

Cities after dark: Shining a light on the 24-hour economy

Work, leisure and travel trends in Britain's 24-hour economy revealed through mobile network data.

Foreword

From Steve Wiley Managing Director, BT Active Intelligence

The vital importance of the 24-hour economy

The need to understand and support the growth of a 24-hour economy in the UK is on the rise. Vision and action are being led by organisations like the Night Time Industries Association, who seek to raise awareness of the benefits the night-time economy brings.

Recent estimates (Feburary 2023) suggest that the 24-hour economy contributes almost 4%¹ to the UK economy, but the impact is far higher in our cities and in industries like hospitality and culture. Night-time activity is estimated to make up 20% of the overall economy in London, for example, and over 50% of the value contributed by the cultural sector.

Many important factors have a bearing on the night-time economy, including the ways people move and interact with our cities between 6pm and 6am:

- Is public transportation readily accessible in areas known for late-night activities, or is there a reliance on personal vehicles after certain hours, potentially hindering Net Zero initiatives?
- Do residents have easy access to night-time events, venues, facilities, and workplaces? And is it safe and convenient for them to return home (without causing any noise disturbances) once these activities conclude?
- Are pedestrians and cyclists able to navigate safely during the night? Is accessibility to gyms and leisure centres just as easy after dark as it is during daylight hours?
- With disruptive technologies reshaping behaviours and contributing to economic growth, how can we analyse the interaction between people's online activities and physical behaviour with the nighttime economy?

Crucial questions for planners and policymakers

These are crucial questions for planners and policymakers but answering them isn't easy. Neighbourhood demographics change, popular venues come and go, and—as we saw with the pandemic—patterns of work, commuting and leisure activity can shift in ways nobody expected.

Data holds many of the answers, but raw data, unless turned into insights, can be overwhelming and challenging to interpret. Using insights into where people gather, how they get there, and how they get home again can feed into predictive models to plan for the night-time economy of the future.

Can data help us find some of the answers?

Thanks to the growing sophistication of mobile networks, aggregated and anonymised mobile data can provide unprecedented insights into population movements, behaviours and preferences—helping planners from retail to government to design a better night-time experience for all.

The good news is that insights like these are now easier to obtain than ever. On behalf of BT Active Intelligence, I'm delighted to offer you this report, showing the kinds of insights that are achievable using data from the mobile network activity of 24 million adults.

Executive Summary: Mapping Britain's 24-hour economy

Think of British towns and cities at night and you'll likely imagine restaurants, cinemas, theatres, clubs and bars—people meeting up to share a meal, have a drink, go out dancing or enjoy the latest cultural attractions.

But these aren't just enjoyable things to do—they're also an economic powerhouse for the UK. With 8.7 million people working in the hours between 6pm and 6am², the night-time economy creates jobs, drives growth, and makes our cities more attractive to tourists and locals alike.

The dynamics of the 24-hour economy influence the entire country, across sectors from transportation, retail and logistics to central and local government. Decisions about opening times, licensing hours, transport planning and workforce scheduling all rely on accurate, up-to-date information about night-time economic activity—from where people gather to where they live, and how and when they travel.

In its Think Night report³, the Night Time Commission recommends that the Mayor provide night-time guidance for boroughs, as few have strategies for their neighbourhoods after dark.

In 2023, Wandsworth Council became the first local authority in London to publish a new night-time plan in response to recommendations by the Greater London Authority (GLA)⁴. With this report, we show how location insights can help to shape similar strategies—whether the aim is to improve an area's appeal, foster diverse cultural experiences, generate employment opportunities, enhance safety and wellbeing, or optimise urban spaces.

2. ONS, The night-time economy, UK: 2022

- 3. London City Hall, Night Time Strategy Guidance
- 4. BBC News, <u>Wandsworth Council first in London to publish new night-time plan</u>, December 6, 2023



Night-time trends revealed through mobile network data

BT Active Intelligence processes over 25 billion data points from mobile phone activity daily. We then aggregate and anonymise it to provide granular, large-scale insights into the physical movements of 53 million adults in the UK by time, geography, age, and gender.

In this report, we've used that data to map the UK's busiest night-time areas, its top late-night hotspots, the times people choose to go home and the modes of transport they use. We've also mapped the travel times and work locations of Britain's night-workers: the bar staff, delivery drivers, retail assistants, office workers and public servants who contribute to our vibrant 24-hour economy.

Our key findings at a glance

From data collected over the three months from September to November 2023, we found that:

- 1. London rules as Britain's most popular night time city, with Glasgow winning out in Scotland and Cardiff taking the top spot for Wales.
- 2. Sheffield's Devonshire Quarter is Britain's busiest district on a Saturday night, followed by London's Shoreditch and Birmingham Five Ways North.
- 3. Birmingham and Manchester are 'afterparty capitals'. Both cities have large areas where more people head home between 4am and 5am than earlier on in the night.
- 4. Manufacturing and distribution work dominates the early hours, making up 41.5% of all shifts starting between 4am and 6am. Servants of society, such as hospital workers, are there for us at all hours, making up an average of 14% of all shifts starting at any time between midday and 6am⁵.
- 5. Across all night shifts, metro suburb workers who start work between midnight and 4am have the farthest to travel home—an average of 42.2 km from their place of work.

Dive into the full findings

Over the next few pages you'll find deeper insights into three key areas of Britain's 24-hour economy:

Chapter One

Night owls: Who takes the crown for the busiest city at night?





Night owls: Who takes the crown for the busiest city at night?

Which are Britain's busiest night-time cities? Is there a difference between weekdays and weekends? When it comes to the most vibrant night-time cities, competition is fierce—with a few surprising results:

- London takes the crown as Britain's top city for weekend nightlife, followed closely by Manchester, Newcastle and Nottingham. Each city offers unique attractions, from worldclass music venues to lively student areas. Glasgow shines as Scotland's weekend nightlife capital, ranking fifth overall.
- Entertainment venues and student areas are clearly visible, along with urban villages like Sheffield's Devonshire Quarter and London's Shoreditch. And who's visiting these spots? More men than women dwell in these areas between 10pm and 4am—with the notable exception of Glasgow.
- Patterns change according to age group. Urban villages like London's Shoreditch and Clapham attract the 25–34 age group. But entertainment venues like the O2 Arena in Greenwich appeal to a broader demographic, attracting people from 25 to 55.
- During the week, the picture changes significantly. Fewer are out and about,, and non-city-centre locations gain prominence. **Manchester emerges as Britain's busiest weeknight hub**, followed by Luton (due to the airport location), Central London, Flintshire, and Thurrock (with the latest being distribution centres hubs). Meanwhile, Glasgow holds its title as Scotland's weeknight activity capital.





Night owls: Who takes the crown for the busiest city at night?



Chapter Two

Heading home: Leaving times and homeward travel modes







Heading home: Leaving times and homeward travel modes

Options for getting home can make or break a night out—and play a key role in deciding whether to go out or stay in. One of the biggest challenges for cities is maintaining a level of transport provision that makes it affordable but also economically viable for the authorities.

Leaving times from night-time hotspots

What does our data reveal about the end of the night and how people return home? By analysing trips originating from busy areas between the hours of 10pm and 4am, we can see what time people head home, and what mode of transport they use. Key findings:

- There's a clear cut-off at midnight, with most people heading home before the clock strikes twelve. That's especially true for non-stadium areas like Glasgow Finnieston & Kelvinhaugh and Manchester Castlefield & Deansgate.
- **Birmingham and Manchester are 'afterparty capitals'**. The quietest hours for travel are 3–4am and 5–6am. By contrast, 4–5am sees a small spike. Two 'afterparty areas' where more people head home between 4am and 5am than between 3am and 4am are Birmingham Attwood Green & Park Central and Manchester University North & Whitworth Street.



The economic power of public transport

London's Night Tube programme is estimated to contribute **an additional** £1.54bn to London's economy over 10 years to 2028.⁶

6. EY, Economic Impact of the Night Tube Programme on London's Economy



Heading home: Leaving times and homeward travel modes

Homeward journeys by Uber

Mobile phone data also offers an opportunity to understand how technology is disrupting the night-time economy by showing which apps people are using and where.

For example, a popular solution for those who miss the last train is Uber. Our data shows how Uber journeys compare to rail use at different times of night in popular nightlife areas. Overall, we found that:

- For venues with timed events that finish comparatively early, like White Hart Lane football stadium, Uber app usage peaks at the same time as rail usage
- In other popular night-time zones, a peak in Uber usage follows the drop-off in rail journeys







Heading home: Leaving times and homeward travel modes

Understanding how people choose to get home overnight is important for cities. We know that cost, availability and convenience are factors determining people's choice but throughout the night safety also is a big consideration. For cities enabling the right transport provision is important, as getting home can be a significant cost.

The latest TfL report reveals that walking remains a key mode of transport in London, with its popularity rising in 2022/23⁷. The data shows that 39% of all trips made by London residents are on foot.

Active Intelligence data highlights that this is not evenly distributed across the day. Only 13% of people returning from central London overnight (8 pm to 5 am) choose to walk, compared to using road or rail transport.

A typical night out in Manchester



A typical night out in London

The illustration above represents the breakdown for every 100 people that leave Manchester and London city-centre.



Chapter Three

Night shifts: Mapping the 'other' nine-to-five







Night shifts: Mapping the 'other' nine-to-five

What about the other side of the 24-hour economy—the 8.7 million workers who keep the wheels turning through the night? ONS data shows that 85% of night-time workers work outside of their home, compared with 74.9% of daytime workers.⁸ We interrogated our data: Where do these night-shifters work? How long are their shifts? How far do they have to travel home?

Leaving times for night-time shift work

Mapping journeys into work locations reveals peaks and troughs in when people leave for work. Across the UK, we see around 3 million workers setting off for work each hour between 7pm and midnight, with a pronounced drop-off to around 1 million per hour between midnight and 6am.



Night-shift start times across industry sectors

Night work isn't just for the hospitality sector. Many sectors operate on a 24-hour basis, and the whole country relies on their often-invisible nocturnal workers.

Our data provides insights into which industries employ night-time workers and the start times of typical shifts. Based on the ONS Classification of Workplace Zones (COWZ)⁹, we can see that:

- **City centres, business parks and retail locations** are busiest in the earlier part of the night, with comparatively few shifts starting between the hours of 8pm to midnight and midnight to 4am.
- **Manufacturing and distribution** dominates the early hours, making up 41.5% of all shifts starting between 4am and 6am.
- Servants of society (public servants) are there for us throughout the night, making up an average of 14% of all shifts starting at any time between midday and 6am.

8. ONS, The night-time economy 2022: working from home

9. ONS Classification of Workplace Zones (COWZ)



Night shifts: Mapping the 'other' nine-to-five



Top 10 locations for night-time shift work

Looking at the location data for night-time workers, we can see that city-centre locations in London, Newcastle, Leeds and Birmingham are busiest overall. However, the picture shifts for the early hours (2am–5am), when airports become some of the main hubs of activity.

Top 10 night-time workers hotspots between **8pm and 6am**

- 1 City of London
- 2 Heathrow, Harmondsworth & Simpson
- 3 Strand, St James & Mayfair
- 4 Fitzrovia West & Soho
- 5 Newcastle City Centre
- 6 Leeds City Centre
- 7 North Central & Dartmouth Circus
- 8 Marston Green & Airport
- 9 Springwell & Usworth
- **10** Woodhouse Park & Ariport

Top 10 night-time workers hotspots between **2am and 5am**

- 1 Heathrow, Harmondsworth & Simpson
- 2 City of London
- 3 Strand, St James & Mayfair
- 4 Woodhouse Park & Ariport
- 5 Langley Green & Gatwick Airport
- 6 Marston Green & Airport
- 7 North Central & Dartmouth Circus
- 8 Springwell & Usworth
- 9 Fitzrovia West & Soho
- 10 Newcastle City Centre



Night shifts: Mapping the 'other' nine-to-five

Shift lengths throughout the night

By analysing when people get to work and when they leave again, we can see the average lengths of shifts starting at different times of the night. The verdict? Shifts starting between midnight and 4am are typically the longest of the night shifts, at an average of 6.4 hours.





How long to get home?

Getting to work and back always requires planning, whether going by car, by public transport or on foot. Transport options and safety considerations make things even more complicated for nighttime commuters. How far do these night-time workers have to travel to get home? And how can they commute when public transport is limited, compared to daytime schedules?

For planners of night-time services, our data can show how far night-workers have to travel. We found that:

- Night shift workers finishing work between 12am and 4am travel the furthest, clocking more kilometres than others finishing at different times.
- Night workers categorised as Metro Suburb workers typically have the longest journey to and from work.

Conclusion: New levels of insight into the UK's 24-hour economy

The way the UK works and plays is ever-changing, with new hotspots, activities and mobility patterns emerging alongside perennially popular choices. Those tasked with planning for a 24-hour economy need a reliable way to keep up with those changes and ensure that services and facilities strike the right balance between demand and affordability.

This report has shown the wealth of up-to-date insight available from aggregated and anonymous mobile network data. As an ever-growing resource, it's one of the best large-scale indicators of where the UK population goes at night, how they get there, and how they get home again. If your role involves planning, design or feasibility studies of night-time experiences, mobile network data can help you make decisions with greater confidence.



Get more insights with BT Active Intelligence

The findings in this report give just a flavour of the insights that BT Active Intelligence data can provide. If you're interested in knowing how our data could help your planning or policymaking initiatives, please do get in touch for a chat:

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If you'd like to learn more about how we created this report, please see the <u>methodology here</u>



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