Extended Abstract

The long-term vitality of UK high streets and town centres has been subject to intense debate, particularly in light of technological change, evolving consumer behaviour, and repeated economic shocks. If we are to revitalise these consumption spaces and meaningfully speculate about their future trajectories, it is essential to situate recent transformations within robust theoretical frameworks. While conceptual approaches such as retail digitalisation and locational obsolescence offer important insights, this study focuses on developing a more nuanced understanding of how UK retail centres can remain economically viable through processes of reinvention and adaptation in the new era of digital retailing. Drawing on interrelated debates on resilience, adaptability and sustainability, we employ two complementary conceptual lenses: the notion of adaptive resilience and the adaptive retail cycle.

The concept of adaptive resilience, developed by Wrigley and Dolega (2011) and informed by Martin's (2012) regional resilience framework, conceptualises retail centres as complex, evolutionary systems capable of reorganising in response to destabilising shocks. Retail centres possess anticipatory and reactive capacities that shape how effectively they absorb, adapt to, and recover from disruption. However, resilience is not synonymous with returning to a pre-shock state. Instead, retail systems may transition into new configurations. In this respect, the adaptive cycle framework developed by Dolega and Celinska-Janowicz (2015) provides a complementary perspective by linking retail centre transformation to cyclical stages of growth, consolidation, release and reorientation. After a period of growth and maturity, retail centres may become rigid and less innovative, entering consolidation. A major shock—such as the Covid-19 pandemic—can then push them into release, characterised by disruption and creative destruction in the Schumpeterian sense. Crucially, this stage may create conditions for renewal and reorientation, potentially enabling entry into a new growth phase. Although these frameworks were initially developed in the aftermath of the 2008–09 financial crisis, their application to the Covid-19 pandemic and its aftermath is both rational and illuminating.

Empirically, this study provides a comprehensive, descriptive and longitudinal assessment of the transformation and economic performance of UK retail centres between 2019 and 2023, spanning pre-pandemic, within-pandemic and post-pandemic recovery phases. We employ retailer occupancy data from the Local Data Company (LDC), accessed via the Consumer Data Research Centre (CDRC), widely recognised as the most comprehensive open dataset on UK retail units. The dataset captures detailed information at individual store level, including category classifications and vacancy status. After cleaning and restricting the sample to official retail centre boundaries across Great Britain, the final dataset comprised approximately 370,000 retail units in 4,811 centres in 2019. Smaller centres with fewer than 40 units were excluded to ensure stability of proportional measures.

Our methodological approach is exploratory and descriptive, examining changes in retail composition and vacancy rates across multiple spatial scales: national, regional, retail hierarchy and local authority district (LAD). Retail units were grouped into high-level planning categories (comparison retail, convenience retail, services and leisure), mapped from 12 LDC categories and 333 subcategories. Changes in occupancy and vacancy rates were calculated between 2019 and 2021 (pandemic period) and between 2021 and 2023 (recovery period), enabling assessment of both shock and rebound effects.

The findings reveal a highly uneven and differentiated transformation of the UK retail landscape. Overall vacancy rates, already relatively high pre-pandemic (10.6%), increased by 18.9% over the five-year period, with the most dramatic rise occurring during the pandemic (+25.4%). Although

a modest decline in vacancy (-5.2%) occurred during the recovery phase, levels remain well above pre-pandemic benchmarks, indicating a subdued and incomplete recovery.

Decline has been concentrated in comparison retail and selected service sectors. Clothes and fashion retailers recorded the steepest contraction, with around 21% of units disappearing between 2019 and 2023. This trend aligns with the rapid expansion of online platforms such as ASOS and SHEIN, which accelerated during lockdowns. Non-food shops and amenities, including department stores and small independents, also declined, as did financial and business services. Over 5,000 bank branches closed nationally, reflecting intensifying digitalisation of financial services. Entertainment-related uses, including tour operators and bookmakers, experienced significant contraction, driven by both lockdown restrictions and structural shifts towards online consumption.

In contrast, convenience retail, leisure and health and beauty services demonstrated resilience and, in many cases, growth. Grocery stores and convenience shops expanded significantly, alongside specialist food retailers such as cheese shops, fishmongers and halal butchers, suggesting a shift towards localised and niche consumption that complements rather than competes directly with supermarkets. Leisure uses—particularly cafés, fast food outlets and restaurants—also expanded, with notable growth in vegan and international cuisines. Health and beauty services, including cosmetic treatments, nail salons and barbers, recorded substantial increases, collectively adding nearly 8,000 units over the study period. These patterns suggest functional reorientation of retail centres away from traditional comparison retail and towards experiential, service-based and everyday consumption.

Analysis of the post-pandemic recovery period (2021–2023) indicates that although vacancy rates modestly declined, structural shifts continued. More retail types recorded decreases than increases, albeit at smaller magnitudes than during the pandemic peak. Decline in fashion and entertainment persisted, while financial and business services contraction accelerated. Conversely, growth in leisure and health-related services continued, albeit at a slower pace than during the pandemic.

Spatial heterogeneity is pronounced. All UK regions experienced increased vacancy during the pandemic, with partial recovery thereafter, although Scotland recorded continued post-pandemic fragility. Across the retail hierarchy, larger regional centres and large shopping centres experienced the greatest vacancy increases, reflecting reliance on non-essential retail and commuter footfall. Smaller town centres, district centres and retail parks demonstrated comparatively greater resilience, reinforcing pre-pandemic trends towards localism.

At LAD level, analysis of vacancy levels and change enables classification of retail systems within the adaptive cycle framework. Only a small minority (6%) of LADs fall into the 'growth' quadrant (low and declining vacancy), including St Albans. Nearly half (49%) occupy the 'consolidation' phase, characterised by low but rising vacancy, including major urban centres such as Leeds and Liverpool. Approximately 36% fall within 'release', combining high and rising vacancy, including structurally vulnerable areas such as Barrow-in-Furness. A smaller subset (8%) demonstrate 'reorientation', reducing previously high vacancy levels; examples include Blackpool and Bury. These findings underscore that the pandemic has not produced uniform decline but has instead intensified differentiation across retail systems.

Theoretically, the results reinforce the utility of adaptive resilience and adaptive cycle frameworks. The Covid-19 pandemic acted as a catalytic shock, pushing many centres from consolidation into release, while creating opportunities for creative destruction and reorientation. However, the capacity for renewal is uneven and conditioned by pre-existing structural vulnerabilities. Importantly, resilience should not be equated with restoration of pre-pandemic retail configurations. Instead, adaptation entails structural adjustment towards new retail and service mixes aligned with digital retailing, local consumption and experiential demand.

Policy implications are significant. The persistence of elevated vacancy indicates structural oversupply of physical retail space. Strategies for revitalisation should therefore prioritise diversification of uses, repurposing surplus space, and strengthening service and leisure functions that demonstrate sustained demand. Planning approaches aligned with the 15-minute city may provide a framework for enhancing local accessibility and supporting smaller centres benefitting from hybrid working patterns. At the same time, policy must account for continued digitalisation, cost-of-living pressures, technological change—including AI integration—and broader environmental challenges.

In conclusion, this study advances understanding of the post-pandemic transformation of UK retail centres by integrating rich longitudinal evidence with established theoretical frameworks. The pandemic has modified pre-existing evolutionary trajectories, intensifying structural decline in some sectors while accelerating reorientation in others. Recovery has been partial and uneven, characterised more by structural adjustment than by rebound. While vulnerabilities remain acute in many localities, evidence of adaptation and renewal suggests that high streets are not obsolete but are instead undergoing a profound reconfiguration. Continued research at finer spatial scales will be essential to unpack the drivers of successful reorientation and to inform targeted, data-driven policy interventions capable of securing economically and socially sustainable retail centres in the years ahead.