

## Start-up unveils energy efficiency technology for greener buildings

2 years ago



An environmental technology business has launched a new digital platform to reduce energy costs and carbon emissions with AI-controlled smart buildings.

Based in Newcastle, Harmonic has been developed for energy optimisation and carbon reduction. It will officially launch at UK REIFF, the UK's Real Estate Investment and Infrastructure Forum, at Leeds' Royal Armouries on May 16-18th.

Integrating human behavioural data with utility usage, Harmonic can predict, manage and reduce spiralling energy costs and carbon footprint.

Harmonic is a comprehensive package combining proprietary hardware, state-of-the-art software, and machine learning technologies. The combination enables actionable insights, drives cost savings, and enhances operational efficiency.

The technology uses a people-centric web platform, mobile app, and optional sensor devices, all of which can interface with metering and building data and third-party integrations. Harmonic is the first to integrate resource and amenity booking management, sensor data, and building operations.

An AI-driven algorithm predicts a building's planned and actual activities, enabling operational performance optimisation. The approach collates and corroborates various data inputs related to space, utility, and carbon consumption and output.

Gareth Humphreys, group CEO at SPG Transformation, said: "Designed to eliminate cost and complexity, Harmonic can be used within the existing estate or building infrastructures, delivering a single-pane view

of actionable insights and solving the problem of disparate data and systems. With it, we've created an innovation designed to tackle the pressing issues already at the forefront of global concern.

"The need to find smarter ways to manage energy, lower utility costs, and reduce carbon footprints have become more crucial than ever in our new hybrid working environments. This is where Harmonic excels, and we are excited to showcase it for the UK market at UK REIFF in Leeds. As part of our own eco commitments, we're also pledging to plant a tree for every visitor to our stand who leaves a business card."

Harmonic is part of the SPG Group, an advanced technology company that works across the public and private sectors to deliver digital transformation projects. Its clients include the emergency services, government departments and social housing companies.

SPG has experienced record growth since 2021, taking its team from six staff to 52 across its offices in Newcastle and Leeds, with a further office opening planned for this year.

SPG Transformation is based in the Helix building at the heart of Newcastle's innovation district.