wind motif from a former college logo, a frieze from the original entrance, and images of local flora and fauna.

Lisa Townsend said: "It's really important to me that residents in Surrey are safe in their communities, and that they feel safe too. The footpath between Nescot and Ewell East Station was highlighted by residents as a location of concern, and I have discussed this issue with partners including Surrey Police, college leaders and the British Transport Police.

"The beautiful mural aims to reclaim this public space, which is used by both students and residents. Improvements to lighting, police patrols and additional private security will also bolster community safety and crime prevention in the area. There are seven murals within Epsom and Ewell, each of which helps to foster pride in our communities."

Councillor Shanice Goldman, Chair of the Crime and Disorder Committee, said: "This community mural is a fantastic example of how multiple partners can work together for the betterment of the community. It is also a valuable step forward in combating anti-social behaviour by rejuvenating an unloved, run down part of the borough and instilling a sense of pride and ownership of the area in the students."

Sarah Jane Morgan, Art & Design Lecturer at Nescot, said: "It's been an incredible learning opportunity for our talented students to work alongside renowned artists from Positive Arts to create and bring to life a professional street art mural. They have enjoyed painting a design that celebrates Nescot's history and curriculum areas, and we are grateful to the council for commissioning our students to work on this transformative project."

Positive Arts' director Julian Phethean added: "All of the students participated with passion and pride, eagerly embracing new spray painting techniques and applying them effectively while working collaboratively. They demonstrated a high level of creativity, motivation and focus throughout."

The Epsom & Ewell Community Safety Partnership includes representatives from Epsom & Ewell Borough Council, Surrey Police, Surrey County Council, the Office of the Police and Crime Commissioner, Nescot, National Rail and other community partners. The council's recent programme of murals across the borough has already shown success in reducing graffiti and improving the look and feel of public spaces.

Emily Dalton LDRS

Surrey Police And Crime Commissioner Reveal mural near Ewell East train station. (Credit: Emily Dalton/ LDRS)



Reducing food waste nationally and in Epsom and Ewell

A growing number of major UK supermarket chains are removing 'best before' dates from many fresh fruit and vegetable products in an effort to reduce food waste.

Asda, Tesco, Sainsbury's, Marks & Spencer, Waitrose and Co-op have each begun phasing out the labels on selected produce such as apples, potatoes, citrus and salad vegetables. The move follows guidance from the government-backed Waste and Resources Action Programme (WRAP), which says that scrapping date labels from uncut fruit and vegetables could prevent thousands of tonnes of perfectly edible food from being thrown away every year.

WRAP research has shown that many households confuse 'best before' dates, which indicate when food is at its best quality, with 'use by' dates, which mark when food may no longer be safe to eat. As a result, millions of items are discarded while still fit for consumption.

'Use by' dates remain compulsory on foods that pose a higher safety risk, such as meat, dairy and ready meals. These indicate the final day on which food can be safely eaten, cooked or frozen. By contrast, 'best before' dates are about quality, not safety, and appear mostly on products such as bread, rice, tins and dried goods.

Marks & Spencer has removed best before dates from about 85 per cent of its fresh produce, while Waitrose has dropped them from nearly 500 lines. Some retailers are instead using small printed codes visible to staff for stock rotation and freshness checks.

Food safety expert Dr Richard Anderson of High Speed Training said that while 'use by' dates should always be observed, 'best before' guidance can be treated more flexibly. "Best before dates are an indication of quality rather than safety. You can still eat food after its best before date, but its flavour and texture may not be as good as before the date," he said.

WRAP encourages consumers to rely more on sight, smell and touch to judge whether fruit and vegetables remain good to eat. The organisation says there is no legal requirement in the UK to label uncut produce with a 'best before' date.

According to WRAP, the average UK household wastes the equivalent of eight meals a week, with 4.5 million tonnes of edible food thrown away annually. The removal of best before dates is part of a wider drive across the food retail sector to tackle avoidable waste and reduce environmental impact.

Some critics warn, however, that removing dates altogether may cause confusion for some shoppers or make them more cautious, leading to continued waste. Others say the change puts greater responsibility on consumers to decide what is still edible.

The UK government's food waste reduction roadmap aims to halve national food waste by 2030 in line with UN sustainability goals. Industry groups say supermarket labelling reforms are a practical step towards achieving that target.

In Surrey, FareShare Sussex & Surrey plays a key role in reconnecting surplus food with those who need it. The charity rescues safe, in-date food from farms, retailers and producers and redistributes it to charities, community groups, food banks, pantries and other support services. In 2024, FareShare opened a new depot in Surrey to handle more fresh, chilled and frozen food for redistribution across the region.

Locally, Epsom & Ewell Foodbank, part of Good Company Surrey and the Trussell Trust network, distributed almost 8,000 emergency food parcels last year to people in crisis. The network serves Epsom, Ewell, Banstead, Leatherhead and Tadworth through a voucher referral system and provides three days of nutritionally balanced food to those referred. It operates from local church halls and community centres, with donation points in major supermarkets and strong support from volunteers.

Epsom & Ewell Borough Council also promotes "Help with Food" schemes, directing residents to emergency support and a community pantry in Epsom that offers fresh fruit, vegetables and store cupboard items for a small weekly subscription.

Jonathan Lees, Good Company's Managing Director and Founder told the Epsom and Ewell Times: 'At Good Company, both our food provision projects, Foodbanks and Pantries, are very grateful for the food surplus we receive from local supermarkets. These donations ensure there is variety in our offer and are a very welcome addition to the ambient food donations. We offer the food on a help yourself basis to people that use our projects ensuring that there is some for all. If dates were removed, then we would need to look at how we used the food under appropriate guidance and of course less waste would mean we could have less to offer people in need.'

As supermarkets adapt their labelling to cut national food waste, the efforts of local redistribution organisations such as



FareShare Sussex & Surrey and Epsom & Ewell Foodbank remain vital in ensuring surplus food finds its way to those who need it most.

Sam Jones – Reporter



Image courtesy High Speed Training

“Outstanding” rating for Worcester Park based carers

Trinity Homecare Group is delighted to announce that its Worcester Park-based visiting care service has been awarded an ‘Outstanding’ rating by the Care Quality Commission (CQC) following a recent inspection.

The CQC awarded the service **Outstanding in four of the five key areas** – Well-led, Caring, Effective and Responsive – placing it among a *tiny handful* of homecare providers nationally to achieve this level of recognition.

A service at the heart of the community

Inspectors praised the service for being “exceptionally personalised and kind,” with carers and managers going above and beyond to support local people in their daily lives. The Worcester Park branch provides visiting care to individuals and families across Surrey, including communities in Cobham, Walton, Weybridge, Byfleet, Addlestone, Epsom, Banstead, Kingston, Tadworth, Ashted, Leatherhead, New Malden, Surbiton, Thames Ditton, Molesey and Chessington.

Highlights from the inspection report included:

- Helping clients maintain independence, with flexible support tailored around their daily routines.
- Supporting people to enjoy life’s small but meaningful moments – from feeding ducks and gardening, to celebrating birthdays.
- Spotting health needs early and working with families and local professionals to ensure the right support is in place.
- Embracing new technology and creative initiatives such as *Stories for Life*, enabling people to capture their personal history and strengthen family connections.

Celebrating local carers

“Families in our local communities trust us not just to provide safe care, but to make every day more meaningful,” said **Carla Gama, Director of Operations at Trinity Homecare Group**.

“That is thanks to the incredible work of our carers here in Worcester Park and across Surrey. They bring compassion, kindness and professionalism into people’s homes every single day, and this Outstanding rating is truly theirs to celebrate.”

Summer Smith, Registered Branch Manager at Worcester Park, added:

“I am so proud of our team here. Every carer and support staff member goes above and beyond to make sure people feel safe, valued and cared for in the way they want. This rating reflects their dedication and the strong relationships they build with clients and families in our local communities.”

About Trinity Homecare Group

Trinity Homecare Group is one of the UK’s leading providers of live-in and visiting homecare, supporting people to live



independently and safely in the comfort of their own homes. With over 25 years of experience and a growing national footprint, Trinity continues to set the standard for high-quality, person-centred care.

The Group includes a family of trusted brands: Trinity Homecare, Country Cousins and Patricia White's – together spanning fully managed, regulated live-in and visiting care, as well as introductory agency live-in and visiting care services across the UK.

Learn more or view the full CQC report: www.trinityhomecare.co.uk

[Copy prepared by Trinity Home Care.]

Surrey Uni to open in India after UK PM's visit

Surrey joins new UK Universities in India Alliance while on UK trade mission to India

The UK's universities can be a "skills and research accelerator" for the potential of the strengthening UK-India trade partnership, which was the focus of Sir Keir Starmer's trade mission this week. This is according to Professor Stephen Jarvis, newly appointed President and Vice-Chancellor of the University of Surrey – and a participant in the trade mission.

On his return from India, where the multi-sector delegation met with Prime Minister Narendra Modi, Professor Jarvis highlighted the strong fit of the University of Surrey's 'purpose-driven' approach to education and research, and the importance of the new Universities in India Alliance, which Surrey was proud to become a founder member of during the trip.

During the visit, the University of Surrey was presented with approval in principle from IFSCA (International Financial Services Centres Authority) to proceed with opening a new International Branch Campus at GIFT City, in Ahmedabad, Gujarat State.

On the trip, the University also celebrated its network of research and education partnerships with Indian universities – including its partnership with the Indian Institute of Science, Bengaluru (IISc) – which will see both institutions partner to drive research and innovation in semiconductor chip design and medical research, with a particular focus on human health and veterinary medicine.

Professor Stephen Jarvis said:

"I was honoured to be invited to join the Prime Minister on his visit to India to celebrate the enormous potential for UK higher education to partner and collaborate in India to drive international skills development and research to solve global challenges. India is an economic and skills superpower – it has its own thriving higher education sector, but also recognises the value that Britain's globally recognised higher education sector can bring to meeting the extraordinary growth in demand for quality education in India.

"As we move towards opening our new campus in GIFT City, we're delighted to have been invited to become founding members of the nine-strong UK Universities in India Alliance. Education is an immensely important export industry for the UK, and Surrey is proud to be standing shoulder to shoulder with our fellow universities, bringing our own unique brand of purposeful education, as we seek to expand the potential for higher education to be a skills and research accelerator, benefitting both the UK and Indian economies."

Alison Barrett MBE, Country Director India, British Council, said:

"Congratulations to the University of Surrey on receiving approval in principle from IFSCA (International Financial Services Centres Authority) to establish its International Branch Campus in GIFT City, Ahmedabad, India. This reflects the UK's commitment to accessible, innovative, and inclusive education, but also demonstrates the positive impact of the National Education Policy 2020. Aligned with the shared ambition outlined in the India-UK Vision 2035, bringing Surrey's expertise to India will create exciting new opportunities for students and equip them with the skills needed to thrive in the future."

Surrey University





Image: 09/10/2025. Mumbai, India. Prime Minister Keir Starmer meets Indian Prime Minister Narendra Modi for a bilateral meeting at the Raj Bhavan. Picture by Simon Dawson / No 10 Downing Street

Get paid for falling over in Surrey study

With 219,000 fall-related emergency hospital admissions among people aged 65 and over in England in 2023/24, a new trial at the University of Surrey is exploring how smart flooring could help prevent serious injuries by cushioning falls – potentially easing pressure on the NHS and reshaping the design of hospitals, care homes and even private homes.

In the ongoing study, participants wear reflective body markers that are tracked by infrared cameras, allowing researchers to measure how different floor materials – ranging from soft to hard – affect a person's balance, movement and stability. The findings will form the foundation for designing new protective flooring that looks and feels like a regular surface but can absorb the impact of a fall.

The team is currently seeking healthy adult volunteers of all ages, particularly those aged 65 and over, to participate in the trial.

Silas Purja, Postgraduate Researcher at the University of Surrey's School of Engineering and lead researcher in the trial, said:

"Every year in the UK, hundreds of thousands of older adults experience a fall – many of which lead to lengthy hospital stays and, tragically, some fatalities. Government figures show that unaddressed fall hazards in the home alone cost the NHS in England around £435 million annually, while fragility fractures – often caused by falls – cost the UK an estimated £4.4 billion each year, including £1.1 billion in social care. To help ease pressure on the health service and protect lives, we're investigating how different flooring types affect balance – with the goal of supporting the design of safer, smarter surfaces in various settings."

The current phase of the study involves testing different age groups on their ability to stand and walk on various floor conditions in a controlled indoor environment at the University. Researchers can then analyse how different levels of stiffness affect participants' natural balance.

The long-term vision is a flooring system that remains firm during normal use but softens when someone falls – reducing the risk of broken bones or head injuries. From the outside, it would resemble standard synthetic tiles or rubber flooring, but with smart materials and systems hidden beneath. As the technology matures, the flooring could eventually be rolled out in hospitals, care homes and private homes where older people are most at risk.

Dr Iman Mohagheghian, Associate Professor (Reader) in Mechanics of Materials at the University of Surrey and Principal Investigator on the project, said:

"Trials like this are crucial for determining age-related differences in balance and movement, and how those differences interact with the surfaces we walk on every day. Volunteers who take part will play an important role in helping us design safer, more supportive environments, and their contributions could ultimately help prevent life-altering injuries. If you would like to be part of our research, we'd love to hear from you."

The study is part of the wider Engineering and Physical Sciences Research Council (EPSRC)-funded project Multifunctional Flooring: Design for Independent Living, led by Dr Iman Mohagheghian. The project brings together an interdisciplinary team of researchers, including Dr Matthew Oldfield and Dr Radu Sporea from the University of Surrey, and Dr Amy Drahota from the University of Portsmouth.

The team is working closely with commercial partners and manufacturers of flooring for healthcare settings and advanced sensor and touch technologies. Together they aim to develop an integrated flooring solution that provides passive fall prevention, real-time fall detection and impact protection in one.

Participants will receive a £10 expenses payment for their time along with free parking at the University. To register your interest or find out more, contact Silas directly at s.purja@surrey.ac.uk.

Surrey University

