Greater London Authority (GLA)

The economic future of the Central Activities Zone (CAZ)

Phase 1 report

Office use trends and the CAZ ecosystem

January 2021

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Executive summary

I. Introduction

- The report researches the future of London's Central Activities Zone (CAZ), to assess the impact of both the COVID-19 global pandemic and Brexit on the area in the medium (2 – 5 years) and long term (5 – 10 years).
- Phase 1, this stage, includes office use trends in the CAZ, the CAZ ecosystem and the interaction of the CAZ with the rest of London and the UK. Phase 2, to be carried out later in the spring, will build three scenarios which will test the scale of the economic impact on the CAZ over the medium and long-term cycles.

II. The CAZ economic ecosystem

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

- The CAZ, which includes the Northern Isle of Dogs where Canary Wharf is located, experienced significant economic growth in the period up to the onset of COVID-19,with GVA growth of 13% in the years 2015-2018 (ONS, 2020j) outperforming the rest of London, and the rest of the UK.
- This was driven by strong growth in the emerging office-based sectors, and to a lesser extent, retail, public sector and traditional office-based sectors. In recent years, high jobs growth in non-white collar industries has led to a fall in GVA per worker (a measure of productivity).
- This growth has taken place broadly sustainably, with accommodation of more workers without a corresponding increase in carbon-intensive transport use.
- Following the 2008 financial crisis, the CAZ both had a shallower GDP downturn and recovered more quickly than the rest of London, and the rest of the UK (a similar pattern was observed in Manhattan and central Paris). Nevertheless, this crisis is different; it is deeper and has knock-on societal impacts that affect the CAZ directly, and could persist for longer.

2. The CAZ has a functioning ecosystem made up of essential industries, users and institutions

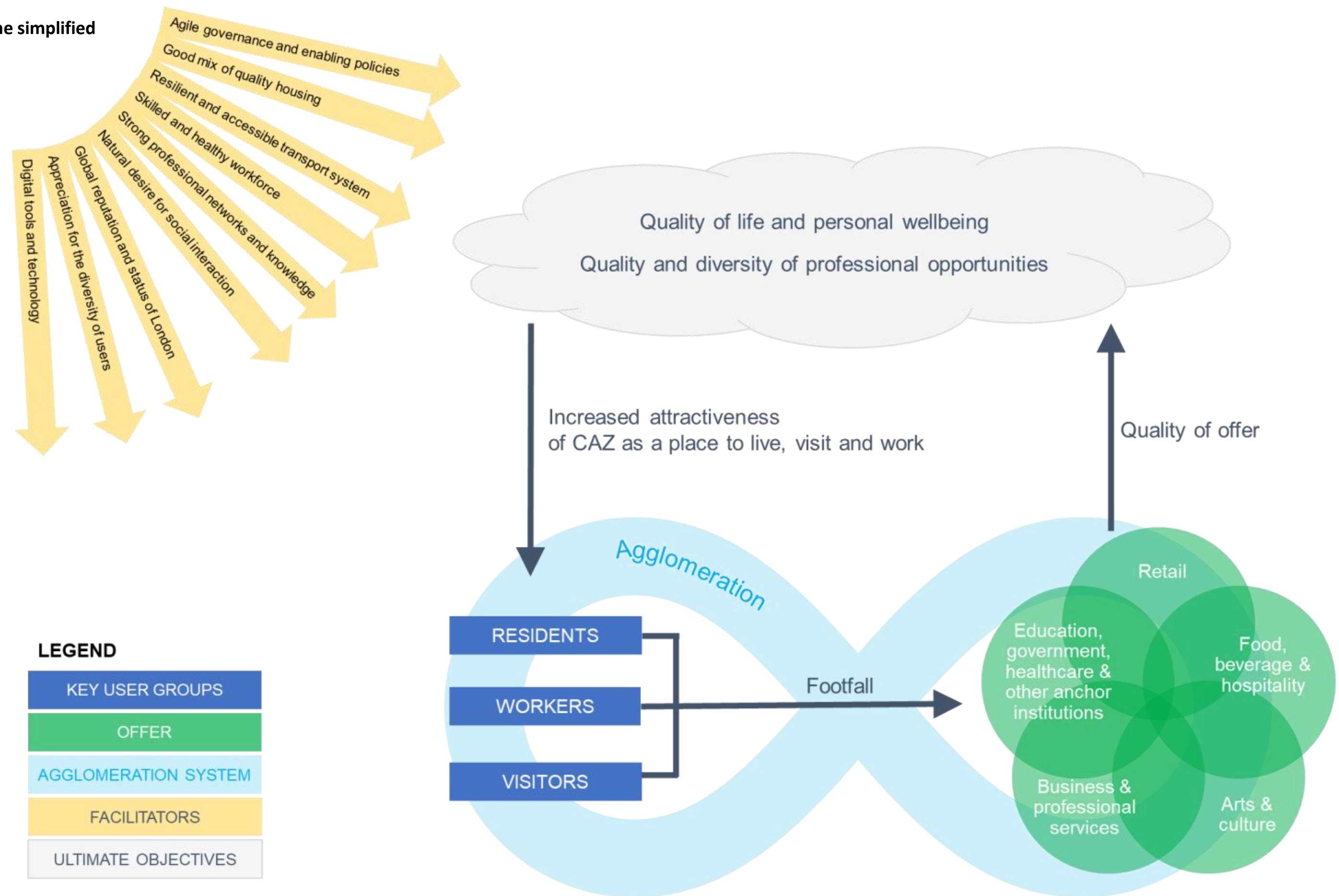
- Much of the CAZ's success is down to the unique mix of sectors, institutions and companies within its boundary. Increased office workers and tourism leads to an improvement of the leisure and cultural opportunities, which have, in turn, encouraged more individuals and organisations to work in, visit, or to relocate to the CAZ.
- Within this, the role of tourism, the arts and culture sector and the night-time economy cannot be overstated. London-wide, arts and culture represents a £58bn contribution to annual GVA. It employs 26,000 people in the CAZ (Arup 2020a; ONS, 2020k). It is a major influence on London's international reputation, and attracts individuals and companies to London, perhaps more so than career prospects (LSE, 2020). The ecosystem is at risk if London's arts and culture offer is not supported.

3. The CAZ ecosystem thrives on its diversity of users

- The CAZ recruits from all over the world, and the mix of nations, races, and religions found in central London provides a feeling of rich diversity that is unrivalled anywhere.
- The CAZ also plays an important role in terms of cultural diversity. For example, London's LGBTQ+ night venues are overwhelmingly concentrated in the CAZ.
- Brexit and COVID-19 put some of this at risk: one recent estimate suggests that London's migrant workforce has fallen by 700,000 people during the pandemic (O'Connor and Portes, 2021). Future flexible working may help with workforce diversity, but, if employees follow through on their stated preferences, women and older employees are expected to visit CAZ workplaces less often than previously.

Executive summary

An illustration showing the simplified CAZ economic ecosystem



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4. Entertainment, and emerging office-based industries were growing fast before COVID-19

- Prior to the pandemic, emerging office-based jobs including those in R&D spaces and lab-enabled offices in locations including the Knowledge Quarter were the fastest growing sectors within the CAZ. Entertainment and food and beverage have also increased significantly.
- Although retail remains hugely important, for many years London has been moving gradually away from being a market (for shopping) to being a playground (for conspicuous consumption at events, bars, restaurants, and theatres). The experience economy (Gilmore and Pine, 1998) is giving way to the transformation economy.
- To attract people to a playground suggests more emphasis on quality of place, including the public realm. London's rivals, especially Paris, have taken significant action in this space already.

5. The CAZ is UK's global city centre

- Despite covering only a tiny fraction of its landmass, the CAZ, is home to 4.4% of UK jobs, and contributes 7.8% of UK Gross Value Added (GVA) (ONS, 2020j).
- Some 60% of all UK box office revenues are derived from West End audiences (SOLT, 2019).
- The CAZ is also the birthplace and nursery of many of the UK's companies; domestically, more firms migrate out of London than migrate in (GLA, 2016b).
- As the UK begins its road to economic recovery after the pandemic has subsided, it will need the CAZ's strength, and fiscal contributions, in order to build back better.
- London is a popular tourist destination and brought £15.7 billion to the UK's economy in 2019, more than 63% of all international tourist spending in England (ONS, 2019b). A high proportion of this spending occurs within the CAZ boundaries, having a high concentration of tourist attractions.

III. The impact of COVID-19

6. COVID-19 has been incredibly damaging and requires urgent action

- The impact of COVID-19 is severe and far reaching, with a loss of almost a quarter of a million workplace jobs in London between March and the end of 2020, the highest fall in the UK (GLA, 2020e). Footfall and spend in the CAZ have been hit harder than anywhere else in the UK.
- Some of the economic activity in the CAZ has been taking place in the rest of London, but it has not been completely replaced.
- There is an opportunity for in inner and outer London to capitalise on this growth by using local loyalty to help stem any decline in in-person retail. There are also opportunities for property owners within the CAZ to reinvent and change retail space to other uses.
- International tourism is expected to rebound to reach 2019 levels in 2024, and domestic tourism will reach 2019 levels sooner, in 2023 (Tourism Economics, 2020). This will have major implications to the retail, culture, and food and beverage offer that is found in the CAZ and across London. Tourism upholds the quality and quantity of these offers, and they drive tourism demand in return.
- Without footfall increasing, and cultural industries bouncing back swiftly, the previous symbiotic relationship in the ecosystem is now at risk of being replaced by a vicious circle, threatening London's pre-eminence as the leading world city to visit, live and work.

7. A changing built environment and commercial property market will impact business rates income

- With the potential for a slowing economy, business uncertainty, and changing ways of working as we come out of the pandemic, the changes to the property market will bring new risks for London's locally-raised finances.

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IV. The future of the CAZ

8. Office occupiers will re-assess their needs, but will not abandon the CAZ

- A return to full-time office attendance appears unlikely, and so some immediate rationalisation of floorspace appears inevitable for many employers. Nevertheless, a return to the office for a sustained period of 3-4 days per week is feasible.
- The quality of office space is likely to improve as employers need to entice employees and clients. Demand has held up for the highest quality offices, suggesting that this 'flight to quality' has begun. Accommodating for active travel is also important.
- There are immediate prospects for expansion of office accommodation in the rest of London, in areas which benefit from strong transport connections.
- Within the CAZ, areas which are closest to rail stations, and higher density residential areas, and are therefore more suited to one-stop cycling or walking commutes, may benefit in terms of demand and stronger lease values.
- From the medium term (2-5 years) onwards, we see a return to prominence of the CAZ. The last decade has seen a centralisation of offices across all sectors. We suggest that this trend will return, especially within emerging and high profit sectors such as tech, life science, and amongst knowledge cluster occupiers.
- There are several behavioural factors that might increase office worker visits, or mitigate the impact on the CAZ. Workers may increase their visits over time because of a 'fear of missing out.' The popularity of going to work on Tuesdays-Thursdays my help sustain the office property market. And the tendency of workers to save up retail, entertainment and culture spend for days in town may soften the impact on those sectors.

9. Brexit remains a key challenge, but London is a difficult hub to replace in terms of financial services

- Brexit presents a potential direct threat to the City and Northern Isle of Dogs (NIoD) areas through the reduction in the volume of financial transactions, the movement of key financial services firms and the predicted exodus of skills and talent. However, London is a difficult hub to replace in terms of size, attractiveness and competitiveness for global markets.
- FDI has already fallen significantly, but upside opportunities for FDI exist for London.

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

- The CAZ may widen its labour market significantly if less frequent commuting is to remain. This opportunity becomes greater with the delivery of the Elizabeth line, and, later, with HS2. In future, commuters to the CAZ may consist of a greater number of individuals, each making fewer visits.
- Certain tasks may be performed well remotely. But meetings with high importance are likely stay physical for the foreseeable future. The importance of in-person learning, company culture and personal relationships also suggest that the CAZ's characteristics as the centre of the UK's transport network will remain an asset going forward. But the tasks which are performed in the CAZ will change.
- Longer term, remote working may strengthen the CAZ's position as the command-and-control point of the economy; it will provide the location for the in-person interactions which are necessary to sustain complex remote production networks.
- In the next decade there are likely to be successors to video conferencing technology, which may begin to create a virtual agglomeration. However, a lack of upgraded digital infrastructure may slow down the trend.

11. Fewer commuters to the CAZ creates a challenge, relative to its global rivals

- Approximately three time more people live within a short walk or cycle of the centre of New York and Paris, compared with London. A shift to home working therefore risks impacting more, relatively speaking, on London's economy and offer as a global city.

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- It is imperative that the CAZ is a more attractive location so that office workers and others will want to visit. Longer term the GLA and government plans for new homes within the CAZ will result in increasing residential population.

12. Opportunities for change in the CAZ and across London

- CAZ workers and visitors tend to live in inner London. For these workers, the difference in commute times between the CAZ and a possible satellite office may be minimal, and the benefits of the CAZ (in terms of meeting colleagues, clients and suppliers) are higher.
- Satellite offices may be more feasible in outer London, or the rest of the south east, but the volumes may be lower, and the radial nature of London's public transport networks may make it difficult to deliver sustainably
- If home working remains, there is possibility of increased leisure overall, through latent demand from home workers. This creates opportunities for increased demand for hospitality, arts and entertainment industries closer to residential areas in inner and outer London. This could change the overall demand for land across the capital.

V. Conclusions

- This moment is a marker in the CAZ's history, and for London and the UK with it. Yet, with optimism, this provides an opportunity to reimagine a vision for the CAZ in the context of the rest of London, so that it is an area that office workers and tourists will want to visit, and residents would want to live in, and to meet other policy outcomes, including lower congestion, inclusive growth, improved air quality, and meeting net zero.
- Diversification of businesses and organisations is key here, not only to act as different parts of the ecosystem, but to provide increased resilience to future shocks and stresses. To enable businesses to replace the ones that are lost, a degree of certainty is required, and in its absence, there may need to be additional incentives to invest.
- It is essential that action is taken now, and that we get off on the "right foot". The years 2021 and 2022 are important for encouraging people back into town, establishing behavioural traits, making long-term plans and perhaps most importantly ensuring that London's unique and internationally significant arts and culture offer survives. This is a long term programme, and London's global rivals have already started to move.
- The London Recovery Board has determined a clear agenda for London to deliver on. London's business and community groups have come together with the Mayor and London boroughs to formulate nine 'missions' addressing a common grand challenge: *to restore confidence in the city, minimise the impact on London's communities and build back better the city's economy and society.*
- Visionary leadership will be required to deliver long-term, effective change. There is a risk of complacency, or even the turning of a blind eye, given the national policy agenda. It is essential that central and local government work together and that the laudable levelling-up agenda does not become, post-COVID-19, a levelling down for the capital.
- The scale of close collaboration between the Mayor, London Boroughs and representatives from the capital's key public, private and voluntary organisations seen in the London Recovery Board is unprecedented and presents an important opportunity for the city.
- Firms and employers also have a role to play in encouraging employees back to the office sustainably, and once it is safe to do so, ensuring that their own working policies do not impact adversely on equality, diversity and inclusion.
- The next phase of our work will look to alternative futures. Three scenarios will be modelled to focus on the medium-term and long-term timeframes (2-5 years and 5-10 years). The team will collate a long list of variables informing the scenarios, and categorise these into scale of impact and likelihood. Our final report is expected to be published in March 2021.

Contents

I. Introduction

Glossary of terms

BEIS	Department for Business, Energy and Industrial Strategy
BRES	Business Register and Employment Survey
CAZ	Central Activities Zone
DfT	Department for Transport
Emerging office-based jobs	Media, architecture and creative, IT and communications, science, marketing
EU	European Union
F&B	Food and beverage industry
FDI	Foreign Direct Investment
FT	The Financial Times
FTE	Full-time equivalent
GDP	Gross Domestic Product
GLA	Greater London Authority
GVA	Gross Value Added
HGV	Heavy goods vehicle
LGV	Light goods vehicle
LSOA	Lower Super Output Area
LTN	Low traffic neighbourhood
Mph	Miles per hour
MSOA	Middle Super Output Area
NIoD	Northern Isle of Dogs
NO2	Nitrogen Dioxide
OECD	Organisation for Economic Co-operation and Development
ONS	Office for National Statistics
p.a.	Per annum
TfL	Transport for London
Traditional office-based jobs	Finance, legal, real estate, headquarters and management
ULEZ	Ultra Low Emission Zone

Important Notice

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Ove Arup & Partners Limited

London School of Economics

Gerald Eve

January 2021

Foreword

The success or failure of London, and the UK is intrinsically linked to the success or failure of the CAZ

This is an incredibly damaging time, both in terms of the loss of lives, and of livelihoods. COVID-19 has hit London, and the CAZ, perhaps the hardest of all locations in the UK, in terms of the health crisis, and the following economic crisis. The impacts of this crisis, and the scars that it will leave, will be long lasting.

But the following months and years are also a time of opportunity to prepare the CAZ, and London, for the next phase. The pandemic is going to accelerate many previous trends, and so presents a moment in which these can be accommodated. Together the CAZ, and London, have weathered, and eventually thrived as a result of past challenges, including previous pandemics, world wars, and the financial crisis. These events left legacies that are still felt today. And the recoveries often took time, but were enabled by swift, often substantial policy interventions on behalf of branches of government, organisations, and wider society. This crisis requires a similar level of attention. The London Recovery Board is a welcome intervention in this space and has determined a clear agenda for London to deliver on.

The CAZ is the UK's (and Europe's) global city, and its shop window to the world. For the nation's sake, and London's, the CAZ needs to recover quickly and in the right way, potentially on a different path, to respond to the post-COVID-19, post-Brexit world. This is a chance to re-assess the functionality and performance of the CAZ, so that when it does recover, it will work better for everyone.

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Introduction

Aims of the study

Our scope and phases of work

The report researches the future of the Central Activities Zone (CAZ), to assess the impact of both the COVID-19 global pandemic and Brexit on the CAZ in the medium term (2 – 5 years) and long term (5 – 10 years). The CAZ operates alongside the rest of the capital and therefore the study also examines the relationship this impact will have on London as a whole.

Arup, Gerald Eve and the London School of Economics were appointed by the Greater London Authority (GLA) to carry out the work in two stages.

Phase 1, this stage, is a baseline review of the CAZ with a particular emphasis on office use trends in the CAZ; interdependencies within the CAZ ecosystem; and, the interaction of the CAZ with the rest of London and the UK. Our focus in this report has been on the future trends among office workers and employees, and their impacts on the wider CAZ ecosystem. Other, important parts of the CAZ ecosystem, such as the behaviour of non white-collar workers, tourists and residents, have been considered to the extent that they are affected by white collar workers.

Phase 2 will build three scenarios which will test the scale of the economic impact on the CAZ over the medium and long-term cycles. During both Phase 1 and Phase 2, qualitative research is being undertaken through subject expert focus groups to test sentiment, confidence and observations of performance in the CAZ during the pandemic.

The work will culminate in a final report in spring 2021 which will provide policy recommendations and strategy implications to support a sustainable recovery for both the CAZ, and London. It is in this final report that the outcomes of a quantitative modelling exercise will be outlined. This model will look at three likely future scenarios, designed based partly on the findings in this report.

Our assumptions on COVID-19

This work is being produced during a hugely uncertain period. Phase 1 has been carried out during December 2020 and January 2021, a time in which a Brexit deal was announced, the UK left one pandemic-induced lockdown to enter another, new strains of the COVID-19 virus spread rapidly, and vaccines began to be administered. The reader should bear this volatility in mind when studying this work.

Our work assumes that the health emergency as a result of the pandemic has concluded within two years but, that some cultural and behavioural legacies may endure, including a fear of further pandemics, or new strains, and that there is not a further macro-economic shock. We also assume that the government response is yet to be determined (that is, we do not assume a particular set of policy responses in our work).

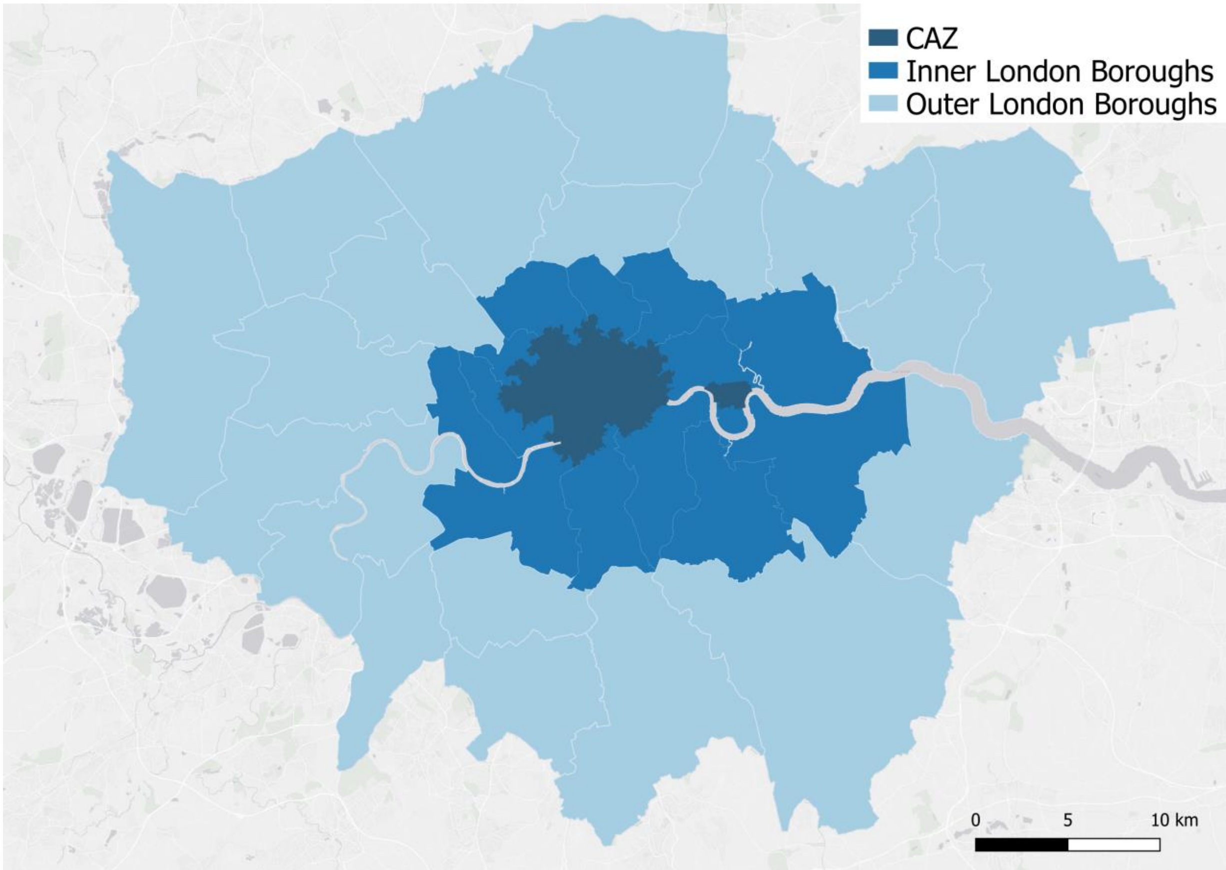
Introduction

The geography of the CAZ, inner London and outer London

The CAZ, as defined in the Publication London Plan, covers much of the city core.

It is a network of neighbourhoods and identities, a series of distinctive places which attract a broad range of people to live, work, study and visit. Steeped in history, the CAZ is home to the seat of national government and some of the country's most significant heritage assets. It plays host to culture, arts, retail, entertainment, food and drink, education, and business – from start-ups and knowledge driven sectors to some of the largest businesses in the country. The breadth and abundance of the offer makes examining the CAZ and its economic ecosystem both delightful and challenging.

This report will often reference the CAZ which might suggest one place, but it is much more than that. Where possible its distinct neighbourhoods and economic layers will be unpicked and referenced, but, at other points might be described as a whole.



Study geographies: CAZ, non-CAZ Inner London and Outer London: CAZ boundaries defined by all LSOAs within or intersecting with the CAZ official boundaries available on the London Data Store

Introduction

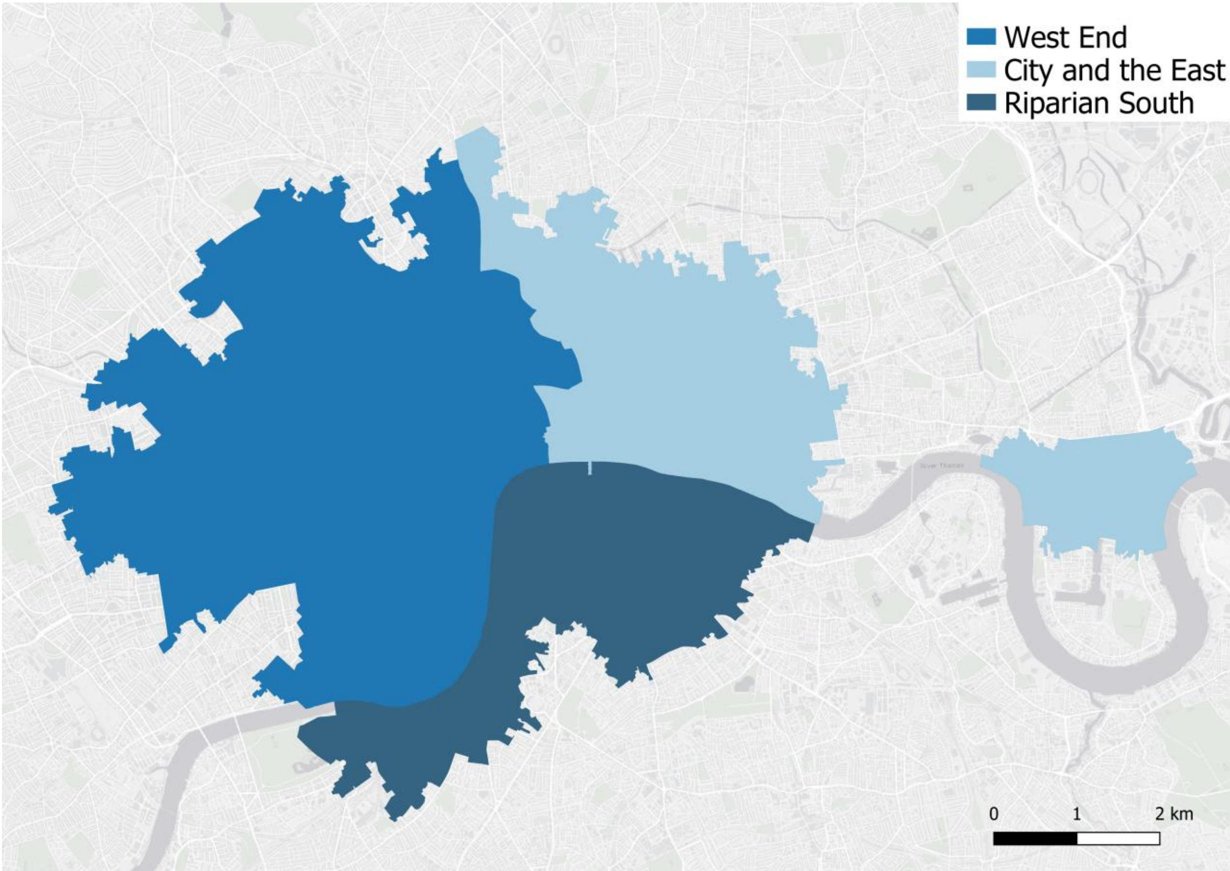
Sub-geographies within the CAZ

The CAZ has been defined using boundaries based on the Publication London Plan (GLA, 2020b), and built up using:

- Lower Super Output Areas (LSOAs) where possible.
- Middle Super Output Areas (MSOAs) where LSOA data is not possible or when maps would be made more legible.
- Estimates based on borough-level data, pro-rated to the CAZ spatial area, when neither LSOA or MSOA data is available.

In this last case, where data has been estimated, this has been noted in the relevant charts and/or maps.

The CAZ, can be divided into sub areas, including the City of London, the West End, parts to the south of the Thames, referred to as the Riparian South, and the Northern Isle of Dogs (NIoD).



Sub-geographies within the CAZ: West End (all CAZ LSOAs located in Camden, Kensington and Chelsea and Westminster), City and the East (all CAZ LSOAs located in City of London, Tower Hamlets, Islington and Hackney) and Riparian South (all CAZ LSOAs located in Lambeth, Southwark and Wandsworth)

Introduction

Unsplash: Thomas Charters

West End

The West End features a rich mix of retail, homes, culture, dining, entertainment, visitor accommodation and offices. It has twice as much retail floorspace than the City and the East, at around 1.2 million sqm, and around 800,000sqm in hotel space. It also makes up more than half the entire land area of the CAZ, and is therefore home to many more people – around 180,000 residents.


Unsplash: Alex Tai

City and the East (incl. NIoD)

Comprising the City of London and the Northern Isle of Dogs to the east, this is the area of London most dominated by commercial real estate. It also contains the historic core of the city, and – under normal circumstances – hosts vast numbers of tourists and visitors each year. There is more than 10 million square metres of office floorspace in the City and the East, and it is also home to around 88,000 people.


Unsplash: Inset Agency

Riparian South

This study area, so called because it runs parallel along the southern edge of the river Thames, includes areas such as London Bridge, Borough, Waterloo, South Bank and Vauxhall. It also includes the new developments taking place around Nine Elms. Despite its modest size (10% of the CAZ area, if we exclude the river itself). Riparian South is the largest provider of entertainment space, and is home to around 80,000 people.

II. The CAZ Economic Ecosystem

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

Unsplash: Ryan Tula

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

The CAZ's growth outpaced the rest of London in the period immediately before COVID-19

335,0000 residents, up 25% between 2011 and 2019

The number of CAZ residents increased 25% between 2011 and 2019 (compared with +11% in the rest of inner London, and +7% in outer London) (ONS, Population Estimates, 2019a)

26% of all employment in London

The CAZ was home to 1.4m jobs in 2019, representing one-quarter of London's workers - or over 4 jobs per CAZ resident (ONS, BRES, 2019)

10% employment growth in 5 years

Employment has grown faster in the CAZ than in the rest of London (rest of inner London +6% only, outer London +3%) (ONS, BRES, 2015 – 2019)

¼ of London's retail and other services jobs

Over 260,000 of London's 1.2m retail and other services jobs are in the CAZ (ONS, BRES, 2019)

Visitors up 35% over last decade

Visitor numbers to London have grown by 35% over the last decade. Before COVID-19, they were expected to increase by another 30% by 2025. (Centre for London, 2020a)

16% of London's retail is in the CAZ

The CAZ takes up 3% of the area of London, but is home to 16% of its retail (GLA Economics, 2021a)

→ The CAZ has been moving towards a healthier balance of economic activity and liveability as both economic activity and population have been growing in the past years.

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

The CAZ has a high employment density, which grew higher in the years before COVID-19

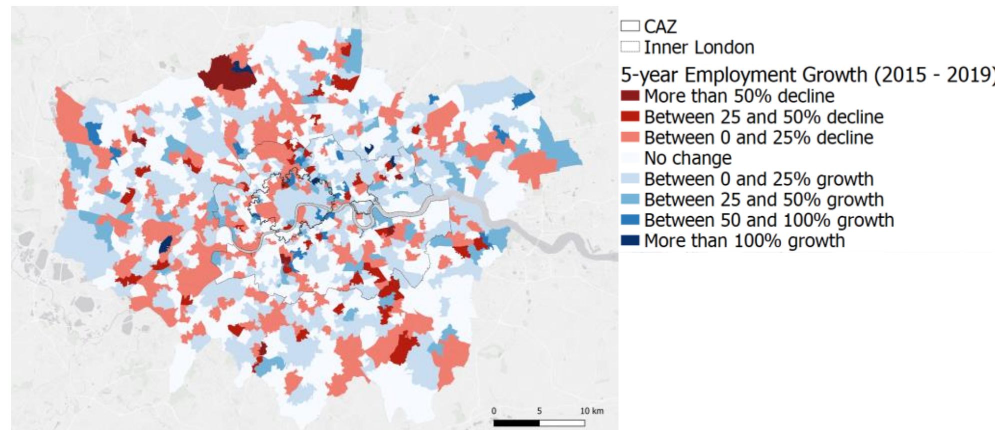
The CAZ is significantly more dense in terms of employment (382 jobs per hectare on average, going up to over 1500 in the City of London, Tower Hamlets and Westminster) than elsewhere in London (55 jobs per hectare in the rest of inner London and 20 in outer London).

Employment grew by 10% in the CAZ over the last 5 years, faster than in the rest of inner London (6%) or in outer London (3%). Within the CAZ, this growth has been driven mainly in the City and the east side of the Riparian South (ONS, BRES, 2015 - 2019).

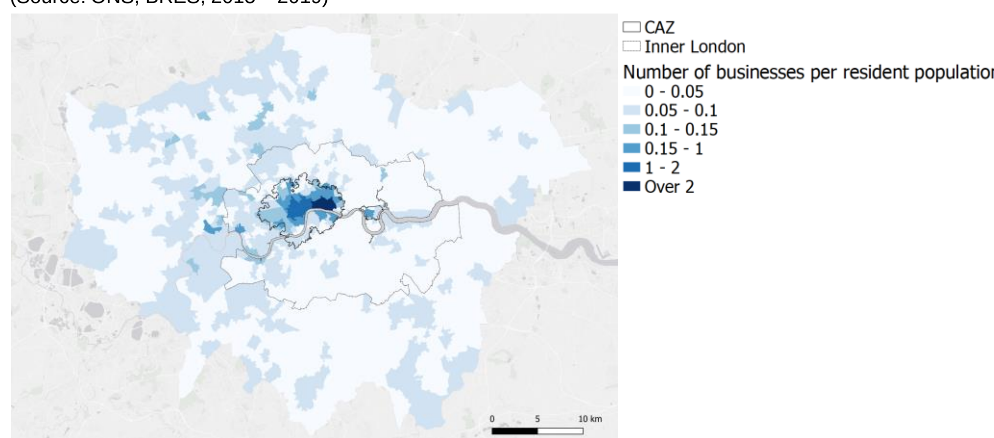
There were just shy of 100,000 enterprises in the CAZ in 2019, representing around one in five of all businesses in the capital. This number has increased by 16% in the last 5 years, compared to a rise of 11% in the rest of inner London and 7% in outer London (ONS, 2020e). In the City, with its relatively low resident population, this ratio is at its highest, at around 2.5 businesses per resident.

In 2019, there were roughly 4 jobs for every resident of the CAZ (ONS, 2019a; ONS, 2011-2019), compared to 0.7 job per resident in the rest of inner London and 0.4 in outer London, indicating just how many people commute into the CAZ for work.

The focussing, and rate of growth of employment activity on the CAZ gives some hope that the upwards trend might be replicated post-pandemic. However, it also illustrates the CAZ's reliance on commuters, tourists and other visitors for its footfall and vibrancy.



5-year total employment growth was higher, on average, than the rest of London (by MSOA)
(Source: ONS, BRES, 2015 – 2019)



Number of businesses by resident population was by far the highest in the CAZ (by MSOA)
(Source: ONS, Population Estimates and UK Business Counts, 2019a and 2020e)

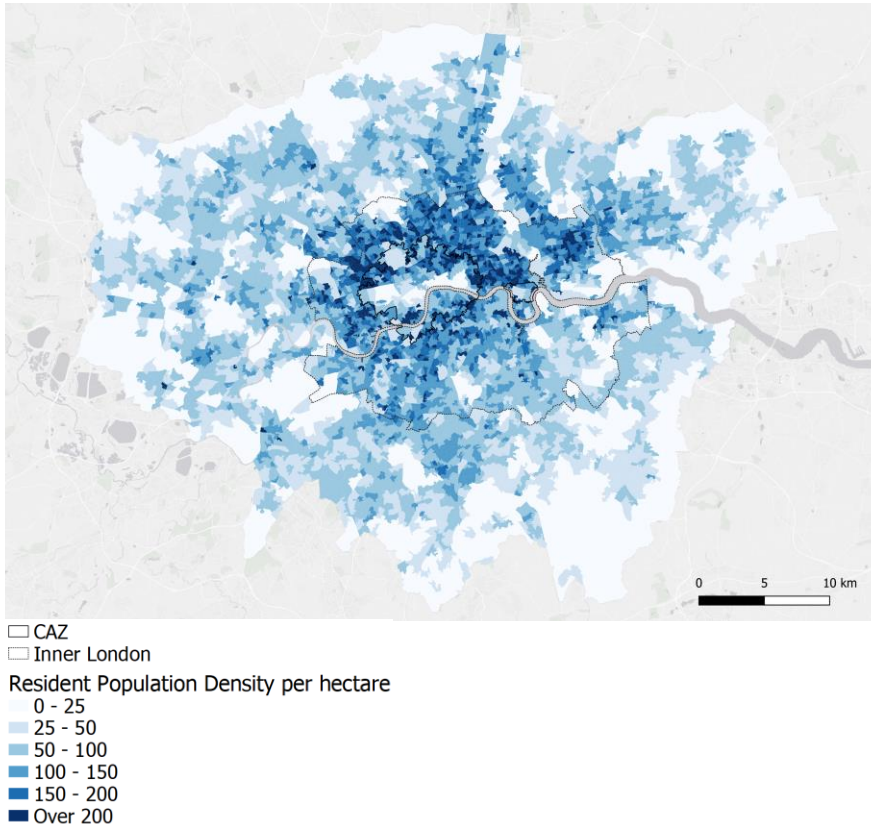
1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

The CAZ as a place to live

CAZ residents perform an important stewardship role, helping to maintain the attractiveness of districts for other stakeholders and visitors (Arup, 2018). There were around 335,000 CAZ residents in 2019, equating to 9% of inner London residents or roughly 4% of all London residents. The growth in the number of residents in the CAZ has significantly outstripped the rest of London, with a rise of 25% in the CAZ's resident population between 2011 and 2019, compared to 11% in the rest of inner London and 7% in outer London (ONS, 2019a). The CAZ still has a lower residential density that the areas around it, partly because of the coverage provided by the Royal Parks.

The Publication London Plan (GLA, 2020b) identifies the CAZ as having the capacity, accounting for demand and land availability, to accommodate 85,600 new homes within Opportunity Areas. If achieved, this would considerably increase residential density in the heart of the capital. In December 2020, the government published updated housing need figures for each local authority in England, including the local authorities which make up the CAZ, which appears to push the targets further.

This will be reflected in a future London Plan. In the interim, given the low residential density in the CAZ, businesses depend on workers, tourists, and other visitors for their survival.



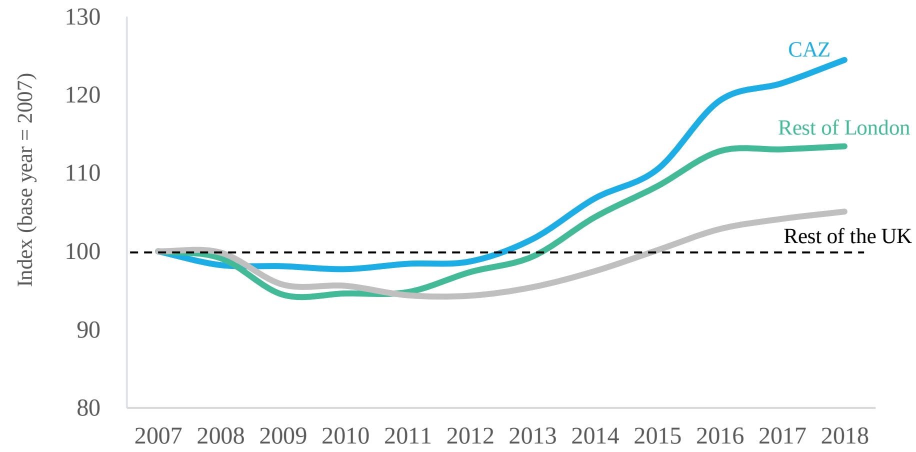
Resident population density is lower in the CAZ than in much of London (per hectare by LSOA) (Source: ONS, Population Estimates, 2019a and LSOA shapefiles from the London Data Store to calculate the surface for each LSOA)

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

The economic growth of the CAZ continues to be driven by the knowledge-based service sectors

The CAZ economy experienced significant growth in the decade leading up to COVID-19, outperforming the rest of London, and the rest of the UK. Its economic success has seen GVA grow by 13% between 2015 and 2018 (ONS, 2020j), faster than the rest of London and the rest of the UK. In 2018, Gross Value Added (GVA) contribution from activity based in the CAZ reached £147 billion, approximately 8% of the UK GVA (ONS, 2020j), and 30% of London GVA.

The significant growth in CAZ GVA can be substantially attributed to emerging office-based sectors, including life sciences, technology and digital, and the creative industries, and to a lesser extent, retail, public sector and more traditional office-based sectors. In 2018, both the emerging and traditional office-based sectors, accounted for around one-third of total CAZ GVA, equivalent to around £50 billion each.



GVA Contribution 2007-2018 (baseline = 2007) (Source: ONS (2020j) Regional gross value added (balanced) by industry: all NUTS level regions*) **Due to the unavailability of 2007-2008 GVA contribution via ONS by region, 2007-2008 GVA estimates were extrapolated based on the UK GVA trend in the same period*

Area	GVA Contribution 2018, £ billion**	GVA Contribution % of UK Total
CAZ	£147 billion	7.8%
Rest of London	£320 billion	16.9%
Rest of the UK (exc. London)	£1,421 billion	75.5%

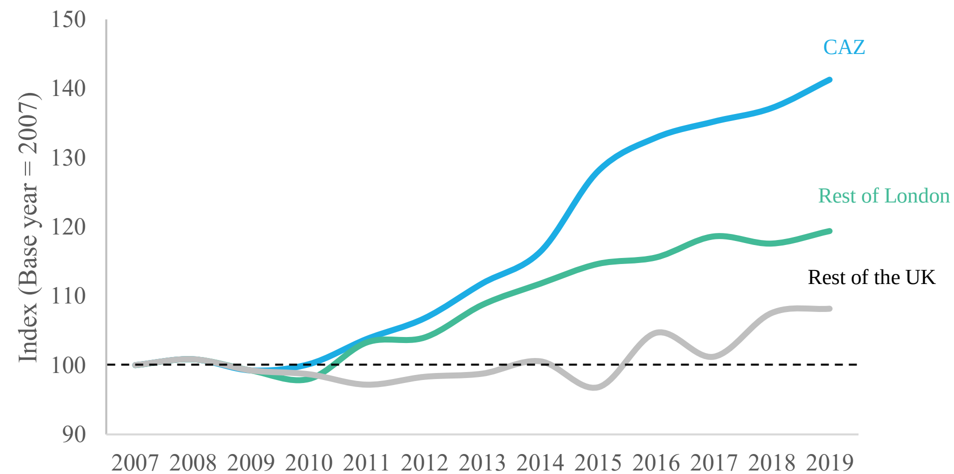
GVA (Balanced Approach) Contribution (£ billion) **2020 real prices, rounded to the nearest billion (Source: ONS (2020j) Regional GVA (balanced) by industry: all NUTS level regions 2009-2018)

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

Employment growth in the CAZ has outpaced the rest of London and the UK

The CAZ provides around one-quarter of the jobs in London. In 2019, around 1.4 million people worked in the CAZ, accounting for 4.4% of the UK's total employment (ONS, 2019c).

Between 2007 and 2019, CAZ employment growth outpaced the rest of London and the UK, driven by entertainment, emerging office jobs, food and beverage, and other, mainly non-white collar occupations, which includes construction of buildings, postal and courier activities and utilities.



Employment Growth Indexed 2007 - 2019 (Base Year = 2007) (Source: ONS (2019c) Business Register and Employment Survey (BRES): open access)

Area	Employment Level, 2019*	Employment % of UK Total
CAZ	1,368,000	4.4%
Rest of London	3,749,000	11.9%
Rest of the UK (exc. London)	26,217,000	83.7%

Employment Levels in 2019 *rounded to the nearest thousand (Source: ONS (2019c) Business Register and Employment Survey (BRES): open access)

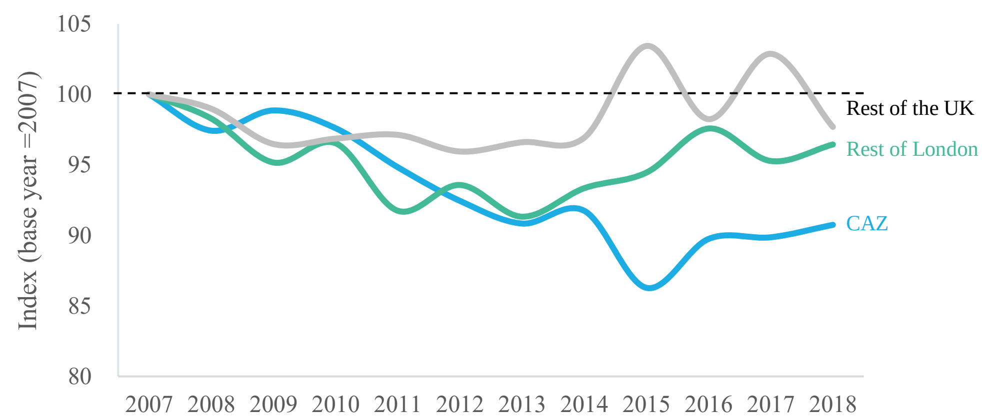
1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

The CAZ is a highly productive functional economic region

The CAZ is the most productive area of the country, and among the most productive in Europe. A proxy for economic output and productivity, GVA per worker in the CAZ stood at £110,000 (2020 real prices) double that of the rest of the UK (excluding London).

However, GVA per worker growth fell between 2007 and 2018 in the CAZ. This is due to the CAZ's relative success in creating more jobs in lower value sectors (such as entertainment, and food and beverage). It is common to many advanced economies, but appears to be particularly apparent in the CAZ.

In the rest of London, the rate of growth of GVA per worker fell after the recession following the financial crisis, but saw a return to growth between 2013 and 2018; the rest of the UK has managed to sustain its GVA per worker, albeit at a much lower level, in recent years.



GVA per worker growth 2007-2018 (base year = 2007) (calculated based on GVA (Source: ONS (2020j) Regional gross value added (balanced) by industry: all NUTS level regions*) and total employment by LSOA (Source ONS (2019c) Business Register and Employment Survey (BRES): open access) **Due to the unavailability of 2007-2008 GVA contribution via ONS by region, 2007-2008 GVA estimates were extrapolated based on the UK GVA trend in the same period*

Area	GVA per worker £*
CAZ	£110,000
Rest of London	£86,000
Rest of the UK (exc. London)	£55,000

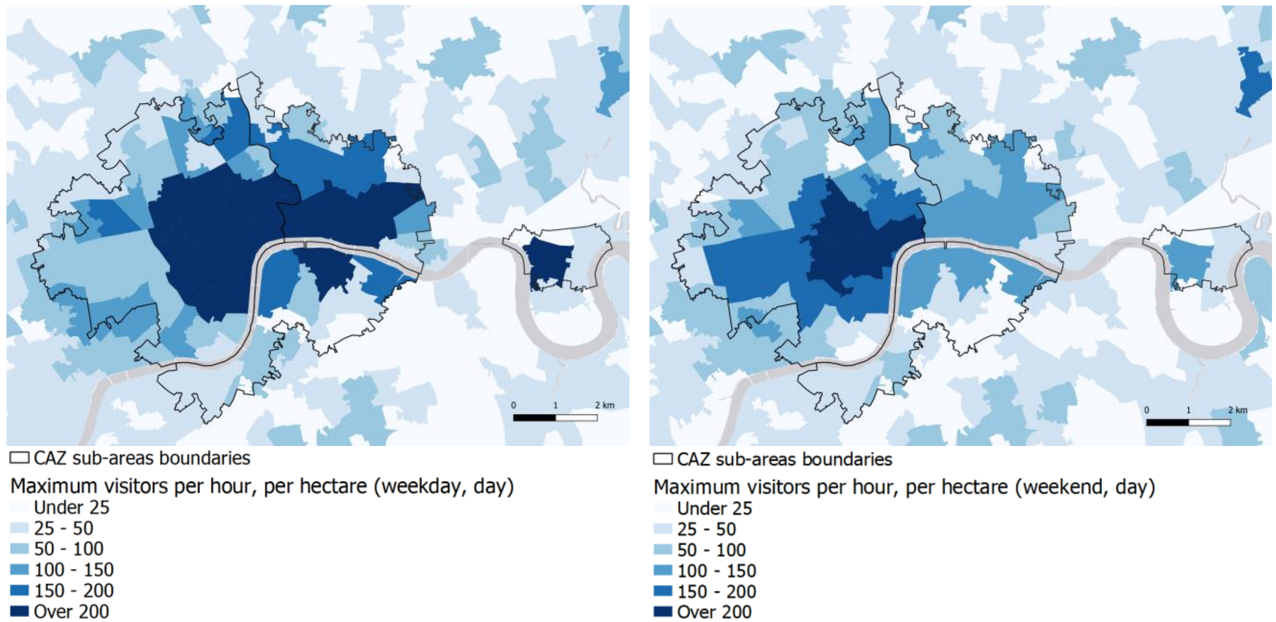
GVA per worker 2018 (real 2020 prices) rounded to the nearest thousand (calculated based on GVA (Source: ONS (2020j) Regional gross value added (balanced) by industry: all NUTS level regions*) and total employment by LSOA (source: ONS (2019c) Business Register and Employment Survey (BRES): open access)

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

Commuters, tourists and other visitors are important to the CAZ's economy

Illustrating the reliance on office worker and business visitor footfall, the CAZ, especially the City and NIoD, is much busier with visitors during the week, compared to the weekend, where numbers drop by around half.

Visitor numbers in the West End and Riparian South are more constant throughout the week, reflecting their importance as tourist and leisure destinations.



Maximum visitors hourly count per hectare during the day (6 am – 6pm) in July 2019, per weekday (left) and per weekend day (right) Visitors are defined in this data as those who spend more than 30 minutes in one place, but are not identified as workers or residents (Source: GLA, 2021c, O2 Data on people count between July and November 2020)

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

Some ingrained problems still remain, but the pre-COVID-19 trends were positive

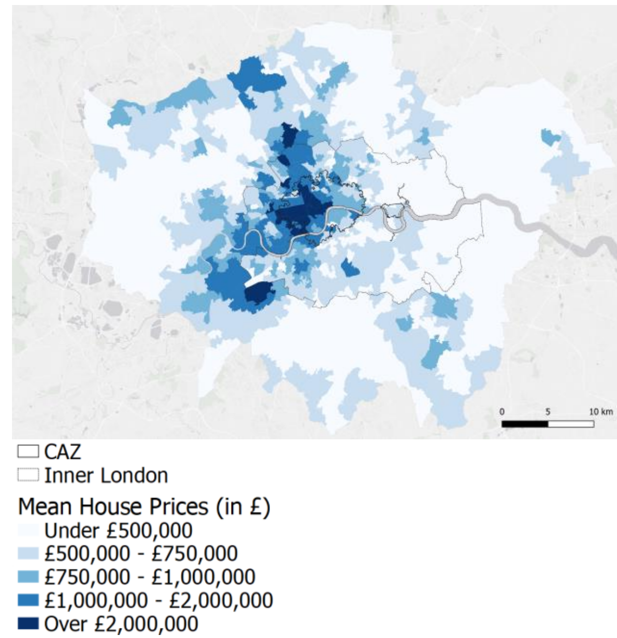
Housing affordability

Housing desirability in the CAZ is high, and as a result it attracts a significant premium. The average house within the CAZ in 2017 was valued at £1.2m, over four times the national average, and double the average in the rest of inner London (Land Registry, 2017); if value by area is taken account, many times those amount again. In the City of London and Westminster, house prices to average earnings ratios were at 15 and 22 respectively, compared with an England and Wales average of 8 (ONS, 2020b).

Following a small decrease after the financial crisis, house prices were rising between 2010 and 2017. Values showed stronger growth in the CAZ than the average for the rest of London, and the UK, and especially since 2005, when there has been an almost three-fold increase. More recently, between 2017 and 2019 there has been a more marked decrease in CAZ prices than elsewhere in the UK (HM Land Registry, 2017).

Adjacent to these high value properties are many thousands of council-owned homes, making up around 40% of the total housing stock in the CAZ (Centre for London 2020a). The disparity between those residents who can afford multi-million pound homes, and those who rent from Local Authorities and housing associations, is stark. Centre for London (2020a) suggested that a lack of intermediate housing - which would sit between these extremes - could potentially lead to polarised communities. Inequality is discussed in more detail in Chapter 3.

This housing inequality is evident within the CAZ, which is perhaps more acute than in the rest of London. An example of this is in Kensington and Chelsea, where disposable household income levels are among the highest in the country, but the borough is also home to residents in some of the lowest income deciles in the country (MHCLG, 2019).



Mean House Prices by MSOA (Source: HM Land Registry, 2017)

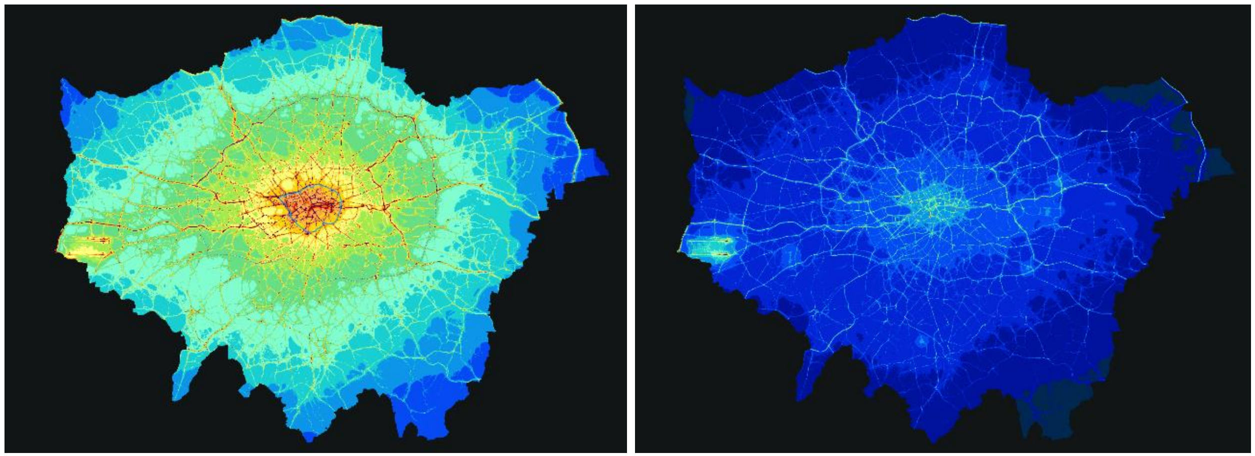
1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

Some ingrained problems still remain, but the pre-COVID-19 trends were positive

Traffic congestion and air pollution

Despite falling vehicle counts, central London has had significantly higher levels of congestion when compared with outer London and the rest of the UK. Between 2008 and 2018 average vehicle speeds fell by almost 20%, to just 7mph (GLA, 2019a). Despite an initial dip during the March 2020 lockdown, congestion in the city rose again in autumn 2020.

Primarily as a result of standing traffic, and its position at the heart of the capital's road network, air quality is also poorer in the CAZ. The ULEZ, and its extension to the outer circular road, alongside other mayoral policies and a transition to lower emission fleets, should improve air quality by 2025, although the CAZ is still modelled as having the highest levels of NO_2 concentrations in London at that time.



London's areas of poor air quality in 2016 (left) and 2025 (projected, right) were concentrated in the CAZ with Red, orange and yellow indicates higher NO_2 concentrations (Source: GLA, 2020a)

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

Some ingrained problems still remain, but the pre-COVID-19 trends were positive

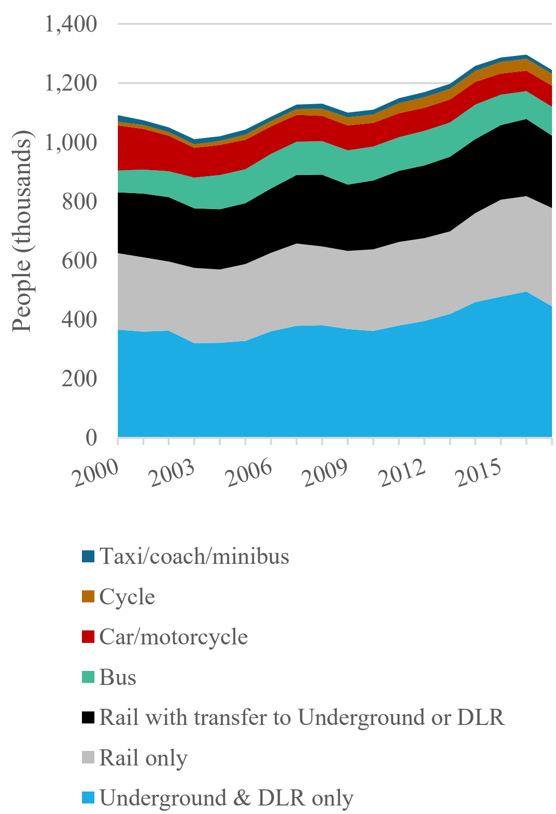
Conflict for space

Given the historical nature of London's built environment, and the dense urban form characteristic of the CAZ, it is inevitable that there is high competition for space. This competition not only includes travel modes such as buses, vans, taxis and cyclists competing for space on the busy road network, but also on the pavement and in public realm. More recently, there has been conflict and discussion on the role of low traffic neighbourhoods (LTNs) in terms of their allocation of roadspace among motorised and active modes. As pedestrians move around the streets in the CAZ, they must often negotiate street furniture, waste collection and narrow passing points. The pandemic has brought about an accelerated move towards outdoor cafes and dining, and an increased focus on the importance of quality outdoor space, and if these habits remain, it is inevitable that the pavements, roads, and other parts of the outdoor urban realm will become increasingly crowded.

Parts of the CAZ have had some success in tackling these issues

Despite this, the CAZ has managed to achieve recent economic growth relatively sustainably, with some marginal improvements in issues in recent year. The CAZ's housing affordability has eased somewhat (or at least, become slightly less unaffordable relative to the 2017 peak). Air quality has improved substantially and stands to improve further. The City of Westminster has demonstrated some recent success in alleviating deprivation, having moved from the fourth to the ninth decile in the period between 2015 and 2019 (MHCLG, 2019).

At the same time, London has been handed the accolade of the most sustainable transport city in UK, and in the top three in Europe (Uswitch, 2020); all of the CAZ's economic growth in the last decade has been achieved against a background of falling vehicle movements, and increased active travel modes, especially cycling. This gives the CAZ a good base to build on, and cause for optimism in overcoming its latest challenges. More generally, growth in the CAZ, as the most dense, public transport-dependent area of the UK, is likely to yield a much lower carbon value per pound of GVA created than if that growth were to have taken place elsewhere (Glaeser, 2011, and others).



People entering central London during the morning peak by mode, 2000 to 2017 (Source: DfT, 2019b)

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

The CAZ, and other central areas, have historically been quickest to bounce back from economic shocks, but this one is different

The 2008 experience

The CAZ (and other CAZs worldwide) were more resilient to the economic shocks from 2008. In the Great Recession, the CAZ both had a less steep GVA downturn and recovered more quickly than the rest of London, and the rest of the UK, and went on to enjoy healthy GVA growth for the following decade. Although Manhattan had a deeper initial impact from the financial crisis, a similar story played out in New York. When considering employment, an even rosier picture is painted, with the growth in jobs in central London and Paris barely dented by the financial crisis, and with both continuing to create jobs at a rate that significantly outstripped their hinterlands. Manhattan shed more jobs after the financial crisis, and has only grown these back in recent years (US Census Bureau, 2020; ONS, 2020j; INSEE, 2017; Eurostat, 2020).

The story may be as much to do with broader trends in growth industries, than to do with resilience per se. London was helped by the strength of its digital and technology sector. In the decade following the financial crisis, the economy has created jobs in areas in which the CAZ, and CAZs worldwide, specialise. This focus on growth in knowledge based sectors (those that rely on intellectual capital), technology and science, is fortuitous for the CAZ, as these sectors on wide labour pools, agglomeration economics, and knowledge spill-overs. They also operate in a market where applicants base career decisions on things like access to quality of food, beverages, entertainment, and hospitality, other CAZ specialties, that in turn create jobs in the trickle-down. London was also well-placed to benefit from the substantial growth in international tourism over the same period.

There may also be some human-related factors that could explain the previous resilience, and give optimism for the future. Our transport and human networks were (and continue to be) pointed towards the CAZ. Thirdly, the CAZ is able to draw on a diverse, innovative range of industries, and so damage to one sector may be countered by growth in another.

1. The past decade saw the CAZ experience significant and broadly sustainable economic growth

This crisis is different

This crisis is different and potentially much more serious. There are a number of differences to bear in mind when applying the lessons from the previous crisis to London, including:

- The societal and behavioural legacy from COVID-19 could be significant. Habits which go against the norms found in densely populated urban environments around social distancing that were formed during the pandemic, along with reputational impact as being 'a nexus of the virus', might persist long after the public health crisis subsides. Travel restrictions, and fear of a new pandemic or strain may persist long after this one has passed. As we explore elsewhere in this report, this potentially has an impact on working habits, tourism and Foreign Direct Investment (FDI).
- The COVID-19 crisis is even more global in nature than 2008, with almost every country in the world projecting a downturn. This suggests that globally facing industries – of which the CAZ is more exposed than most other parts of London and the UK – may be hit even harder.
- The duration and sheer scale of the COVID-19 crisis brings a more severe economic shock, and more uncertainty, in almost every field, from the future of globalisation, to homeworking habits, to the funding of transport networks that focus on London, that may give industries that would normally be growing, a disincentive to invest.
- The COVID-19 jobs impact on cities has begun in traditional non white-collar industries (retail, hospitality, travel), and has spread, whereas the 2008 crisis impacted initially upon white-collar financial jobs. The impact on the "real" economy has therefore been much greater, and more immediate. For better or worse, the speedy recovery of London's highest value industries appears more certain than those that traditionally employ the lower paid, suggesting a different type of post-COVID-19 downturn.

The unlocking process from COVID-19 restrictions provides an economic momentum on which to build, and arguably, the greater impact of COVID-19 provides more incentive for ongoing government intervention, beyond the immediate survival phase, that may catalyse action and stimulate growth.

2. The CAZ has a functioning ecosystem made up of essential industries, users and institutions

Unsplash: Simon Rae

2. The CAZ has a functioning ecosystem made up of essential industries, users and institutions

London's global role

London is one of only two Alpha ++ cities in the world, alongside New York City (Globalization and World Cities (GaWC) Research Network, 2020). London consistently features at the top, or in the top bracket, of the world's cities. For many of these polls, London's unique strength comes in combining political, economic and cultural power. Naturally, a risk to any of these strengths risks undermining London's global status.

The location of the CAZ and its transport systems plays a huge part in its success. In the past, London's location helped it become a focus of physical trade routes. This now means that the city has swift physical access to more of the world's population than many of its competitors, and has the largest airport system in the world. Its connectivity to the rest of London, the wider South East, the UK, and indeed the rest of the world ensures easy access to a wide labour pool, as well as visitors from home and abroad. However, this connectivity also means that it is vulnerable to restrictions in international travel.

London is recognised as being one of the most visited cities in the world (Street, 2019). Half of the trips to the UK include a trip to London (ONS, 2019b) and London has more 12 times more international visits than the next UK city (London & Partners, 2013). The CAZ has a high concentration of tourist attractions and 90% of all visits in London are to the top 20 cultural attractions of which most are located in the CAZ (GLA, 2017a).

Coupled with this, London has more perennial attractions. It is a pleasant place to live, work and do business, making it the most desirable city in the world (the World's Best Cities, 2020; Boston Consulting Group, 2018) and the "world's coolest city" (Rough Guides, 2020), despite the UK's recent reputational impacts from Brexit. In 2019, London became the world's first National Park City; one-third of the capital is open green space (World Cities Culture Forum, 2019), the highest figure for a major city, and a much larger proportion than in New York or Paris. London also has some of the best educational establishments of any major world city, with the highest performing schools system in the UK underpinned by the performance of migrants (Sunday Times, 2019; CMPO, 2014).

London has been named as the best student city in the world (QS Top Universities, 2019) for many years, with over 25,000 students from China alone, a number which was growing at 20% per annum pre-COVID-19, but is now much more at risk (HESA, 2020). Over half of London's 18 higher education establishments are in the CAZ, and they sit alongside core research institutions such as the Francis Crick Institute, the Alan Turing Institute and the Wellcome Trust.

London is home to the UK's central seat of government in Westminster, as well as ministerial departments, courts of justice, and the vast majority of foreign embassies. London homes, whilst expensive, are more likely to be better value than in New York, Hong Kong, or other global cities (Savills, 2019), and more likely to benefit from single family occupancy.

London has also for many years been the beating heart of the UK economy. London alone was responsible for nearly 4% of the total European, US and Japanese GVA in financial services (Oxford Economics, 2011), and if London were an independent nation it would have been the seventh largest economy in the EU, ahead of Sweden, Poland and Belgium (GLA, 2017c). Combined with the greater South East region, London would rank even higher. With the devolution agenda, it is imperative that London enables the levelling-up of the rest of the country, whilst maintaining its core specialisms and attracting talented and innovative individuals.

Though London is a true leader on the global stage, it cannot rely on past success and become complacent, but must work hard to retain its position over the coming years. As the direct impact of the pandemic subsides, strident, cohesive, clear and visionary leadership will be imperative to reinforce and redefine London's role on the global, national and regional stage.

2. The CAZ has a functioning ecosystem made up of essential industries, users and institutions

The CAZ ecosystem is one of symbiosis and complementarity

The success or otherwise of the CAZ is dependent on a complex ecosystem of interdependent sectors, individuals and institutions, subject to a wide range of drivers and influences. This includes the habits of white-collar organisations and their employees, retail, tourism, accommodation and food, cultural and creative industries, and strategic functions and anchor institutions.

The success of the CAZ in the last decades has been due to the positive evolution of this functioning ecosystem, whereby increased economic activity among offices workers and growing tourism has led to an improvement of the leisure and cultural opportunities, which have, in turn, encouraged more individuals and organisations to work in, or to relocate to central London, forming a relationship that is, generally speaking, symbiotic. This success of the CAZ in London – and its counterparts in other world cities – in becoming a pre-eminent place to work, to visit and to live – is due in no small part to these relationships. Indeed, this agglomeration creates huge exports for the UK which cannot be easily replicated elsewhere in the country.

In Triumph of the City (2011) the Harvard academic Ed Glaeser notes that "whereas the typical nineteenth century city is located in a place where factories have an edge in production, the typical twenty-first century city is more likely to be in a place where workers have an edge in consumption… attractive cities like London entice enterprises and entrepreneurs by their quality of life". Within this, the role of the anchor institutions, such as healthcare, government, justice, higher education and research, have a significant role to play. Less influenced by economic cycles, they provide a permanent presence that can act as assurance to private sector investments, and add a mixed, diverse vibrancy to the offer. There is a risk going forward, if for example healthcare or higher education were to be substantially carried out remotely on a permanent basis, that this part of the CAZ ecosystem could be substantially damaged. The role of reputation is also significant.

These groups do not always benefit one-another. For example, demands from tourism and the night time leisure economy can sometimes put pressure on the quality of life experienced by residents. The high volumes of workers can place significant pressure on the transport network. And the success of the CAZ can mean that high quality housing is unaffordable for most, even in peripheral areas, especially for those that are in non white-collar industries. These have an impact on quality of life and wellbeing.

Over time, developments in each sector can have an influence that make up the CAZ, the interactions between these sectors and functions, and their impact on the overall CAZ ecosystem. Significant changes to component parts, including reductions in white-collar workers, transfer of retail online, closure of leisure facilities, and fewer tourists, can have a profound impact.

In the years before COVID-19 this became more and more important as a result of changing demographics, generational preferences and working practices. Increasingly, businesses were aiming to offer their employees workspaces that were rich in amenities and cultural opportunities and supported social activities and work-life balance, which has been a traditional draw in the high-value tech and digital sectors. A recent study for Arts Council England suggested that cultural opportunities are increasingly important to those in lower skilled roles. There seems to be a 'talent pipeline' in the cultural sector which loops from central London, into the outer boroughs, and back in again. In addition, arts and culture-related activities were reported as an equal priority to schools in family decisions to move to, or remain in an area (Arts Council and Wave Hill, 2019). This virtuous circle has led to London's pre-eminence as the leading world city to visit, live, study and work.

Supply chains of labour, goods and services tie the CAZ to the rest of London, the wider region, the UK, and indeed the rest of the world. These spatial relationships are discussed further in Chapters 5 and 12.

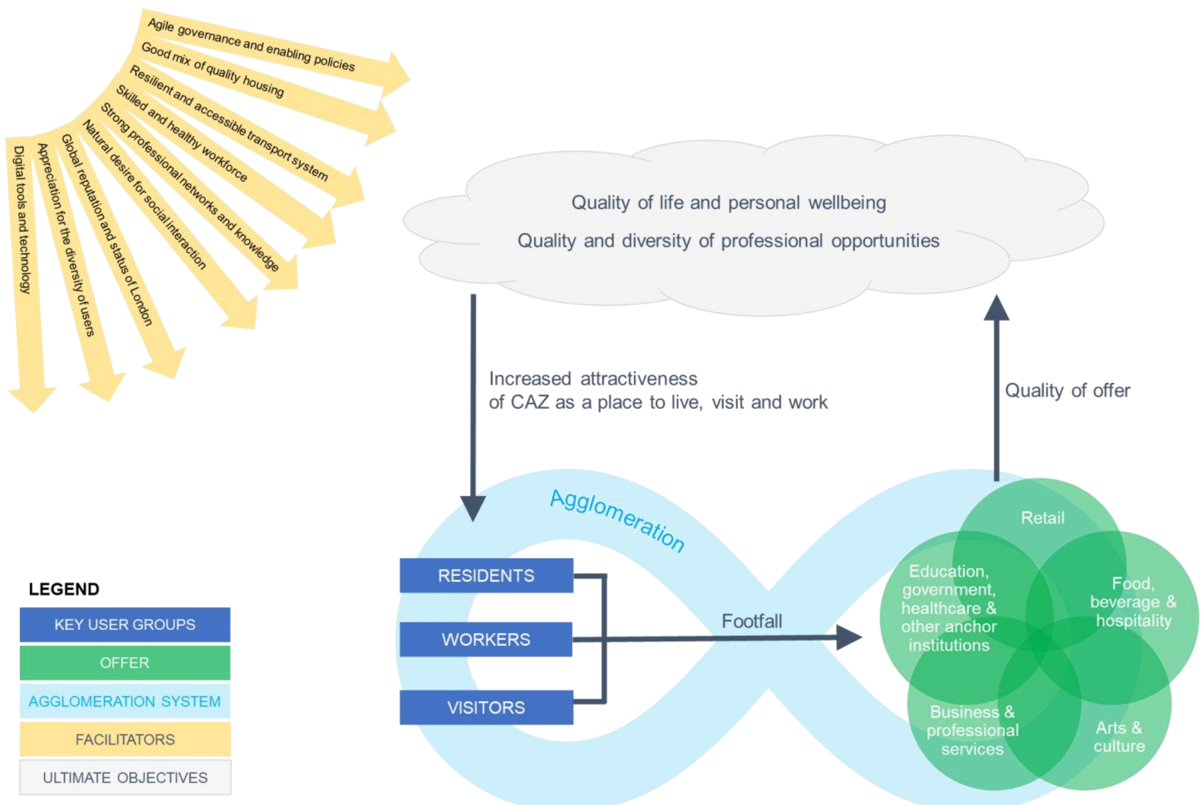
2. The CAZ has a functioning ecosystem made up of essential industries, users and institutions

The CAZ ecosystem, simplified

A simplified CAZ economic ecosystem is based on four core elements:

1. Key user groups (the people who live, work and visit the CAZ).
2. The offer (the functions that take place in the CAZ).
3. Facilitators (other external factors that, when working perfectly, support the successful functioning of the ecosystem).
4. Ultimate Objectives (the reason people are drawn to the CAZ).

The elements come together in an ecosystem driven by footfall from the key user groups, the quality and mix of the offer, an increased attractiveness of the CAZ for people to be drawn towards to live, visit and work, and the system of agglomeration. The latter driver is critical; it is the notion that the presence and proximity of this rich mix of users, sectors and offers coalesce to create innovation, develop professional networks and support economic growth (see Chapter 10). The spill-over from the different elements of the knowledge economy is key to the quality and diversity of professional opportunities.



An illustration showing the simplified CAZ economic ecosystem

2. The CAZ has a functioning ecosystem made up of essential industries, users and institutions

London is a cultural melting pot, and is famous for its diverse and ever-changing leisure offer

The city's creative economy now employs one in six Londoners and contributed £58.4 billion to the economy in 2018 (ONS, 2020k). A report by the Centre for Economics and Business Research (Cebr) for the Arts Council revealed that of the £13.5 billion of direct GVA contribution to national GDP from the arts and culture industry, about 40% was generated in London (2020). This equates to 67,000 full-time equivalent (FTE) employees, 1.5% of London's employment (ibid). Our findings suggest that some 26,000 in the arts and culture industry work within the CAZ itself.

Nationally the creative industries sectors is out-growing the national economy, growing more than five times faster (Department for Digital, Culture, Media & Sport, 2020). Advertising and marketing are two key drivers for this growth, as well as tech, film and television industries. Employment in creative industries is also growing at a substantial rate with jobs increasing by 34.5% between 2011 and 2019, significantly above the UK average of 11.4% (Creative Industries Council, 2020).

The economic impacts from the arts and culture industry expand way beyond its immediate industry. It indirectly supports demand through supply chain purchases and through the wider spending of employees (Cebr, 2020).

London's overarching cultural brand is forward-looking and not just focussed on well-known institutes but more underground art forms. The culture of London, and its creative and entertainment sectors provide the city with its intangible energy. London's cultural and creative offer is a magnet for international and domestic visitors, who also contribute to a great amount of spending. The CAZ itself is also able to provide the density of employment, visitors and residents to support this vibrancy.

The economic ecosystem of the CAZ relies on the interactions between all these different sectors to create an exciting and fun environment to work and live in. There is a risk that if any part of this ecosystem fails, that the rest will follow. Before the pandemic, there were already risks to many smaller cultural and artistic enterprises operating in the CAZ caused by rising rents and reduced public funding meaning many businesses and venues were being forced to leave the city centre, and locate in the CAZ fringe, or even further afield (GLA, 2018).

The arts thrive in economically prosperous times. With the potential for renewed austerity measures caused by the current economic crisis caused by the pandemic, it is possible that any current funding from the public sector will be diverted to essential social care, and art and culture organisations in the city could suffer as a result. The Art Council's desire to de-centralise its activities away from London could also cost these organisations.

The CAZ is facing an uncertain future, but creative and innovative solutions will undoubtedly support its recovery. Given the contribution that arts and culture make to the CAZ, they cannot be overlooked; any erosion of this sector would be to the detriment of the rest of the ecosystem. A joined-up recovery strategy must protect and support the culture, arts and other creative sectors, who in turn can bring fresh thinking to the table to ensure the new model is better than the last.

26,000

The number of people employed in arts and culture in the CAZ

£58.4bn

The GVA contribution of London cultural industries to the economy in 2018

Sources: ONS (2020k); Arup (2020a)

London's night-time economy

The impact of COVID-19

The intention of successive lockdowns to significantly reduce socialising and human interaction have proved largely successful. Although some of those in the hospitality industry have been able to open sporadically, nightclubs are almost the only section of the economy to have remained closed since March 2020. Any social distancing legacy from COVID-19 risks impacting patronage across the night-time economy after the pandemic has passed.

Central London has always been known for its vibrant night-time economy (NTE); as well as enhancing the capital's reputation for culture and fun, it also makes up a significant proportion of the economy. Indeed the CAZ has the biggest night time economy in the UK, if not Europe. Between 6pm and 6am London's NTE supports one in eight jobs in the city in sectors including hospitality, food and beverage (F&B), entertainment and leisure, essential services and healthcare, and business support services, and in 2014 was estimates to contribute £26.3bn to the GVA of the country, a sum which would have risen in recent years (London First, 2018). Therefore, ensuring the resilience of the NTE to shocks is imperative not only for UK plc, but for the many thousands who rely on it for employment.

Culture, art and entertainment have historically been synonymous with London's West End, with globally recognised hotspots around the CAZ including Soho, Mayfair, the City, Covent Garden, the theatre district, the South Bank, and more recently Shoreditch, Vauxhall, and Borough. There are also key night-time districts on the CAZ-fringe, including Camden Town, Brixton, and Clapham. Around 11,000 pubs, bars, restaurants and nightclubs employ over 200,000 people, annually contributing around £5 billion to the city's economy (GLA, 2018). These sectors are reliant on footfall from office workers, and visitors; every 100 office workers support 18 hospitality jobs (TfL, 2020b). The importance of the NTE to the capital was further highlighted by the appointment of the city's first Night Czar by the Mayor of London.

A major challenge highlighted before the pandemic was the pricing-out of smaller music and entertainment venues and independently run pubs and restaurants, risking the degradation of the rich cultural fabric and attraction of the city.

The changes to the Use Classes Order in September 2020 could also have an impact on London's NTE. The inclusion of cafes and restaurants (formerly A3) within the new E Use Class (which contains a broader range of employment uses including offices), means it is now possible for cafes and restaurants to change to another use within the E Use Class without the need for planning permission. However, other NTE uses have been designated as *sui generis* including pubs, drinking establishments (formerly A4), takeaways (formerly A5) and cinemas, concert halls etc. (formerly D2). This means that changes of use from these uses can continue to be managed through development plan policy.

March 2020

The date since which London's nightclubs have been closed

200,000

The number of people employed in London's pubs, bars, restaurants and nightclubs

Source: GLA (2018)

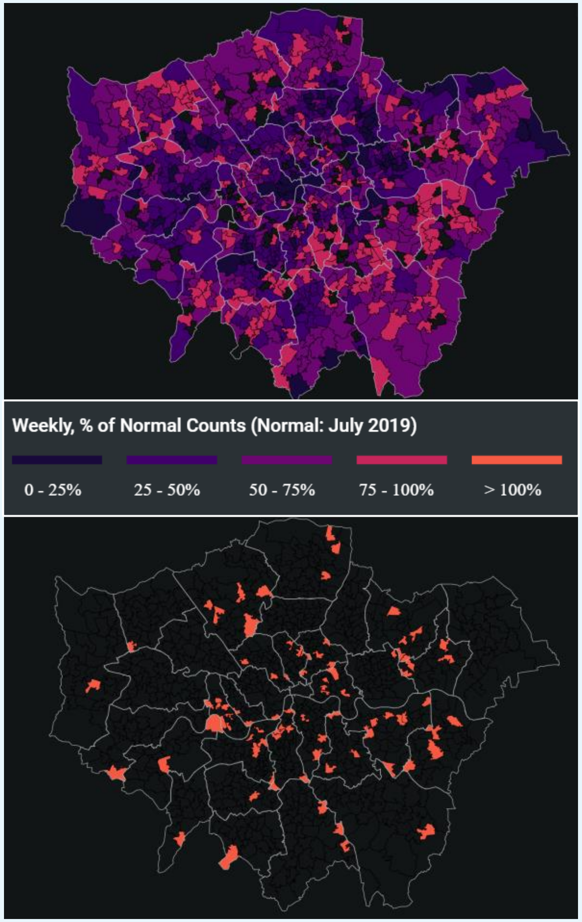
London's night-time economy

The Night Czar seeks to protect and enhance the cultural and entertainment offer in London, and also ensures those who work at night are not forgotten. According to a report by the London Night Time Commission (2019) of the 1.6 million people who work at night, the majority work in healthcare (191,000), professional services (178,000) or culture and leisure industry (168,000). These workers are predominantly male (68%; compared to 55% of all employment) and three in ten are BAME. After the 2008 recession, London's night time economy fared well compared to other global cities such as New York, with over 100,000 new night-time jobs being created between 2004 and 2016 (GLA, 2018), enabled by societal changes, more flexible working patterns, growing tourism, and policy-driven improvements to public transport such as the night tube.

Even during the summer period of 2020 with eased restrictions, the night-time traffic volumes – as an indicator of activity - in central London during the week were well below 2019 levels (TfL, 2020a). In September, demand on London buses during weekday evenings had recovered to 57% of pre-pandemic demand and on London Underground, weekday evening demand was 35% of pre-pandemic levels (ibid.). The significant loss in evening and night time footfall has been caused by employees working from home that are no longer socialising after work in the CAZ, and also by the loss of visitors, both domestic and foreign.

The Night Time Industries Association (NTIA) estimated that around £940 million in lost restaurant takings will stem from London, representing 25% of the nationwide total (NTIA, 2020). The residents of the CAZ, even when lockdowns have been lifted, are not numerous enough to recover the loss of footfall and patronage from commuters and visitors.

Some areas of inner and outer London have appeared to benefit, at least in terms of footfall, from the lack of activity in the CAZ. Those areas which saw a gain in visitors (over 100% of normal activity) can be seen on the lower map. None of them are in the CAZ, though some are on its fringes. The CAZ saw far fewer visitors during the weekday evening in this week in October 2020, compared to those areas marked in pink, which saw a maximum 25% loss in visitors in the same week.



(Right) Night time weekday visitor counts as a % of 'normal' activity, for week commencing 19th October 2020 (Source: O2 and GLA 2020c; night time defined as 6pm to 11pm; 'normal' baseline is July 2019)

London's night-time economy

Looking ahead

A scenario that leads to a lower number of office workers in central London will have an inevitable impact on the night-time economy. This risk will be further entrenched by a lack of international and domestic visitors to the CAZ. This could mean that there will be increasing closures of night-time venues in the city. An alleviation of business rates, and furlough scheme options may help some to stay open, but those based in areas dominated by hotels and offices may still suffer. There may be a resurgence of Londoners visiting the CAZ as the year goes on, the vaccine is rolled out, restrictions lift, spring and summer arrives, and people return to work, and latent demand is realised, but it is hard to know if this trend will be sustained beyond an immediate period.

Meanwhile, it is likely those who continue to work from home, will similarly frequent local dining and leisure options instead of travelling into the CAZ after work, providing a boost to local high streets, possibly to the detriment of the city centre.

In the medium term, a number of demand-side factors, including the level of return-to-office, disposable incomes and interest rates, travel costs and unemployment levels, will impact positively on the recovery of the NTE. Supply side factors which will determine the bounce-back include licensing hours, survival of smaller businesses and venues, supply chain disruptions caused by Brexit, and ability for restaurants and pubs to provide outdoor space. However, this is at risk from further restrictions. Support from landowners and Local Authorities to help NTE businesses might include enabling them to safely institute outdoor dining and drinking, or providing leases based on turnover.

As people return to the office, it is possible that hours will be more flexible than they were pre-pandemic, and people may choose to travel at different times, stretching the evening economy later. As business travel, and tourism begins to pick up in the next 2-6 years, this will further increase footfall in the centre of the city in the evenings, supporting a recovery of the NTE.

In the longer-term, against a background of further economic and societal change, it is inevitable the that NTE of the CAZ, and indeed the rest of London, will need to innovate in order to remain vibrant and viable. The use of outdoor spaces, streetscapes, under-used spaces, vacant shops and pop-ups could be explored to tempt users back to the city, and help new businesses get off the ground. Key institutions and public spaces such as parks, cultural organisations, and libraries, and essential services such as post offices, doctors and opticians should also be brought into the NTE. This will allow those working more variable hours to access services and entertainment for longer periods of the day, and encourage greater footfall in mixed high streets. Such a shift will require new strategies, and strong partnerships between public and private sectors, including the GLA, Local Authorities, major employers, anchor institutions and BIDs.

3. The CAZ ecosystem thrives on its diversity of users

Unsplash: Dmitrij Paskevic

3. The CAZ ecosystem thrives on its diversity of users

The diversity of the CAZ is key to London's economic and cultural success

Themes of diversity and cultural integration are used as criteria in the Global Cities Index (2020), Global City Lab (2020), the Global City Power Index (2020) and The World's Best Cities (2020), all of which rank London within their top bracket overall. The diversity and inclusion of its residents and workers is therefore key to London's reputation internationally.

London has the highest concentration of minority ethnic led businesses in the UK (BEIS, 2019). Within the CAZ, access to a wide range of workers, with different skills, viewpoints and backgrounds is a driving force behind corporate success. The CAZ recruits from all over the world, and the mix of nations, races, and other demographic factors in central London, give it a diverse "feel" that is unrivalled anywhere.

London's more diverse companies are more successful

More ethnically and gender-diverse companies are more successful (McKinsey & Company, 2015; Nathan & Lee, 2013). And diversity is key to innovation and new ideas. Immigrants are more likely to be entrepreneurs, and more likely to be successful at it: almost half of the UK's fastest growing businesses has at least one foreign-born founder (Forbes, 2019). Taking London's fintech sector alone, analysis suggests its runaway success in recent years is due to its culturally diverse founding teams, with two-thirds of directors born overseas. Fintech businesses with boards dominated by foreign nationals were more successful in scaling-up, and attracted four times as much start-up funding as those with UK-only directors (Pivigo, 2017). Similarly, minority-led businesses are better able to export and import from the UK, often making use of networks and language from their country of origin (GLA, 2017b).

The importance of international workers

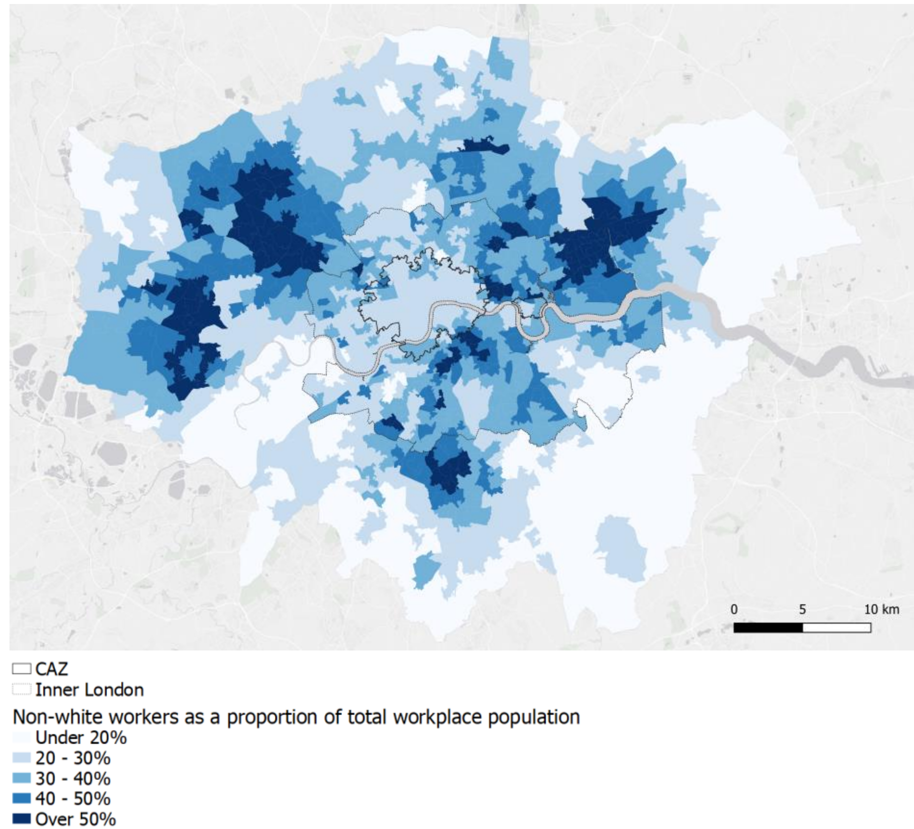
Between 2009-2017 London's labour force increased by 19%, almost all of which was international migrants. These migrants are disproportionately likely to be working in many of the capital's lower wage hospitality sectors. Taken together, Brexit and COVID-19 are threats to the continued flow of these workers into London; whilst estimates for London's migrant working population are rough, but one recent estimate suggests that London's migrant workforce has fallen by 700,000 people during the pandemic (O'Connor and Portes, 2021). This number contributes to London's highly educated workforce and ensures employers have a great selection pool of educated candidates, contributing to its high productivity (Centre for London, 2020c). Since 2016, there has been a decreasing growth rate of EU migration, as well as some outflow of EU nationals, although such recent trends must be interpreted with caution (Centre for London, 2020c). Brexit will undoubtedly further influence the migration trends from the EU through decreasing EU nationals' preference of working in London, through the change in residency rights after December 2020, as well as through employers moving parts of their operations abroad, although London's central population estimates (see p.102) assume similar, if slightly lower rates of international migration to previously.

International workers are also important for tourism, as 24% of all visits to London are for visiting friends or relatives. These visitors contribute to 18% of all international tourist spend (ONS, 2019b), and may be the first tourists travelling to London after COVID-19.

3. The CAZ ecosystem thrives on its diversity of users

Workforce ethnicity in the CAZ

The CAZ's workforce is more ethnically diverse than many areas of outer south and east London, and is broadly in line with the London average, but less diverse than the CAZ resident population (the rate would be higher were it not for the volume of commuters accessing the CAZ from less diverse areas of the UK).



Non-white workers as a proportion of total workplace population (Source: ONS, Census, 2011, Ethnic group, Workplace population)

3. The CAZ ecosystem thrives on its diversity of users

Challenges within the CAZ workforce

The CAZ's role as a focus for diversity

The CAZ also has an important role to play in terms of cultural diversity. London's 52 LGBTQ+ night venues are overwhelmingly concentrated in the CAZ. The diversity of backgrounds of one characteristic can also create a welcoming climate for the celebration of other forms of diversity, and for protest, and as such, the CAZ has been the centre of London's Women's Marches, Pride, and the Black Lives Matter protests.

Diversity and human networks

The CAZ's diversity is both an asset and an area for improvement. The high cost of living and doing business in the CAZ, together with the established human networks, can be a barrier to harnessing the benefits of diversity. Breaking into established human networks in the arts and culture sector, for example, can be more difficult for black and ethnic minority backgrounds, women, and deaf and disabled people (GLA, 2018).

Polarisation of the labour market and the gig economy

The number of absolute numbers of people from diverse and underprivileged backgrounds who work in the CAZ is significant. A lot of people from London's most disadvantaged communities depend on jobs in the CAZ which will be at risk if it fails.

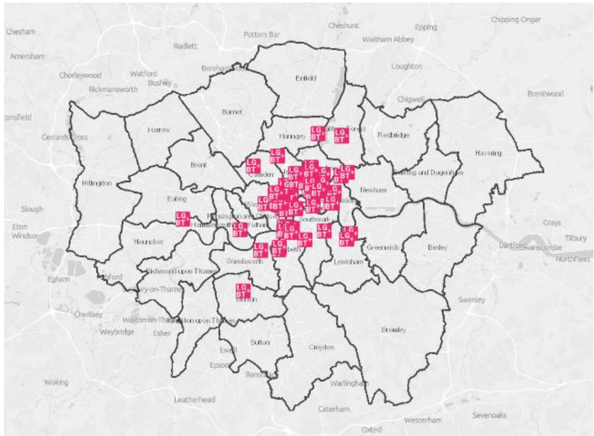
As well as being diverse, London's labour market is somewhat characterised by inequality. According to the think-tank Resolution Foundation, since 1990, the total income of the working age population has grown by a quarter, while incomes of the top 1% have increased by 133% (Clarke, 2018). In some senses, the existence of two somewhat separate labour markets in London (broadly speaking, white-collar and non white-collar in the tradeable and non-tradeable sectors) can be seen as a positive. London's thriving financial sector, for example, creates demand in restaurants, hospitality and so on. And a supply of workers of diverse skills sets and income expectations is essential to meeting demand for labour from employers. Historically, London has provided ample demand from affluent workers to grow the economy more broadly.

However, inequality has increased in the last generation (ONS, 2020c) and COVID-19 risks increasing it further. London has the largest gig economy sector of any part of the UK according to estimates from the Royal Society of Arts (RSA) (Balaram et al., 2017): 27% of the UK's gig economy workers are in London.

Increased polarisation also risks impacting upon social cohesion and the wider aims of equity. COVID-19 appears to have affected London's low paid workers more than others (Trust for London, 2020), and as such, risks making London more unequal. The Mayor of London has introduced policies aimed at countering inequality, such as the London Living Wage, and there is an opportunity for the Mayor and central government to build on these as we emerge from COVID-19, to mitigate further inequality.

London is home to **27%** of the UK's gig economy workers

Source: Balaram et al (2017)



London's LGBTQ+ night venues (Source: GLA, Cultural Infrastructure Map, 2021a)

3. The CAZ ecosystem thrives on its diversity of users

Gender workplace diversity post-COVID-19

The CAZ currently has a higher proportion of males in workforce than many other areas of the capital, and a legacy of home working, post pandemic, creates both opportunities and threats in this regard. Flexible working has previously been shown to be good for workforce diversity, and it will give CAZ employers reach over a more geographically diverse area (including, potentially, overseas, see Chapter 10).

Nevertheless, some groups appear to be more likely to wish to work from home, (see Chapter 8). Women are less likely to want to return to the office full time than men, and older employees are less likely to return more often than younger ones (YouGov, 2020; Hassell, 2020).

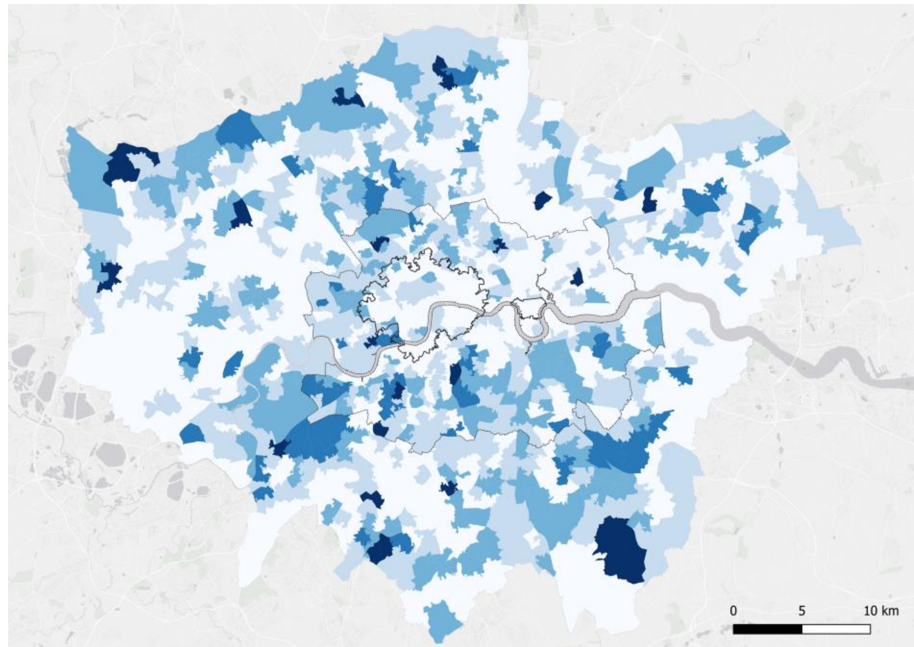
If employees follow through on their stated preferences for home and office based work, post-pandemic, women and older employees are expected to visit CAZ workplaces even less often than previously. Traditional routes to promotion, including presenteeism and in-person meetings, will need to be carefully controlled for in a hybrid working environment, in order to encourage and maintain diversity at all levels. There is a need for employers to ensure that the diverse talents of CAZ employees are harnessed inclusively, and that presenteeism does not automatically lead to action that could further widen the gender pay gap.

The CAZ ecosystem thrives on diversity in the workplace, and outside of it. As such, the risk of a reduction in diversity creates an overall threat to the CAZ ecosystem, and the attractiveness of London as a place to work and do business.

18% of men say they would prefer never to work from home once the COVID-19 crisis is over, versus

14% of women

Source: YouGov Londoners working from home survey (2020)



CAZ
Inner London
Women workers as a proportion of total workforce population
Under 45%
45 - 50%
50 - 55%
55 - 60%
Over 60%

Women as a proportion of total workplace population (Source: ONS, Census. 2011, Sex by single year of age, Workplace population)

4. Entertainment and emerging office-based industries were growing fast before COVID-19

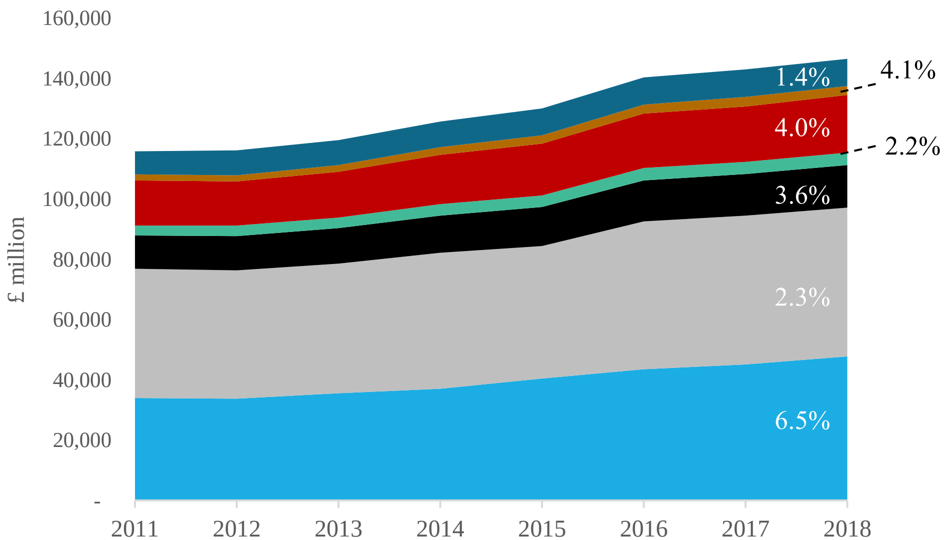
Unsplash: Ousa Chea

4. Entertainment and emerging office-based industries were growing fast before COVID-19

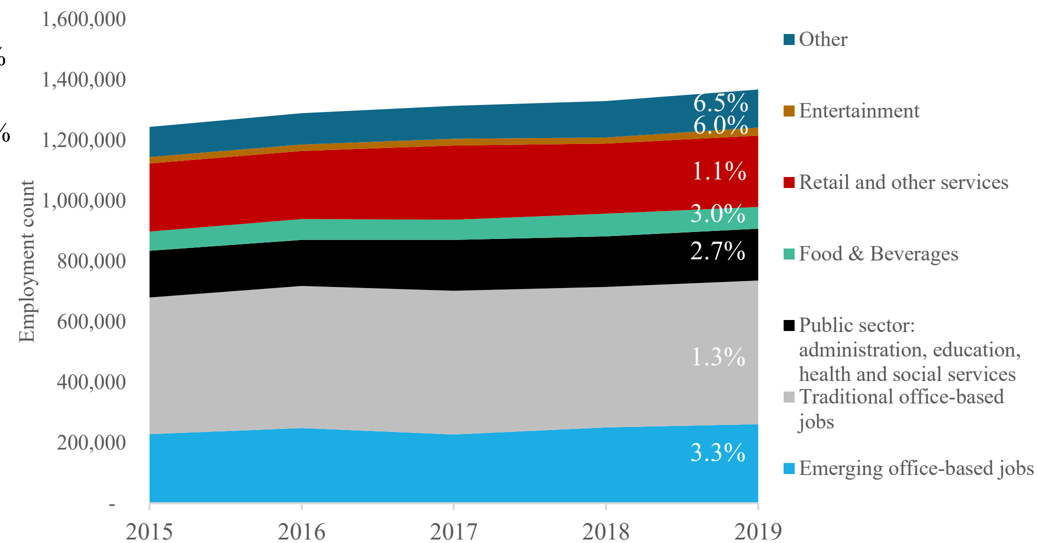
Life sciences and tech have been outpacing the growth of more traditionally dominant sectors such as financial services

In recent years we have seen non-traditional sectors, notably the scientific research and development, green economy, fintech, and digital tech sectors experience significant growth, which have often attracted significant FDI. This has partly been driven by spatial policy, and London's ability to create R&D spaces and lab-enabled offices, as well as strategic neighbourhoods such as the Knowledge Quarter around King's Cross. Alongside these, the CAZ remains renowned as one of the global hubs for traditional office-based type sectors such as financial services, real estate, and head offices and consultancy.

The single largest driver for GVA growth in the last decade has been these non-traditional emerging office-based sectors, which now rivals traditional office based employment as the largest component of the CAZ economy. Retail, public sector and more traditional office-based sectors have also grown substantially. If we drill down further, beyond these classifications, the less well-paid sectors of construction, and postal and courier activities (included in the charts below as 'Other'), which together with growth in similarly less well-paid industries, meant that employment growth outstripped GVA growth over the same period.



CAZ GVA Contribution by Sector (£m, 2020 real prices) and 5-year annual growth rate (% per annum) (Source: ONS, 2020j)



CAZ Employment Size by Sector and 5-year annual growth rate (% per annum) (Source: ONS, BRES, 2015 - 2019)

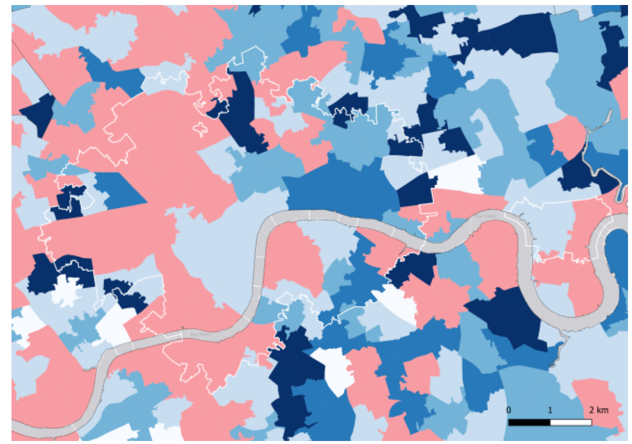
4. Entertainment and emerging office-based industries were growing fast before COVID-19

These emerging sectors are more dominant in the east of the CAZ

Between 2014 and 2018, GVA contribution of the emerging office-based sectors have seen an average growth of 6.5% per annum and employment growth of 3.3% per annum. In contrast, employment growth for both the traditional office-based sectors, as well as retail and other services, have been comparatively lower.

Emerging office-based employment has been shifting from the west to the east of the CAZ in the last 5 years, increasing in the City and the East and Riparian South sub-areas, and declining in the West End. In Canary Wharf, previously well-known for it's dominance in the financial and professional services sectors, has seen other industries including 'public sector, regulatory, education and charities', 'technology, media, and telecoms' and 'business services' emerge in the past decade (FT, 2021a). The CAZ fringe – in areas such as Kensington, Shoreditch, Brixton and Bermondsey – has seen over 75% growth in these employment types over the past 5 years, whilst growth remained buoyant in and around Old Street, known sometimes as 'Silicon Roundabout'.

The emerging sectors are likely to sustain this comparatively higher growth, particularly as knowledge-intensive sectors such as life sciences and digital tech continue to capitalise on the London's mass of renowned universities, research institutions and wide pool of talent. In the first half of 2020 (H1), media & tech occupier take-up totalled to 631,000 sq ft (mainly concentrated in the City and King's Cross), becoming one of the most active subsectors in the office market, only falling behind law firms as the top active subsector in H1 2020 (700,000 sq ft sub-let) (Gerald Eve, 2020a). With the arrival of tech giants such as Amazon, Google and Facebook in central London, this in turn will continue to attract smaller start-ups and scale-ups to propel this industry growth still further.



5-year growth in emerging office-based employment (2015 - 2019)
Decline in emerging office-based employment
No growth
Between 0 and 25% growth
Between 25 and 50% growth
Between 50 and 75% growth
Over 75% growth

5-year growth in emerging office-based employment (ONS, BRES, 2015 – 2019)

4. Entertainment and emerging office-based industries were growing fast before COVID-19

Changing consumer tastes

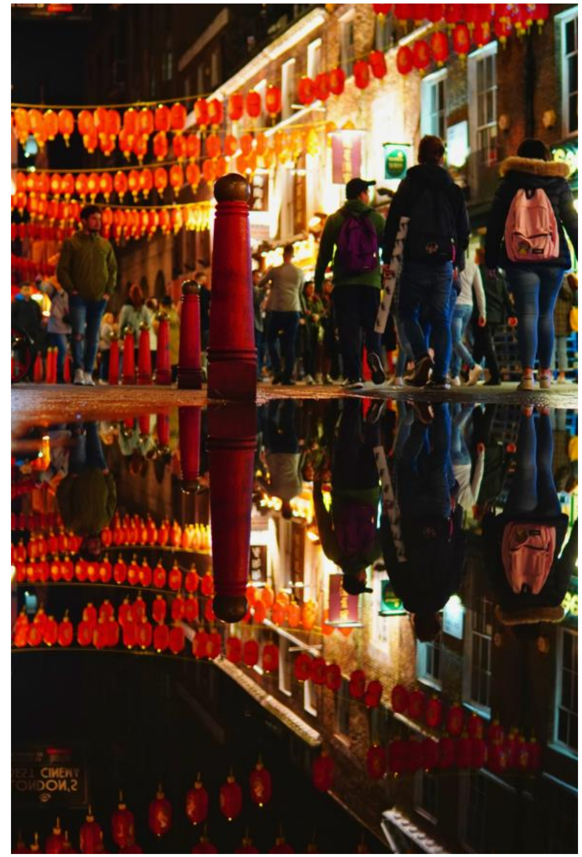
Although retail remains hugely important, for many years London has been moving gradually away from being a market (for shopping) to being a playground (for conspicuous consumption at events, bars, restaurants, and theatres). The experience economy (Gilmore and Pine, 1998) is giving way to the transformation economy, where memorability and time well spent will be key. Nationwide, recreation and culture were the largest drivers in the increase in household spending between 2012 and 2019 (ONS, 2020g), is now almost the single largest category of household expenditure, and is particularly important to Londoners (London and Partners, 2020a and 2020b). To attract people to a playground suggests more emphasis on quality of place, including the public realm.

London's rivals, especially Paris, have begun to take significant action in this space. The recently announced Champs-Elysees regeneration, for example, will include more space for pedestrians, cyclists, cafes, sports, playgrounds and "outdoor living rooms".

16%

Increase in real household recreation and culture spending between 2012 and 2019, the fastest growing category.

Source: ONS (2020g)



Unsplash: Matus Karahuta

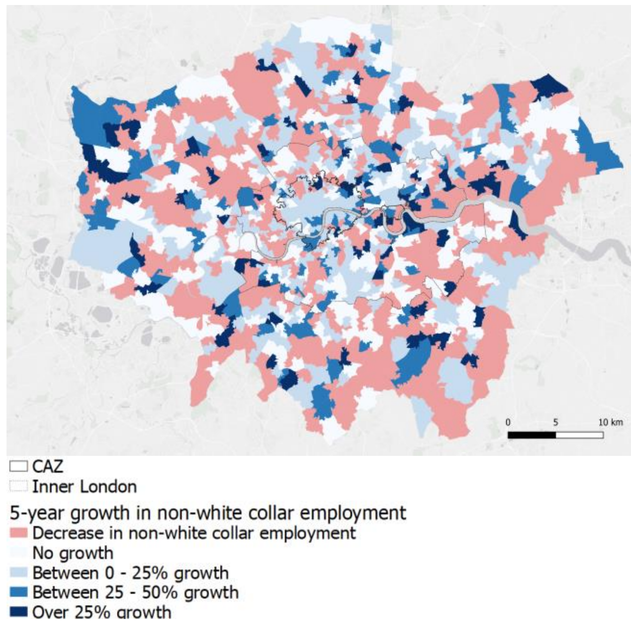
4. Entertainment and emerging office-based industries were growing fast before COVID-19

Hospitality and retail have driven non white-collar job growth in the CAZ

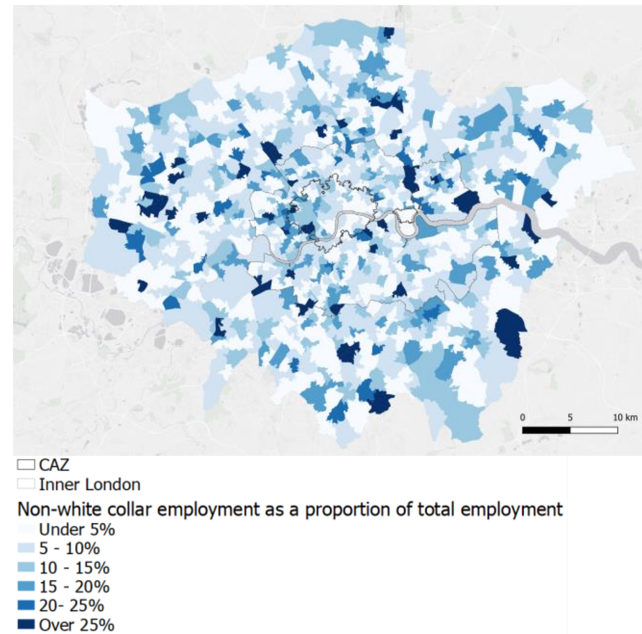
Retail, food and beverage, and hospitality sectors have grown substantially in the last few years, reflecting an increase in demand for leisure for workers, and increased tourism and visitor numbers. The result has been a growth in non white-collar jobs density across the CAZ that has outstripped the rest of London. As such, despite its reputation as a place for office workers, the CAZ is probably the best place to build a non white-collar career in the UK.

The macro-level pre-COVID-19 trend for increased leisure spend gives hope to a robust recovery. Indeed, at the UK level, increases in food and beverage and hospitality jobs has more than made up for decreases in retail jobs. The hospitality sector is, of course, ultimately dependent on both tourism and workers, and with reductions in visitors, international arrivals and office workers, these in-person sectors of the economy are at risk.

Despite the CAZ not having a high density of these non white-collar jobs, this employment type has increased more significantly in the CAZ than in the rest of London, with very few areas inside the CAZ seeing negative growth.



5-year growth in non white-collar employment Retail, Accommodation and Food Services taken as a proxy for non white-collar jobs (Source: ONS, BRES, 2015 – 2019)



Non white-collar jobs as a proportion of total employment by MSOA (% of total employment) Retail, Accommodation and Food Services taken as a proxy for non white collar jobs (Source: ONS, BRES, 2019)

Retail (and other services)
£19.1 billion GVA (13.1% of total CAZ GVA)

Food & Beverages
£4.1 billion GVA (2.8% of total CAZ GVA)

Entertainment
£3.0 billion GVA (2.0% of total CAZ GVA)

CAZ GVA contribution for selected sectors, 2018 (real 2020 prices) (Source: ONS, 2020j)

5. The CAZ is UK's global city centre

Matt Dillon

5. The CAZ is UK's global city centre

The CAZ is the UK's global city centre, and is dependent on the rest of the country for flows of people and goods

The CAZ as the UK's global city

The CAZ has a special significance with the rest of the UK. It is what most people from outside of the capital consider to be "London", is a place that almost all Britons will visit frequently, and is the home of the attractions that are symbolic of the nation's largest city, and the nation itself: Big Ben, Tower Bridge, 10 Downing Street, and the London Eye. The size of London goes some way to explain this – with nearly 9 million people, around 1/6 of the British population live in the capital.

The CAZ is thus the UK's (and arguably Europe's) global city centre, containing services and amenities that cannot be found anywhere else in the country, including the seat of government, an abundance of company headquarters, specialist healthcare, world class art galleries, higher education institutions, sports stadia, and theatres. The CAZ serves the rest of the UK as its global business centre, tourist destination, and cultural hub. London is the top business destination, the most visited city in the UK for domestic visitors, and is the gateway for the majority of international visitors to the UK.

As such, the CAZ is a key component of the UK's soft power abroad, its arts and cultural and educational establishments driving the UK's soft power status. The UK has been in the top bracket of the Soft Power 30 Index (Portland Communications, 2015-20) since its creation in 2015, taking the first or the second position each year.

Culture and Education are the categories where the UK performs most strongly, and the strengths of the country's museums, galleries and theatres are cited directly. People from all over the world feel they know the sights and sounds of the West End, and fully 60% of all UK box office revenues are derived from West End audiences (SOLT, 2019).

A significant contributor to the UK economy

Despite covering only a tiny fraction of its landmass, the CAZ, is home to 4.4% of its jobs, and 7.8% of its Gross Value Added (GVA) (ONS, 2020j). The CAZ is also the birthplace and nursery of many of the UK's companies; domestically, more firms migrate out of London than migrate in. Between 2007 and 2013 a net 11,180 companies (taking 72,670 jobs with them) moved out of the capital to the rest of the UK (GLA, 2016b).

As the UK begins it's road to economic recovery after the pandemic has subsided, it will need London's strength, and fiscal contributions, in order to 'build back better'. The levelling-up agenda is also important to consider. Without the taxes generated in a thriving and prosperous capital, this important and necessary agenda will be far harder to accomplish.

4.4%

Of the UK's jobs are in the CAZ

7.8%

Of the UK's GVA is generated in the CAZ

Source: ONS (2020j)

5. The CAZ is UK's global city centre

The pressures on the CAZ can impact on the rest of the UK

Significant volumes of people and goods

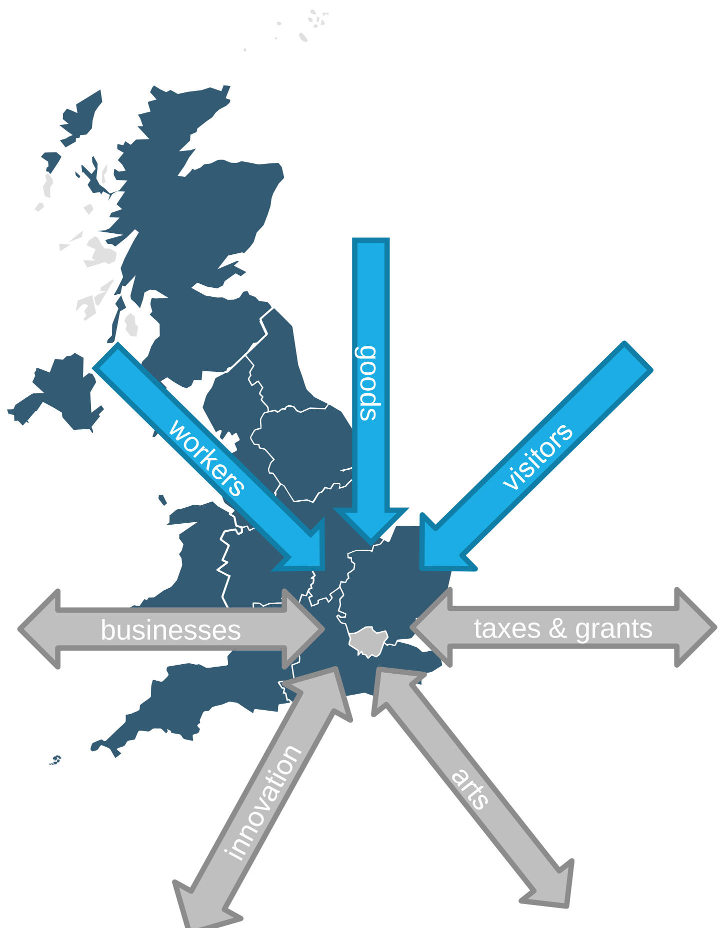
Similarly, the CAZ, and the rest of London, are dependent on the rest of UK for flows of people and of goods. Because of its success, the CAZ has become an increasingly attractive place to work in the last few years. Some 63% of Great Britain's rail journeys started or ended in London in 2018/9 (ORR, 2020), and pre-pandemic around 800,000 commuters travelled into London each day (more than half of the working population in many areas, (GLA, 2019b)), the vast majority of them arriving at the CAZ's terminus stations, with around 270,000 Londoners going the other way, to jobs outside of the capital.

The number of rail travellers to London has nearly doubled in 20 years (ORR, 2020), with the largest growth from the West Midlands, Yorkshire and North West England, suggesting that intercity rail upgrades and electrification programmes have brought the opportunities in the CAZ closer for many, predominately white-collar travellers. This widening out of the CAZ's labour market capture has been a significant driver behind its economic success, and there is an opportunity to capitalise on this further, as HS2 and the Elizabeth Line enter into service, and as longer-distance commutes become more feasible with shorter working weeks.

The freight flows with the rest of the UK are substantial, and there has been a geographic shift in freight flows in the UK in recent years, with the opening of the London Gateway port and consolidation centre, and increasing rail freight volumes in south east England. Despite increased consumption, the number of freight vehicles entering the congestion charge zone and central London cordon has fallen in recent years, due to policies encouraging consolidation and more environmentally friendly last-mile means.

Issues of affordability, congestion and quality of life

Of course, these close economic ties mean that the capital's housing, transport and environmental pressures are well beyond the GLA boundaries. Many of the issues of affordability, congestion and its impact on quality of life are now ubiquitous across London's travel to work area. Indeed, both these problems, and the economic upsides of the CAZ, and London, spill over into the wider south east, and the UK such that the economy, employment, and other key indicators have tended to rise and fall together in the last few years. What is good for the CAZ, and for London, tends to be good for the rest of the UK, and vice versa.



Some of the exchanges between the CAZ and the rest of the UK (Source: Arup, produced for this assignment)

Transport to, from and within the CAZ

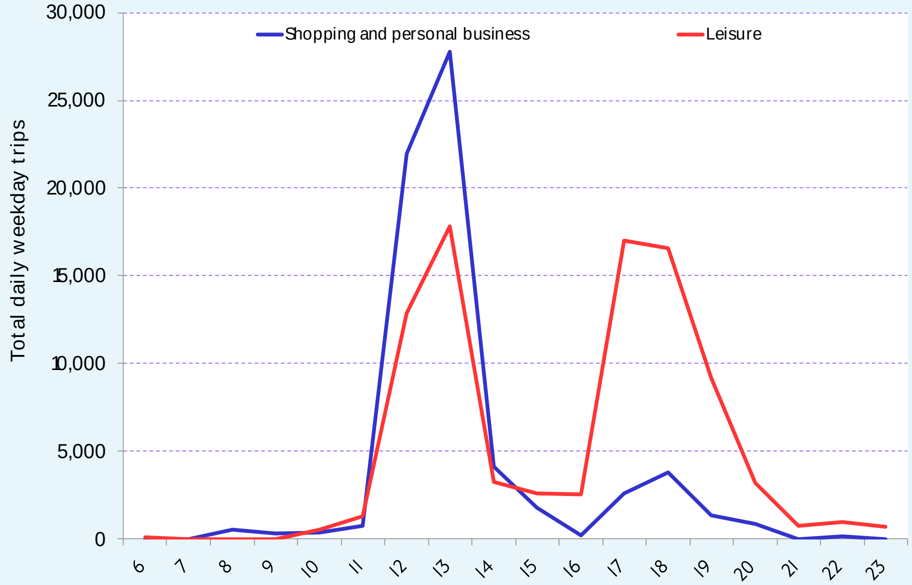
London’s transport system is orientated around the CAZ

The CAZ is at the centre of London’s, the South East’s and the UK’s transport network. As such, a medium to long-term reduction in travel overall caused by the outcomes of COVID-19, will have a disproportionate impact on the CAZ. Demand for travel will also be affected by the service frequencies that are operated in post-pandemic (which in turn will be affected by the finances of the providing authorities, see Arup and London First, 2021). Given its popularity, and the structure of TfL and National Rail fares, the CAZ is also the place that generates much of the passenger revenue. Conversely too, there is a risk to the viability of the wider regional – and potentially national – public transport system if the CAZ doesn’t recover.

Prior to the pandemic, transport demand growth nationwide was slowing, and reducing in places, as more retail and socialising journeys transferred online (DfT, 2019a). Fewer journeys were being made into central London (see p.27). COVID-19 may accelerate this trend towards lower travel overall.

Before this, the number of people entering central London during the morning peak has remained relatively constant since the 1970s at around 1-1.2m people per day, although the mode used has shifted significantly from car to rail and underground, and more recently, cycle (TfL, 2020b). The CAZ is dependent upon discretionary flows of people from inner London and the rest of the UK in particular (see p.112). It is also dependent on workers, predominantly those from inner London, whose commute into the centre combines with shopping and other travel after work.

Many of these workers, if they did not come into work daily in the CAZ, may choose instead to undertake evening leisure opportunities closer to home often in inner or outer London. Others would be expected to “save” up their leisure time to spend it in the CAZ, on the days in which they do come in to work.



Evening leisure trips by purpose (Source: LTDS in TfL, 2020b) Many evening leisure trips are made by those that work in the CAZ. Start time of discretionary trips wholly within central London, made by Londoners commuting into central London on a weekday.

Transport to, from and within the CAZ

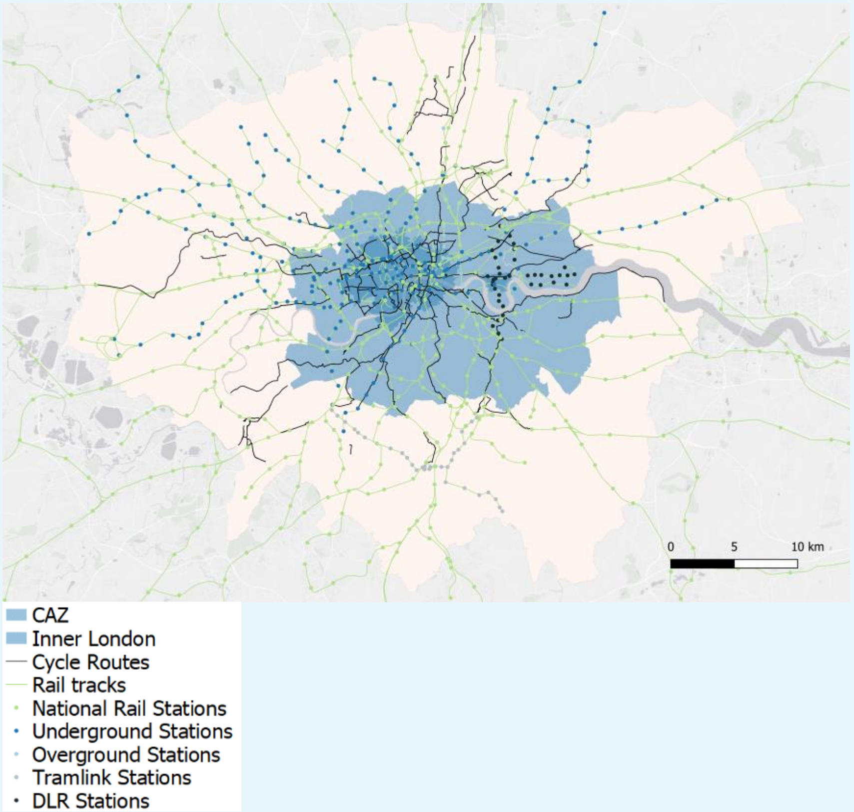
COVID-19 may encourage modal shift towards cycling and other active modes

Fewer white-collar workers will impact differently on different modes of transport. Because of rail and underground's popularity with those in the service industries, these stand to lose out most, and government will have to choose as to whether it wants to make policy interventions to protect and enhance future rail use. Cars and buses are likely to be more robust, as we have seen during the COVID-19 period (DfT, 2021), and if conventions on social distancing remain, overcoming the negative image of busy public transport stigma is a key risk to more people accessing the CAZ, both for work and leisure.

The trends towards less frequent commuting risks a secondary impact on travel to the CAZ, as the reduction in popularity of full-time season tickets will lead to an increase in the marginal cost of travel to the CAZ, especially if they not catered for with new, part-time travel card for TfL and national rail services. Significant improvements are continuing to be made to cycling routes and pedestrian infrastructure to encourage use of active travel modes, which the CAZ is well-placed to benefit from, given its dependency on inner London flows for both work and leisure. These distances are more able to be covered by cycling, or emerging modes such as e-scooters, which begin trials in London in spring 2021.

During COVID-19, there has been a move from cycle commuting to leisure journeys (Tfl, 2020b). Cycle flows are seasonal in nature, and more work is needed to embed these habits among the workforce, on a year-round basis. A continued aversion to 'last mile' journeys by public transport is unfortunate in many ways, but it will help encourage more cycling and walking in the CAZ.

Investing in these modes, and encouraging their use for journeys of a few miles or more, will have benefits not only for air quality, but also mental and physical wellbeing. Nevertheless, the role of active travel in a city with London's geography may only ever be small but significant part of the story, as the chart on p35 suggests, much of the heavy lifting of transport to and from the centre, is done by other modes.



TfL, National Rail and cycle route Network (TfL network incl. underground, overground, DLR, Tramlink and TfL Rail, National Network to 2015)

III. The Impact of COVID-19

6. COVID-19 has been incredibly damaging and requires urgent action

Unsplash: Kevin Grieve

6. COVID-19 has been incredibly damaging and requires urgent action

Central London office workers have been slower to return than UK and international counterparts

The pandemic has hit London, and the CAZ hard

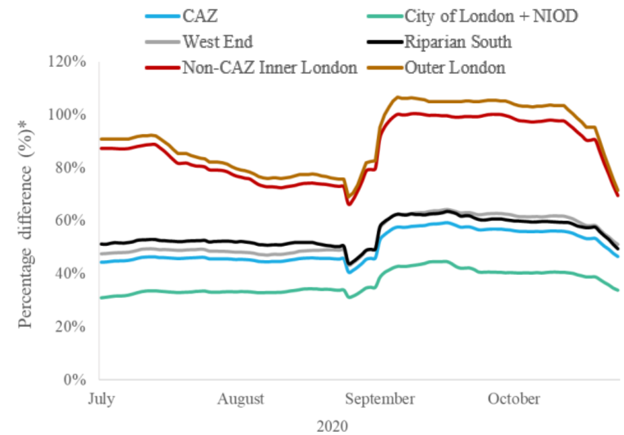
COVID-19 and the associated policy response has hit the CAZ harder than any other area of the UK. Even before the restrictions over the autumn and winter period of 2020, the recovery in footfall from the spring 2020 lockdown was slow. Central London has seen a slower return to work rate in offices than other UK and global cities, which is having a significant impact on the wider economy. Two of the CAZ's great strengths have become weaknesses in the pandemic: a huge agglomeration of people, coupled with a wide labour market captured from widespread public transport use rates.

This has manifested in significant job losses, with a loss of almost a quarter of a million workforce jobs in London between March and the end of 2020. This is the highest fall in the UK, and, it is of further significant concern that the largest falls were in the sectors that are among the most strategically important: professional, scientific and tech, alongside arts, culture and entertainment (GLA, 2020e).

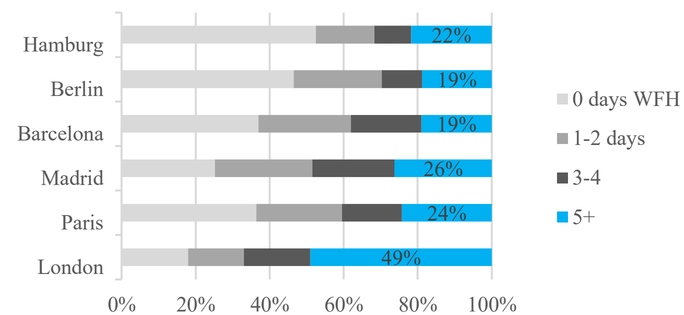
Of course, large sections of the economy are not working remotely. In the second week of January 2021, under lockdown conditions, 50% of adults travelled to work at least once, and 35% worked from home exclusively (ONS, 2021a). Working from home is focussed on white-collar industries, and the CAZ's reliance on those industries, as well as the reliance on hospitality and retail and inbound tourism, partly explains why it been more impacted than elsewhere in the UK. Furlough take-up has been higher in London than any other region in the UK, which has disproportionate negative impact on those on lower wages, intensifying the risk of growing wage inequality (GLA Economics, 2021b).

Furthermore, during the summer of 2020 when restrictions were limited, London workers were less likely to visit the office than other global comparators, suggesting a relative inertia in returning post-pandemic, possibly caused by longer travel distances, and (lack of) incentives to return on behalf of employers. This is explored in more detail on p.80.

The result has been a ring of white-collar home workers in inner London, that substantially corresponds to the home location of CAZ workers, and a drop in footfall in key office districts mainly in the CAZ (see right), some of the economic activity associated with CAZ office workers has been taking place in the rest of London.



Decreases in worker visits have hit the CAZ harder than other locations July 2020 – November 2020 footfall percentage change, 7-day rolling average* (Source: O2 people count 2019-2020 (obtained via Greater London Authority, January 2021)



Rate of return of London office workers (Source: Alphawise, Morgan Stanley, 2020) Office workers in London were much slower to return in July 2020, a period in which COVID-19 restrictions were at a low level across Europe.

6. COVID-19 has been incredibly damaging and requires urgent action

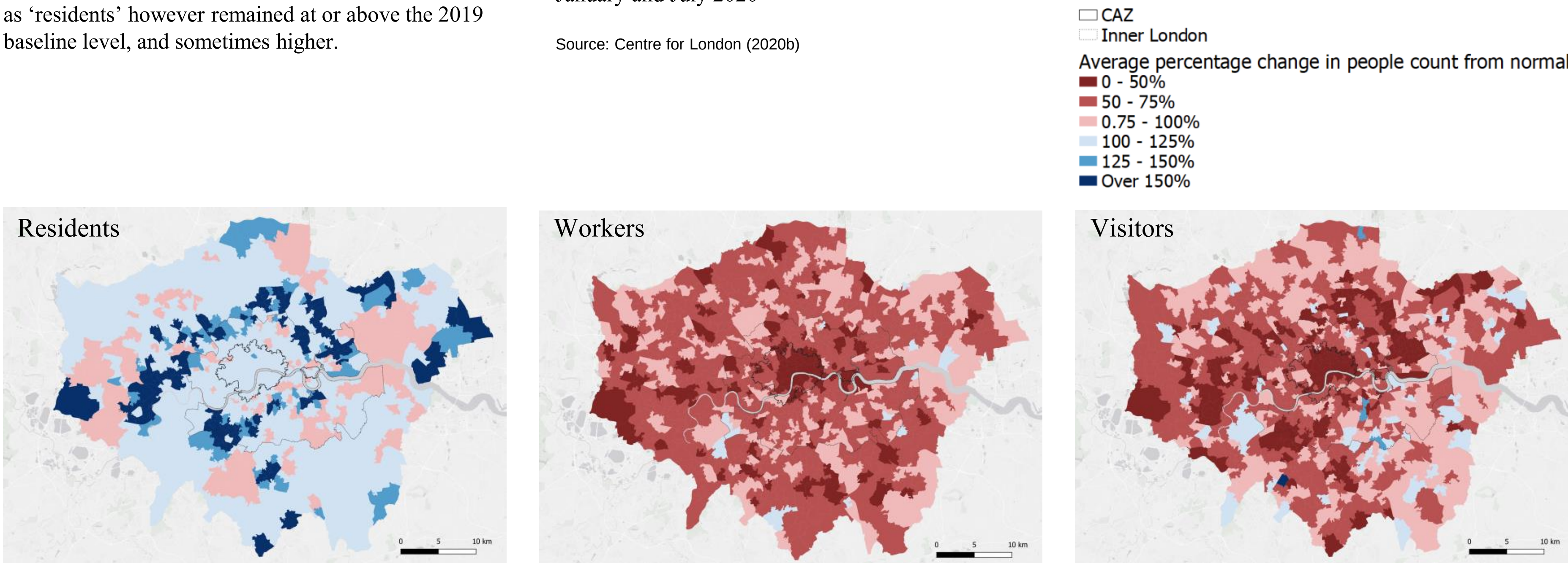
Footfall from visitors fell throughout London, but the CAZ saw the biggest drop

The maps below demonstrate how footfall from workers and visitors to the CAZ fell substantially, by more than 50% in October 2020, when compared to a baseline day in July 2019. Footfall categorised by O2 as 'residents' however remained at or above the 2019 baseline level, and sometimes higher.

- 60%

Fall in central London retail transactions between January and July 2020

Source: Centre for London (2020b)



Average percentage change in residents (left), workers (centre) and visitors (right), 2020 compared to 2019 Based on data from Wednesday 28th October, 2020 (baseline for change based on day of the week and averaged across two weeks in July 2019) (Source: Anonymised and aggregated data, GLA, O2, 2021)

6. COVID-19 has been incredibly damaging and requires urgent action

Footfall from office workers and visitors has a substantial impact on London's arts and culture offer

Impact on arts and culture

The impact of COVID-19 on London's cultural offer has been multi-pronged, spanning the impact on audiences, providers and suppliers, which are likely to display some significant inertia in restarting after the pandemic subsides. This cultural offer is over-represented in the CAZ, with almost one-third of London's cultural economy concentrated in the West End alone (Arup, 2020a). As such, the positive impact of culture on the overall CAZ ecosystem, is at risk. Over the next few years the cultural offer in the city will struggle to sustain its role in the agglomeration economy of the CAZ and its ability to attract individuals and companies to London.

Much of the capital's culture is best experienced in person, through physical gatherings and interactions between audiences and presenters, and within public gatherings. As such, there is an important relationship between footfall, the arts and culture sector and the wider CAZ ecosystem. A 10% improvement in footfall was estimated to lead to an improvement in 2% annual West End GVA (Arup, 2020a). TfL estimated that around 30% of weeknight leisure visitors to the CAZ are those that work there, and that counter-intuitively, the proportion is higher at the weekend (TfL, 2020b).

Beyond the immediate survival phase, the medium-term impacts of COVID-19 risk having a significant toll on the demand for cultural activities:

- The future behaviour of office workers matters significantly. As shown on p.55, the footfall in central London at cultural facilities has shrunk to around half of its pre-COVID-19 level. The cultural economy in the West End is heavily dependent on footfall from office workers, tourists and others, with a 10% improvement in footfall estimated to lead to an improvement in 2% annual West End GVA (Arup, 2020a).
- The arts and culture industry is also heavily reliant on the future tourism demand, with over 40% of theatre bookings being made from outside of London (BOP Consulting, 2016). This is a cycle, with the cultural and art offer being a major attraction for visitors, again supporting tourist demand.
- There is now a risk that many cultural organisations will not survive the pandemic, and therefore will be unable to contribute to the recovery.

The CAZ is also a huge contributor to the cultural supply chain. Many cultural businesses, including theatre companies, fashion houses, orchestras, film and television production, recording studios are based in the CAZ. Whilst some of these businesses have managed to continue some form of operation during the pandemic, they do face medium-term risks:

- Global supply chains and, increasingly, labour markets, are integral to how culture is delivered, and have been severely disrupted, potentially on a permanent basis (for example and anecdotally, overseas actors returning to home locations during the preparation of this report). It is likely that cultural employment lost to London is lost to the UK: much of it is unlikely to happen elsewhere in the country.
- Secondly, culture industries need economic security in which to prosper, to provide sponsorship funding, ticket sales, taxes for government funding, and a sum of part-time jobs that provide secondary sources of income for those that cannot derive enough earnings from their contribution to arts and culture. A less favourable economic outlook (see p.65) therefore means a less flourishing arts scene.
- Thirdly, the challenges over the next few years also include a restructuring of government funding to replace those streams lost as a result of Brexit.
- There is now a risk that many cultural organisations will not survive the negative impact of the pandemic, and therefore will be unable to contribute to the recovery.

It must also be acknowledged however that along with saving the cultural offer, this pandemic might offer a chance for the sector to adapt. After the pandemic, and as the CAZ changes, the cultural offering could and should grow in multiplicity to attract and serve the new audiences in new ways.

6. COVID-19 has been incredibly damaging and requires urgent action

Footfall from office workers and visitors has a substantial impact on London's arts and culture offer

Impact on the CAZ ecosystem

By summer 2020, 63% of staff in London's arts, entertainment, recreation and other services sector had been furloughed (ONS, 2020a), and by December, 28,000 arts culture and recreation workforce jobs had been lost across London (GLA, 2020e). Using data from ONS on proportion of workers on partial or full furlough leave by industry section, we can estimate that at least 130,000 CAZ workers on or full furlough leave in November 2020.

We estimate that around 14,000 enterprises in the CAZ have low or no confidence that they would survive in the next 3 months. Of these, around half are white-collar, with the remainder in non white-collar industries such as retail and in hospitality.

Against this background, Arup (2020a) suggested that even under a return to normality scenario, without government assistance, would see the West End arts and culture sector be 10% smaller in 2024 than in 2019. Under a worst-case scenario, the cultural sector would face virtual wipe out.

A quarter of international tourists to London came specifically for the cultural offer, compared to around one-eighth for the rest of the UK (Visit Britain, cited in Centre for London, 2015). A decreasing cultural offer can negatively impact footfall that would again impact on businesses, and wider hospitality and tourism offerings across London and the CAZ. Likewise, a sustained decrease in international visitors, following COVID-19, in London and the CAZ will impact the quality and quantity of cultural offers across London.

Reduction in arts and culture also risks a knock-on impact to white-collar industries, and the wider CAZ ecosystem. For years, companies and predominantly young, gifted individuals have been relocating to London because of its cultural offer, even though the cost of living is much higher, relative to income levels. The benefits of an active social life are a significant attractor to London, and a modelled removal of the benefits, equivalent to a sustained impact from COVID-19, has a disproportionately large impact on major cities such as London, with smaller cities suffering less (LSE, 2020).

Without cultural industries bouncing back swiftly, the previous symbiotic relationship is now at risk of being replaced by a vicious circle, threatening London's pre-eminence as the leading world city to visit, live, study and work.

-28,000

Loss of arts, culture and recreation workforce jobs across London, March – December 2020, GLA (2020e)

-10%

West End Arts and Culture annual GVA in 2024, compared with 2019, in a "return to normality" scenario

-97%

West End Arts and Culture annual GVA, compared with 2019, in a worst case "repeated lockdowns" scenario

Source: Arup (2020a)

Retail: A structural shift

Retail has been affected by digitalisation, and COVID-19 has accelerated this significantly

In 2019, there were 446,000 retail goods jobs in London (GLA Economics, 2021a). Retail, which includes food, non-food and non-store retailing, is an important part of the CAZ's offer to visitors, to its economy. The CAZ provides a diverse and vibrant retail offer, with major retail centres and a high concentration of shops (GLA, 2016a). Retail is particularly important in the West End, where many retailers flagship stores are to be found, and where retail is the fifth largest employer (Centre for London, 2020b). Unsurprisingly, retail also takes up a large portion of commercial floorspace, at 22%, across London. Despite covering only 2% of its landmass, the CAZ has 16% of London's shops, and retail is a defining feature of the CAZ's strategic functions (GLA Economics, 2021a).

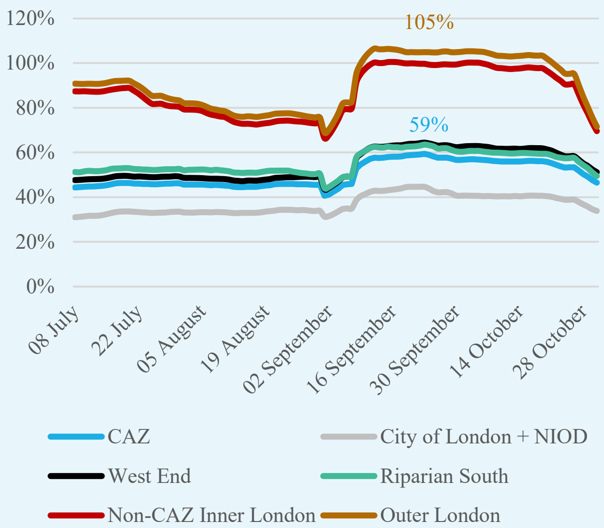
Bucking a nationwide trend, between 2010 and 2018, retail GVA in London grew by 3.7% per year on average and accounted for 4.2% of London's total GVA in 2018 (GLA Economics, 2021a). However, in-person retail was experiencing a decreasing share of London's economy (ibid).

The COVID-19 pandemic, the successive lockdowns, and a lack of surety about future economic prospects has severely impacted the amount of consumer spending. McKinsey & Company's (2020) findings from October show that households have decreased discretionary spend, and have lowered spending intentions across every category except groceries during 2020. The impact of the pandemic on household finances has been polarised; those in lower income brackets have seen their savings decrease, and those in higher income brackets have seen their savings increase – although the majority of savers did not plan to spend their new wealth (Bank of England, 2020).

Against this background of a decrease in overall spend, it is not a surprise to find that the decreased footfall in the CAZ has led to a further significant reduction in spending overall; in October, the CAZ only recovered around 40% of its usual visitor footfall, whereas outer London saw 105% of normal footfall (see chart opposite). Retail spending and footfall outside the CAZ has held up more strongly, but any gain in the rest of London has not been enough to compensate for the decrease in the centre, with most of the spending transferring online, or not taking place at all.

Because of the low resident to business ratio, the CAZ is particularly dependent on non-residents for retail spend. The reduction in office workers, international tourists, the restrictions on opening, and the acceleration of a move to online retail due to COVID-19 have hit retail sales in the CAZ more than many centres across London. International visitors especially have great spending power, and significantly contribute to the CAZ and wider London economy. How quick international tourism recovers will impact big retail centres across London, including Knightsbridge and the West End.

While the volume of transactions had begun to recover across London, central London was still down by 60% in July compared to January 2020 (Centre for London, 2020b). Additionally, in the recovery of footfall and spending London comes out poorly compared to other UK cities (WPI Economics, 2020), and compared with out-of-town centres.



Deceases in retail and recreation visits have hit the CAZ harder than other locations July 2020 – November 2020 footfall percentage change, 7-day rolling average* (Source: O2 people count 2019-2020 (via GLA, January 2021))

Retail: A structural shift

Retail has been affected by digitalisation, and COVID-19 has accelerated this significantly

Sectors across London have been affected differently during COVID-19. Clothing sales were down by almost one-quarter from February (WPI Economics, 2020), while food and non-store retail recovered fairly quickly, each being 7% and 42% higher in November than in February 2020 (ONS, 2020h).

However, footfall in the CAZ remains significantly down. Research undertaken by London & Partners during 2020 also shows that people still feel less comfortable shopping and that 23% prefer online shopping (London & Partners, 2020a and 2020b). Whilst the crowds on Oxford Street before Christmas may offer some hopes of a latent demand from Londoners, it is likely that habits formed during the pandemic may be embedded.

Longer-term pressures on retail

In-person retail has experienced challenges related to the increase of multi-channel retailing, online and 'click and collect' shopping (GLA, 2016a). COVID-19 has contributed to this, incentivising more people to use online platforms to buy essential and non-essential goods. The rise of online shopping has increased significantly in recent years and has been accelerated by COVID-19. Between 2008 and 2018, online shopping grew by 125% and accounted for more than 19% of all sales in 2019 (GLA Economics, 2021a). Since 2015, the space devoted for retail has shrunk, with the CAZ having experienced a greater decline than the London average. Since the pandemic, online retail has broadly doubled, and whilst we might expect a partial reversal out of that during 2021, we would expect the trend to online to resume afterwards.

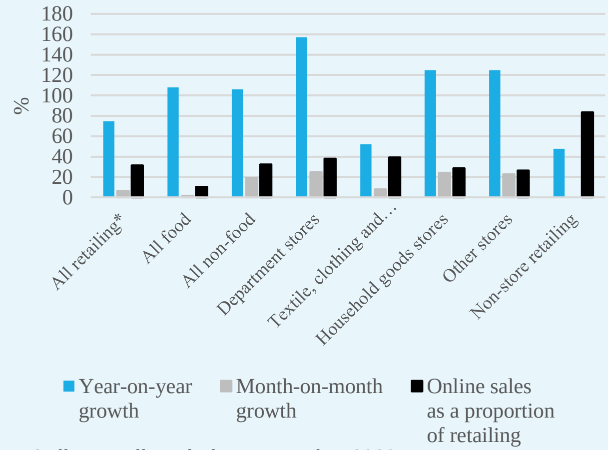
Business rates are a significant challenge. The 2017 business rates revaluation stated that business rates for retail firms should increase by over 25% and has generally presented retail firms with challenges, often more so than other sectors (GLA Economics, 2021a). We discuss business rates in more detail in Chapter 7.

Even though an immediate decline in London's population is expected in 2021 (PwC, 2021), London's population is expected to increase in the medium to long run. This will contribute to the increase in the overall demand for retail. However, changing consumer behaviour and the rapid shift to online spending accelerates the digitalisation of retail and online shopping is going to account for a larger portion of all retail spending. The CAZ, as well as the rest of London, will have to adapt to these changes and make sure that visitors, tourists, and residents benefit from the changes, as it will be instrumental to the success of the CAZ and outer London boroughs.

International workers and spending

Brexit is likely to have an impact on retail through changes to migration, due to the high proportion of EU residents working in retail in London (ibid). Moreover, the cessation of tax-free shopping, which previously provided VAT savings to visitors from outside the EU, may deter international visitors to go shopping in London. London is a global shopping destination attracting visitors from abroad. Tax-free shopping is especially popular for luxury items (the Art Newspaper, 2020), often purchased by international visitors in central London. This can impact London's competitiveness to other European cities as a major global retail destination. The Pound ended 2020 at its highest point in the year; longer term prospects are mixed, but there is some consensus that GBP is unlikely to depreciate further than its post-referendum low.

Given its dependence on international tourist footfall, this will hit the CAZ perhaps the hardest of all areas in the UK. However, it will impact tourism spending across the UK. 40% of all of UK's international spending occurs within three London boroughs: City of London, Westminster, and Kensington and Chelsea (Centre for London, 2020b).



Online retail statistics, November 2020
(Source: ONS, 2020h)

Retail: A structural shift

Retail faces several challenges and the CAZ and London will have to adapt in order to capitalise on these

A downwards step-change in the retail offer is a significant risk

There are opportunities for local centres and for emerging retail types

The shift to online shopping will change commuting and spending patterns in the CAZ

Reduction in retail offer

Many retail businesses are not expected to survive the pandemic, and it may be harder to find new tenants for larger premises (such as the recent announcement of the closure of Debenhams, and the threat to Topshop on Oxford Street), even in previously lucrative locations such as the West End. This is bad news for jobs and the economy, and also risks significant knock-on impacts, including:

- The reduction in offer reducing the draw of a trip to the attraction of in-person shopping in the area.
- The impact on streetscape and reputation of vacant premises.

The change in retail patterns also has implications on employment, especially young people and non-UK nationals, as they who form a big part of retail's workforce (WPI Economics, 2020). London is celebrated for its diversity and suitability for young people to start a career or earn money whilst studying. Although it is unclear what the effects are following a smaller workforce in retail, it is important to ensure that young people and internationals continue to contribute to the CAZ, as well as the rest of London, to maintain its competitiveness and reputation as a major global centre.

Opportunities for local centres

There are opportunities for local centres to capitalise on increased home working. High streets outside of central London have recovered quicker from COVID-19, as shoppers and residents choose local shops rather than travelling into central London, giving a 'doughnut effect' of differential economic recovery (Centre for London, 2020d). This creates opportunities for areas in outer London. Footfall in boroughs across outer London have not experienced as great of a decline as boroughs within the CAZ in relation to retail and recreation (Google Mobility Data, 2021). Some suburbs in Newham and Ealing are even seeing higher footfall than pre-pandemic levels (Centre for London, 2020d). Increased working from home in the long-term could help. Areas of outer London may continue to see increases in footfall as people continue to work remotely enabling residents and shoppers to opt for local options. This may not apply to tourists, as central London usually has a higher proportion of international spending.

With the increase of people working from home, retail shops in the CAZ can experience a dip in demand while local centres can experience an increase in demand. People have shown a tendency to rather support businesses in their own local areas (London & Partners, 2020a), which can further amplify the 'doughnut effect'. There is an opportunity for local centres to capitalise on this growth, as well as opportunities for the CAZ to reinvent and change retail commercial space to other usages. The locations of areas that experience an increase in demand will also depend on unemployment and household affordability within the area. The risk of an immediate recession following COVID-19, households' spending power and unemployment rate will also impact retail at an aggregate level.

A new type of retail

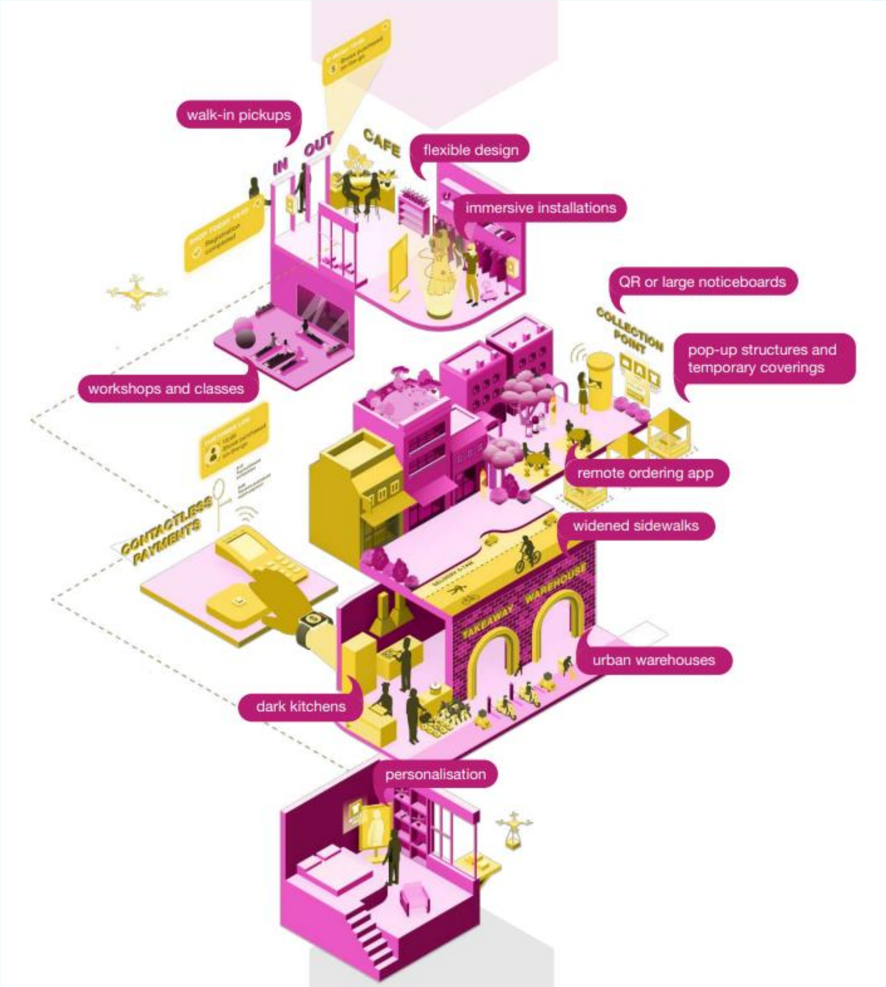
There is an opportunity for public authorities to encourage new retail businesses and retail in growing sectors in the CAZ. This can drive demand in more experiential retail (which is well-suited to the CAZ), and capitalise on the growth in click-and-collect during the COVID-19 period, which may appeal to office workers and others that are short-of-time. The retail environment has evolved significantly in the past and is likely to again. Longer-term, there may be opportunities to reinvent and change retail commercial space to other uses.

Retail: A structural shift

The future of local high streets

More home working creates opportunities for high streets in inner and outer London, as well as in the CAZ. The image opposite shows how the high street may evolve. This may include more transformation economy experiences, including workshops and classes, and immersive installations. Creating a unique character will be a priority for property owners and developers, who are likely to seek retailers that have a distinctive identity. Experience and entertainment will be an essential requirement for the physical store, where people will seek what they cannot experience online. Behind the scenes, dark kitchens may cater for a continued take-up in deliveries, and urban warehouses keep stock to fulfil retail deliveries.

To be insulated against future pandemics, and to increase vibrancy, the future high street may make the best of the outdoors. Pop-up structures, temporary covering and environmentally sustainable heating or ventilation solutions can be used in winter to provide more space. Flexible design of store layouts to provide for changing uses is an increasingly important factor that allows retailers to integrate different activities and offerings within traditional stores as tastes evolve further. And at the check-out, technologies such as facial recognition and proximity sensors can facilitate fast and contactless payments.



An imagining of a possible future high street (Source: Arup, 2020d)

6. COVID-19 has been incredibly damaging and requires urgent action

Spending in the CAZ has substantially decreased and hasn't been fully replicated in home locations

Cursory estimates of office worker spend vary from £7 to £15 per day spent in town, depending on whether they include entertainment and non-food related retail (see for example The Times, 2020b; GLA, 2020d and Arup, 2020b). Although outer London high streets appear to be recovering more quickly from COVID-19 (see p.55), the previous CAZ levels of spend do not appear to have been replicated closer to workers' home office. This is likely to be because of a reduction in offer (this period of home working has yet to led to a new crop of sandwich shops in outer London locations), lack of opportunity for leisure spend due to social distancing restrictions, the tightening of household spending more generally, and transfer of spending online. Over time, perhaps with the exception of internet-based spending, these may ease, and, if home working to persist, spending may be more likely to be transferred than to be lost entirely. The GLA estimated that the loss of office worker spend was worth £1.9bn over calendar year 2020 (GLA, 2020d).

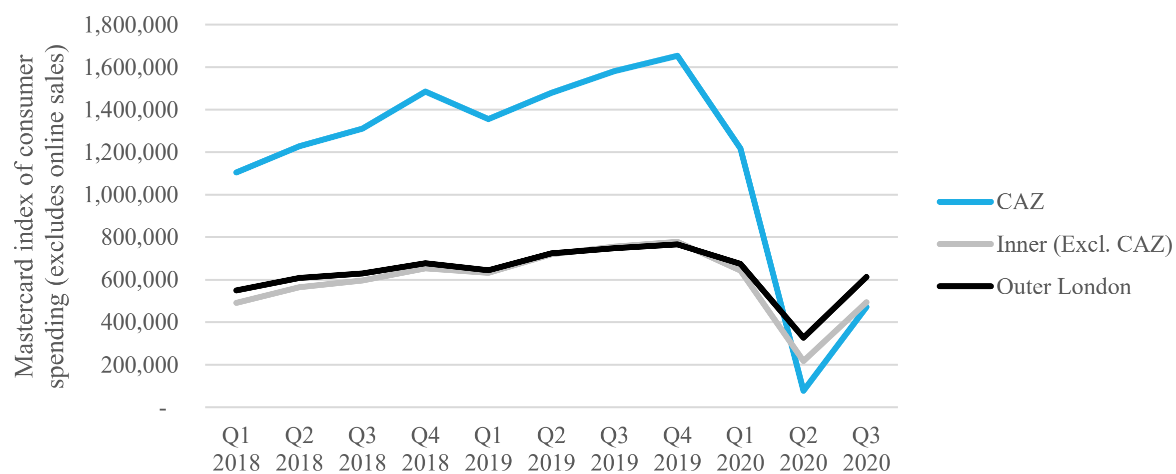
The chart opposite shows how, whilst the CAZ has lost spend more significantly than outer parts of the city, the value of transactions increased in Q3 2020 when some office workers had returned, though tourists were still largely absent. This bounce-back gives hope to a return to previous rates of spend in the CAZ once COVID-19 restrictions are fully lifted.

Impact on non white-collar workers

Arup (2020b) showed that if no action is taken, the resulting impact on many of these sectors, which includes many of London's low paid workers, is staggering. Under a scenario in which a vaccine was rolled out over 2021, annual local economic activity risks being £37bn lower than pre-COVID-19 levels, with 53,000 jobs at risk in the retail and hospitality sectors. Nevertheless, with mitigation, businesses operating in in-person sectors of the economy who are heavily dependent on the visits of office workers may be able to recover from the impacts of COVID-19.

Use of the CAZ for leisure

The parks and public spaces within the CAZ have attracted additional visitors during the past 10 months, which has not translated into spending, due to the nature of the activity, and the availability of opportunities. There is an opportunity to harness this improved relationship that Londoners have with their city. The increased park footfall, alongside higher levels of cycling in summer suggests an opportunity for a deeper relationship, and greater ownership between Londoners and their city centre, suggesting the CAZ's identity as a place to relax, exercise and spend leisure time has increased during the pandemic.



Index of consumer spending (excludes online sales) (Source: Anonymised and aggregated data by Mastercard, 2021)

6. COVID-19 has been incredibly damaging and requires urgent action

The furlough scheme provided a cushion, but arts and culture, retail, hospitality and the self employed likely to suffer further in the short term

Post-pandemic trends

There is some caution in extending current trends beyond the pandemic. The CAZ will become vibrant again once office workers, tourists and visitors return. In this case, the pre-COVID-19 headwinds in troubled inner and outer London high streets will still need to be addressed (Quinio, 2021).

The pandemic has encouraged many businesses across different sectors to respond to the restrictions. Depending on prevailing guidelines, the impact has been felt strongest in arts and culture, retail, hospitality and manufacturing. Furlough, and other government schemes have provided a cushion, although these last three sectors still accounted for the highest proportion of redundancies recorded in August – October 2020 nationally.

Until social distance measures are eased significantly, the continuing decline in the arts and culture, retail and hospitality sectors within the CAZ is likely.

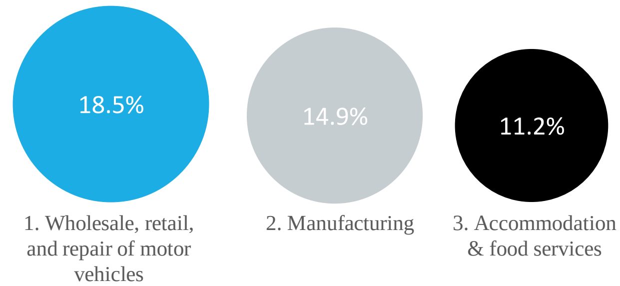
Risk of scarring

As such, London's hospitality sector's GVA is expected to reduce by almost 50% in 2020 (GLA, 2020f). Other key sectors adversely affected includes transportation and storage, arts, entertainment and recreation, and education, all of which are expected to reduce by one-fifth.

But the falls in jobs are not restricted to the industries that rely on in-person contact: the largest absolute loss of workforce jobs, of 47,000, over 2020, was in London's pre-COVID-19 success story of the professional, scientific and tech industry (GLA, 2020e).

Once the pandemic is over, we would expect these sectors to return to growth again, although the risk of scarring is substantial:

- In the arts and culture sector, from the closing of venues that have not been able to survive the pandemic.
- In the retail sector, the step-change in a reduction in offer (such as the recent announcement of the closure of Debenhams, and the threat to Topshop on Oxford Street), reducing the attraction of in-person shopping.
- Prior to the pandemic, retail employment within the CAZ was already falling by 3.5% per annum between 2015 and 2019 (ONS, BRES, 2015-2019), and the move to online transactions is likely to continue.
- In all in-person sectors, including hospitality, the risk of retaining of social distancing conventions, and a feeling of lack of safety, particularly on behalf of groups that were at risk of COVID-19.
- In all sectors, including white collar sectors, the context of a wider economic downturn.



UK Redundancies (Aug-Oct 2020) – Top 3 Sectors (% of total redundancies) (Source: ONS (2021b) Redundancies by age, industry and region)

-229,000

Loss of workforce jobs across London, March – December 2020

-47,000

Loss of workforce professional scientific and tech jobs across London, the most affected sector, March – December 2020

Source: GLA (2020e)

6. COVID-19 has been incredibly damaging and requires urgent action

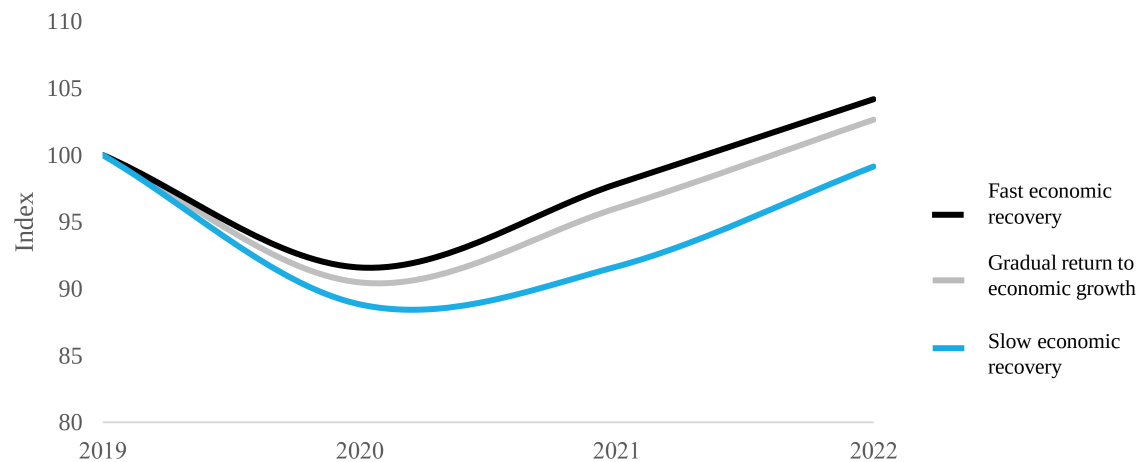
The economic outlook beyond 2021 is cautiously positive, with a return to 2019 output by 2023/4

GLA projections

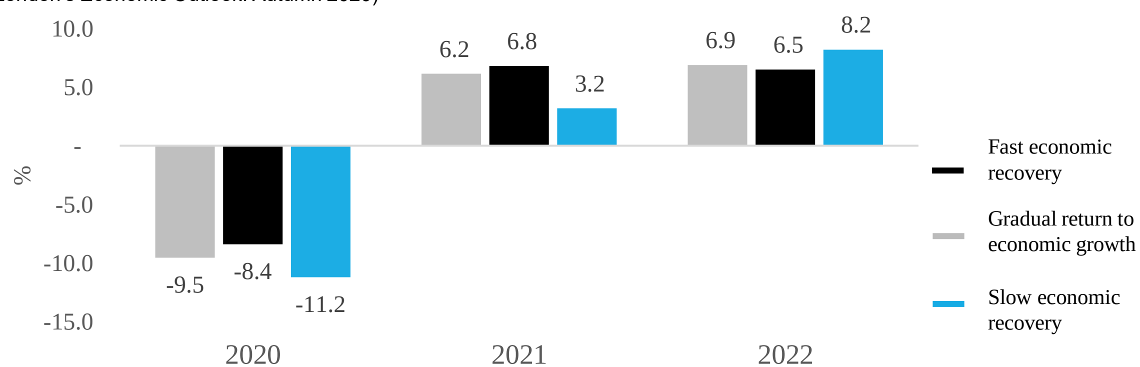
Similarly, exploring the extent of the pandemic's detrimental impact on the London's workforce has shown severe job losses in the short-term. According to the IMF, the UK economy is projected to experience the 4th highest contraction in 2020 amongst the G20 countries, reflecting the significant toll of the pandemic has played, along with Brexit and other impacts (IMF, 2021).

According to the GLA's latest economic forecasts for the whole of Greater London (GLA, 2020f), under the slow economic recovery scenario, the city's GVA contribution is expected to decline significantly by 11% in 2020, and is not expected to return to pre-COVID-19 levels until 2023. The fast economic recovery, which assumed a fast and effective vaccine roll-out, and a swift return to normal, and therefore seems a little less likely, has GVA contribution declining by 8% in 2020, before rebounding to pre-COVID-19 levels by 2022.

Likewise, a fast economic recovery shows employment levels in London to be less severely impacted over the next three years. By 2021, Greater London is forecast to lose up to 150,000 jobs compared to 2019 levels, before rebounding to pre-COVID-19 levels by 2023.



Greater London Annual GVA Growth Forecast, 2020-2022 (base year = 2019) (Source: Greater London Authority (2020f) London's Economic Outlook: Autumn 2020)



Greater London Annual GVA Annual Growth Rate (Source: Greater London Authority (2020f) London's Economic Outlook: Autumn 2020)

6. COVID-19 has been incredibly damaging and requires urgent action

A swift recovery for hospitality and white collar industries, with a slower path to growth for retail

Stronger growth in arts, culture and hospitality

Despite these headwinds, we anticipate arts and culture, retail and hospitality employment to post positive growth again. An eventual return to pre-COVID-19 levels appears more likely in arts and culture and hospitality given their strong position before COVID-19, and the possibility of further government support for the former. The exact speed and pattern of growth will depend on footfall and underlying demand. For retail the outlook is less bullish.

Traditional brick-and-mortar retailers are thus likely to continue to struggle with the increasing competition from online shopping and changing consumer behaviour patterns. As detailed in the earlier section (see p.61), there remain opportunities for retailers to grow in local centres, and in more diverse, specialist areas.

Fast growing white-collar industries

Industries including financial and professional services, where working patterns can more easily adapt to a remote setting and that drive the bulk of the CAZ's (particularly the City and NIoD) GVA, have been less severely impacted by COVID-19 lockdowns (GLA, 2020f).

We anticipate the fastest growing white-collar sectors within the CAZ such as financial (and activities auxiliary to) services and tech consultancy (and related activities) to experience significant growth over the next 10 years. Between 2015 and 2019, the number of people working in the computer programming /tech, consultancy and related activities within the CAZ alone soared from 58,000 to 75,000 within five years.

Impacts on London as a global destination

Tourism is vital for maintaining the cultural offer, transport system, and restaurants across the CAZ

Tourism will be impacted by restrictions and reputation

Tourism has reduced substantially, with city arrivals globally estimated to have reduced by 58% in 2020, even before the further restrictions in autumn and winter (Tourism Economics, 2020). London has been hit particularly hard, with hotel occupation rates at around 28% in autumn 2020, below almost all European counterparts, including Paris, and all other UK major cities (London and Partners, 2020c). Inner London, particularly the City and Westminster have fared the worst.

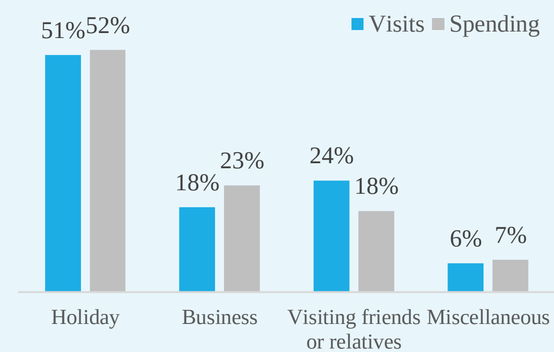
Tourists have been put off not only by immediate travel restrictions, but by the general requirement to access and move around London by public transport and the presence of crowds, its reputation as a hub of COVID-19, the lack of opening of many of the major attractions, and a lack of ability to plan ahead. During the pandemic, and immediately after, it appears that many tourists are preferring a rural destination as an alternative to the big city. This will have major implications, as tourists, especially international tourists, contribute greatly to the London and UK economy.

International tourism

In 2019, London attracted approximately 16.2 million overseas overnight visitors (Tourism Economics, 2020), and was one of the three most visited tourist destinations globally (Street, 2019). International visitors contributed £15.7 billion to London's economy in 2019, more than 63% of all of international tourist spending in England (ONS, 2019b), which is estimated to have supported 236,000 FTE jobs (London First, 2019). In 2019, international visitors spent on average more than £720 per visit (Visit Britain, 2019c), which is significantly more than domestic tourists of £250 per visit (Visit Britain, 2019d). The vast majority of overseas visitors are holiday makers, although business travellers are the largest spenders per head.

International tourists are overwhelmingly focussed on the CAZ (GLA, 2020d; Visit Britain, 2019e). The CAZ also acts as a distributor to the rest of the country, with half of the trips to the UK including a trip to London (ONS, 2019b). As such, a reduction in international tourism in the CAZ could have a profound, downward impact on the rest of the country.

International visitors travelling to the UK were down 96% in Q1 and Q2 of 2020, compared to 2019 (Visit Britain, 2020a), making it the hardest-hit European country. London is also the one of the hardest-hit European cities, estimated to lose 9.8 million visitors (down 60%) (Tourism Economics, 2020).



Visits and spending by purpose across London from overseas residents (Source: ONS, 2019)

16.2m
London international visitors, 2019

6.4m
London international visitors, 2020 (est.)

17.1m
London international visitors, 2025 (projected)

Source: Tourism Economics, 2020

Impacts on London as a global destination

Tourism in the CAZ will be impacted by global changes to travel and spending

£15.7bn

International visitors' contribution to the London economy, 2019

£3bn

Domestic overnight visitors' contribution to the London economy, 2019

Source: ONS (2019b); Visit Britain (2019a)

Domestic tourism

London normally hosts more than 12 million overnight domestic tourists from the rest of Great Britain annually, which equates to about 10% of all domestic travel. This spending equates to more than £3 billion (Visit Britain, 2019a). London is the most popular domestic destination for business (Visit Britain, 2019b). Although domestic travel recovered comparatively quickly during the pandemic, with many travellers opting for staycations due to travel restrictions (ibid), there is evidence that more rural destinations were preferred to London, and there is a case for believing that these habits may stick. Over summer 2020, room occupancies across coast and country accommodations were higher than in London, with many coastal areas having an occupancy rate of more than 90% (PwC, 2020).

"Eager returners" are more likely to live close by

Whilst many of the legal barriers to travel will be lifted before we arrive at a steady state, London's reputational impact, social distancing conventions, and potentially, a residual perception of a lack of ability to plan ahead (and therefore for tourists to be less "ambitious" in their travel plans) may remain for a number of months, or even years.

Beyond this, there are hopes for a recovery in tourism. Visit Britain (2020b) suggested in December 2020 that UK tourism in 2021 will be almost double the 2020 levels, with a gradual increase through the year, and with European markets recovering more quickly than long-haul. Longer-term, international visitors coming to the UK to visit friends and relatives might decline if a drop in EU migration is not made up from other countries.

Londoners themselves most likely to be those enjoying a day out in the capital. London & Partners (2020a) has reported that these "eager returners", along with other cohorts, are a source of latent demand, and tend to be younger, more likely to have families, more attracted to social and educational activities, have increased in number during the pandemic period.

As such, international visitors are most likely from European countries, as long-haul international travellers are expected to rebound more slowly. Domestic visitors are also estimated to recover faster, reaching 2019 levels in 2023, while the number of international visitors is only estimated to reach the 2019 level in 2024 (Tourism Economics, 2020). Heathrow Airport only expects to reach 2019 levels in 2026 (Heathrow Airport, 2020).

Survey results about what do Londoners miss the most about Central London (Source: London & Partners, 2020a)

Impacts on London as a global destination

Tourism in the CAZ will be impacted by global changes to travel and spending

A positive, but unsure medium term outlook

Tourism Economics (2020) suggests that in the medium-term London will continue its lead as the most popular city destination in Europe, and by 2025 will be comfortably exceeding its 2019 numbers of visitors. These upbeat projections may be threatened through a continuation of travel restrictions, fear of a future pandemic, or of future strains.

The medium-term (2-5 years) is expected to see strongest tourism growth in those that are younger, and have travelled least far, with the longer-term (5-10 years) seeing a return to a make-up of the pre-pandemic tourism cohort.

Tourism spreading out beyond the CAZ

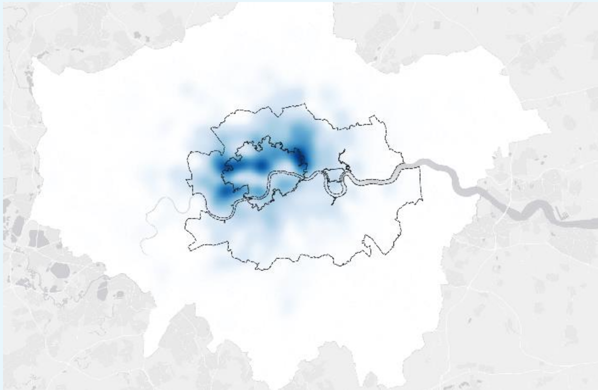
As people are eager to meet up physically, visiting friends and relatives is likely to be the purpose journey that recovers most quickly. The nature of how people are staying in London is still changing. People are more willing to stay in other areas of London in Airbnb or flat rentals, which tend to circle the CAZ, as they can offer more space. This will impact travel and shopping patterns. These travellers tend to be domestic, or European visitors. The CAZ needs to ensure its relevance by supporting cultural attractions, businesses and restaurants to attract visitors into the area.

Taken together, these suggest a potential branching out of tourism from the CAZ in the immediate post-COVID-19 years, which might be mitigated in the medium term.

Asian tourists may be more likely to stay at home

London normally welcomes a high number of Chinese tourists, who are also among the highest spending tourists (ONS, 2019b), spending more time and money within the CAZ, than Americans and Europeans (London First, 2019). In the run up to COVID-19 there was rise of domestic travel within Asia and the Pacific, with 2018 figures showing that approximately 50% of all domestic tourist trips globally were located in this region. The end to tax-free shopping, the reluctance to travel long-haul, and the need to plan in advance may further disincentivise these visitors. Tax-free shopping is especially popular for luxury items (The Art Newspaper, 2020), often purchased in major shopping districts across central London. This can reduce high spending visitors to London and the CAZ and impact London's competitiveness to other European cities.

In the medium to longer-term, business travel is expected to decrease following the rapid rise of virtual meetings and conferences that has showed that in-person interactions can be replaced with virtual communication. The CAZ, being a popular destination for business, can lose economic activity following fewer people travelling to London, both from within the UK and international travels. Business travellers contribute to the CAZ economy through supporting sectors such as transport, restaurants, bars, accommodation, and retail businesses, which may suffer with the reduction in business travel. This shows that there might be a point in emphasising efforts on attracting visitors for leisure purposes.



Heatmap of Airbnb listings in London, December 2020
(Source: Inside Airbnb, 2020)

Impacts on London as a global destination

Business travel is expected to recover much more slowly

The wider economic context

The economic consequences and expected recession following COVID-19 can impact international travel as visitors may have less disposable income to spend on international holidays (Visit Britain, 2020b). London is recognised as an expensive city, hence this can impact the number of visitors and tourist spending in London, as well as the CAZ.

Business travel

COVID-19 has reduced business travel to almost zero, and has also given widespread use to a number of digital tools that may mean that it will struggle to recover. The use of video conferencing, co-working software and other collaborative packages has become the norm for white-collar workers, and they are now embedded in workplace culture to such an extent that they are likely to remain preferred to in-person meetings after the pandemic has ended for the following reasons:

- Being able to bring together a (potentially) global audience at short notice.
- Due to uncertainty in the wider economy, firms will be keen to reduce unnecessary cost.
- Pressure to reduce corporate carbon emissions.
- Reduction in hours lost due to travel time.
- If conferencing remains the norm, no perceived advantage to being at a meeting in person (no first mover advantage).

The largest downward pressure may be on internal travel. The more important external conferences, initial sales meetings, or decision making meetings, may be judged to be important enough that the benefits of in-person attendance outweigh the costs. There is also likely to be a retention (and possibly a resurgence) of meetings that facilitate in-person socialising and networking. Business travellers represent 18% of London’s visitors, but 23% of the total spend (ONS, 2019b).

Whilst projections on London business travel directly are hard to come by - and indirect projections offer a range of views - almost all are suggesting that it will be the early to mid-2020s before business travel numbers return to pre-COVID-19 levels, and even this may be optimistic.

7. A changing built environment and commercial property market will impact business rates income

Unsplash: Nomadic Julien

7. A changing built environment and commercial property market will impact business rates income

A variety of changing dynamics in commercial sectors could impact borough and GLA incomes

Uncertainty for development, property markets, and business rate income

The business and commercial property impacts of the COVID-19 pandemic are uncertain, but there are likely outcomes and trends that should be considered in scenario planning. This is important for understanding how the local economy will change, the impacts on the built environment and commercial development, and the impacts on business rates income for the boroughs and GLA.

Since the start of the business rates retention scheme, funding for London's boroughs and the GLA is more dependent on the performance of the commercial property market. Growth in business premises floorspace and their values generates additional funding for the boroughs and GLA. With the potential for a slowing economy, business uncertainty, and changing ways of working as we come out of the pandemic, the changes to the property market will bring new risks for London's locally-raised finances.

Potential impacts on the property market: demand and future development

The pandemic has had and will have varying effects on different sectors, in particular:

- Offices have been able adapt to remote working more than other sectors, with many people working from home. This may reduce demand for workers to commute into London five days per week and cultures of presenteeism. This could effectively reduce the demand for office space in the medium-term as businesses adapt and have the option to change lease agreements. This would have the effect of decreasing net demand for office space, increasing total available supply, and likely reducing rents in the short-to-medium-term as leases and tenancy agreements are able to be re-negotiated. However, there is potential for market demand to stabilize in line with changing design and space requirements of firms (see Chapter 8).
- Retail had been experiencing structural challenges prior to the pandemic which have now been exacerbated. The shift to online shopping has been accelerated. While retail will return, it is unlikely to return in the same way, at the same scale or even with the same companies. Retail rents are therefore likely to fall in response to the reduced demand, especially in the capability of retailers to afford rents and business rates at previous levels.
- Food and beverage (F&B) and leisure will likely be a short-term shock rather than a long-term shift, with potentially more demand for leisure once people can be social again and increased ground-floor stock from vacated retailers.

Increased economic uncertainty and changing ways of working (particularly in the office sector) may also lead tenants to require change to commercial premises and more flexibility with regards to design and space requirements. This would lead to phases of construction and redesign that might lead to periodic vacancies. It may also lead to higher demand for more flexible lease arrangements.

If vacancy rates increase, they are likely to increase in areas with lower demand and lower quality commercial stock prior to the pandemic. The more resilient areas of the capital will include those with higher quality, higher accessibility and more flexible spaces.

However, if more people are able to work from home more often, suburban centres may see a revival of local retail, F&B and leisure demand linked to small-scale demand for SME space for businesses that prefer to be close to home and can access the amenities of local centres.

7. A changing built environment and commercial property market will impact business rates income

The anticipated revaluation in 2023, which should reflect the impact of COVID-19, will still result in uncertainty for businesses in London

In the scenarios considered on page 72, there is likely to be a short-to-medium-term fall in commercial property markets, with retail potentially feeling the biggest hit. How this affects local government business rates income depends on a range of factors, with two of the most important being the timing (of a reduction in occupied floorspace or values), and market adaptability.

Currently, businesses are paying their business rates based on their rateable values (an estimate of its open market rental values) from 2015, reflected in the 2017 revaluation. The expected revaluation due in 2021 has been delayed until 2023, when liability will effectively be based on 2021 rents. Until then, businesses will continue to pay rates which reflect 2015 open market rental values.

The originally-planned 2021 revaluation would have meant that many businesses across London would expect increases to their rates liabilities, reflecting the buoyant property market and the increase in rents to 2019 (some quite substantial).

By deferring the 2021 revaluation to 2023, the government has avoided a situation where rateable values for many businesses would have been increasing in the midst of the COVID-19 crisis. Moving the date to 2021 allows the government to take into account the effects of the crisis, and the revaluation itself, on the property market (to some degree). However, the limited number of transactions over the last year means that there is likely to be a degree of uncertainty in determining the new rateable values.

It is also important to note that under current legislation any non-domestic revaluation has to be fiscally neutral. The Uniform Business Rate (UBR) multiplier is adjusted at any revaluation so that the overall tax take across the country remains the same, other than adjustments for inflation.

Therefore, even if rateable values fall in London, this may not result in a proportional drop in rates payable for businesses (because they may have fallen equally far, or further, everywhere else).

The property market’s ability to adapt to changing demands from businesses will also affect vacancy rates and property values. This includes the shift between uses (e.g. from retail to entertainment, or from office to residential) as well as the ability for existing premises to adapt to new requirements (e.g. flexible workspaces and flexible leases). If there are bottlenecks in the planning system, licensing, development, or lease management, any of those could increase vacancy rates and reduce business rates income.

Increased vacancy rates and changes in property use could dampen rates income (for example, central London retail attracted much higher rateable values per square meter compared to office or other uses). Furthermore, if businesses feel their rateable values are unreflective of their rents over the next couple of years, local authorities should to see a higher rate of contested values, presenting local authorities with an administrative burden and financial risk or appeals.

7. A changing built environment and commercial property market will impact business rates income

Government's Call for Evidence on business rates reform highlights opportunities and uncertainty going forward

HM Treasury issued a Call for Evidence as part of its fundamental review of business rates in July 2020. The majority of the consultation focussed on potential reforms to the design of the existing business rates system. The final questions, however, posited how alternative taxes could improve upon business rates as either substitutes for or supplements to the tax. The two examples featured in the Call for Evidence are:

- Capital Value Tax (CVT): a tax on the combined capital value of non-domestic land and property.
- Online Sales Tax (OST): levy a tax on companies based on online sales.

The underlying need for reviewing the existing system stems from the on-going design issues with the business rates tax system. It is often considered to be out of line with the market and out of sync with businesses' ability to pay, resulting in a complex system of discounts and reliefs. However, in comparison with other taxes, it has a very high collection rate and is difficult for businesses to avoid wherever their headquarters may be based.

The business rates system presents challenges to businesses. While it is relatively predictable for businesses, it also decouples taxation from the ability of business-occupiers to pay based on economic cycles. It also creates distortions in the property market and encourages (and potentially discourages) certain types of development.

The UK is unique in its relative dependence on property taxes within the OECD, both as a percent of total taxation and as a percent of GDP. The system presents particular challenges for local authorities as a funding source. Local property taxes (business rates and council tax) together account for more than 60% of local government funding (Institute for Government, 2020), making them vulnerable to sudden changes in the property market.

Continued calls for business rates reform and the emerging trends to how non-domestic properties are used due to COVID-19, highlights the ongoing and ever-pertinent need to evaluate options for reforming business rates. Government will need to strike the right balance between continuing to raise the revenue necessary to fund essential public services and supporting economic recovery.

IV. The Future of the CAZ

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Unsplash: Trae Gould

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

The pandemic has caused a shock to the commercial real estate sector

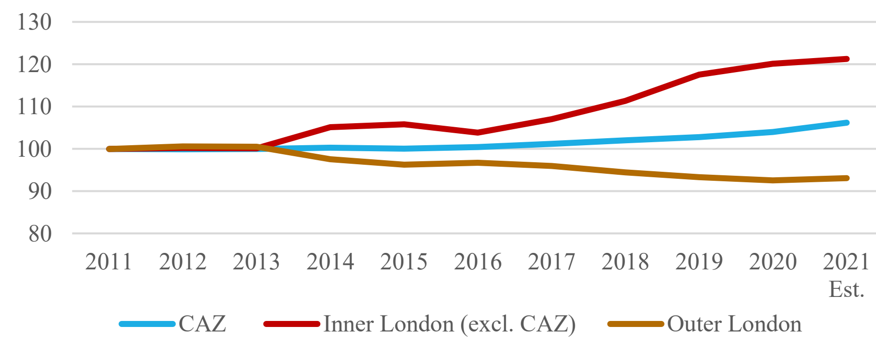
A potential structural shift in employee behaviour has cast some doubt on the future and viability of the office. However, we consider that the office still has value to add in terms of relationship building and as a collaborative environment.

Before the pandemic, the office market in central London was characterised by low supply, limited development, significant pre-letting and rental growth. London's office leasing activity started robustly in 2020 on the back of a decisive general election result and perceived political and economic certainty. The Q1 2020 take-up totalled 3.2m sq ft, only marginally behind the 5-year average.

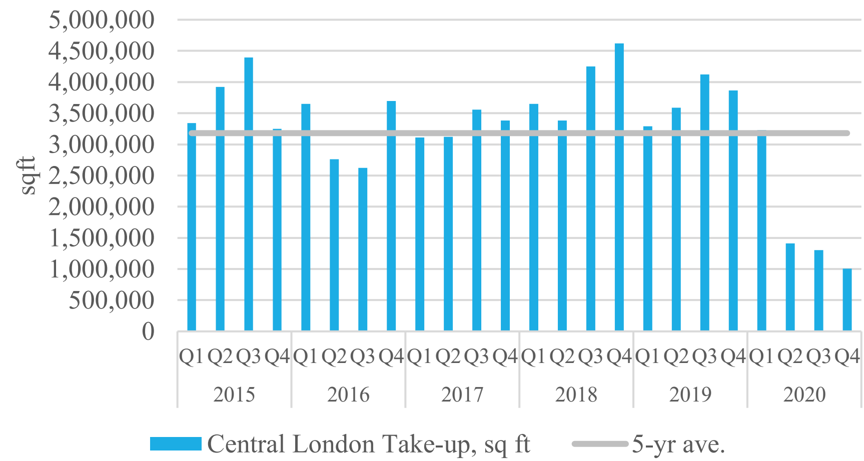
However, leasing activity was sharply curtailed at the end of Q1 as the scale of the COVID-19 pandemic and the imposition of the first lockdown in March took effect. Leasing activity slumped to record lows during Q2, Q3 and Q4 as the majority of businesses focused on scaling back, re-evaluating their spatial needs and either postponing real estate decisions or bringing surplus space to market.

Reassuringly for the market, availability, particularly for primary grade product, remains well below historic peaks across most London submarkets. There is a limited pipeline of new supply coming through due to postponement of developments, and completion dates being pushed back. Of the 11.6m sq ft under construction, 41% is already committed, and pre-let activity for new 'best in class' buildings has remained strong.

Whilst there has not been a huge swathe of vacancies appearing in the CAZ, it does seem that many occupiers are taking a risk averse approach, and using the pandemic as an opportunity to defer real estate decisions on spatial requirements. It is also offering occupiers a chance to scrutinise what their office use needs are. Another consideration is that the high pre-pandemic levels of rent and sale prices suggests unmet demand, which might suggest that there will be a shift in use patterns, as opposed to a collapse altogether.



Indexed Floorspace Growth 2011 – 2021 (est.) (Source: Gerald Eve, 2021, research as part of this assignment)



Central London office leasing activity, 2015 – 2020 (Source: Gerald Eve, 2021, research as part of this assignment)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Following the Brexit trade deal, London will likely continue to be seen as a safe haven for investment

Investors likely to continue to have faith in London fundamentals

The real estate investment markets slowed during the height of the pandemic in 2020, however, Gerald Eve expect investment activity will have risen in the second half of 2020 (2020). The reduction in transactions can in part be accounted for by the RICS' implementation of the material uncertainty clause, restricting the valuation processes from the end of March, 2020. The inability to physically view possible purchases meant that normal due diligence checks took longer. The furlough scheme helped many occupiers avoid default, which may also have helped buoy the market (ibid.).

Geo-political concerns and shifting capital allocations has subdued Asian investment

Following the 2016 Brexit referendum, Asian investors were particularly active in the London office market as they sought to take advantage of the depreciation in Sterling. Activity reached a peak in 2018, but had been falling since the start of 2019 (ibid.). Whilst European investors have been taking up some of this space in the market, it is likely that investment from Asia will remain at this low rate for the next two years, and may shift focus towards other assets such as logistics.

It is likely too that some investors are holding back on acquisitions in the office market until some of the dust from the pandemic has settled, and future occupation levels are more certain. Whilst London offices still offer an attractive return when compared with Asian and Pacific real estate markets, it is not expected that investment from Asia will return to 2018 levels.

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Working from home works well for some jobs, and less well for others

Whilst homeworking can provide more leisure time and a better work-life balance, there are also some significant costs to the wider economy, and to many workers. Homeworking works well for many, and Londoners were slow to return to the office during the summer of 2020, before stricter measures were introduced during the various lockdowns. Its appeal includes:

- Reduction in travel time leading to a better work-life balance, and more time available for family commitments and leisure.
- Improved mental health and reduced anxiety. ONS (2014) reported that commuters have lower levels of life satisfaction and happiness, and higher anxiety on average than those who do not commute.
- Financial savings from transport costs, and other expenses such as lunch and coffee.
- If the norm remains, online meetings provide broad equivalence to the workplace with colleagues attending in person.

Following a wide survey, BCO (2020) suggested that 46% of people intended to split their time between home and the office, with 30% returning to a full five-day-week, and only 15% opting to work fully from home, once restrictions are lifted. Other surveys suggest that a 2-3 day per week return is around the mean level. This is because of the significant benefits to workers expecting to return to the office for significant periods of the week, including:

- More in-person interactions, leading to business and career opportunities, and to new ideas.
- Greater variation in surroundings.
- Access to learning, skills, training and support from colleagues, particularly important for those developing their careers.
- A less blurred line between home and work life.
- Social interactions and informal support from colleagues and collaborators.
- Stronger sense of culture and shared goals.
- A better working environment, with improved IT, dedicated desk space, fewer distractions, and (often) refreshments such as tea and coffee provided.

The implications of this structural change in the way in which work is carried out, means that an element of flexible working is regarded as here to stay. The degree to which it is taken-up will necessarily vary depending on sectors, office cultures, and business strategies, as well as compliance and data risks.

Impacts on productivity

While studies have shown the impact of working from home on productivity to be negligible for some occupations (Bloom et al., 2015), studies have tended to be for voluntary rather than forced movements away from home. Employment which is self-contained and skilled-routine, such as patent examination (see Choudhury et al., 2019), is more likely to be successful in working from home than parts of the economy which are based on non-routine cognitive work which is reliant on the tacit knowledge which is most easily transmitted through in-person communication. Given the CAZ's strengths in terms its industrial breadth, and its position at the focus of the transport network, this suggests a continued demand for office space.

46%

of UK office workers expect to split their time between the home and the office in future

30%

of UK office workers expect to return to the office full time

Source: BCO (2020)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Londoners may be more likely to continue working from home, compared with other global cities

A study for the GLA in September 2020 (GLA, 2020d) found that CAZ-based businesses imagine that almost three quarters (72%) of their workforce will be working from home at least partially for the next 2 years. Indeed London office workers may be less likely to return than those in other global cities, for the following reasons:

- There are longer average commutes than Paris or New York.
- Inertia, given the longer absence and lockdown periods in the United Kingdom.
- Potentially, a lack of company-led initiatives to return, which were common in other countries during a lifting of restrictions in summer 2020.

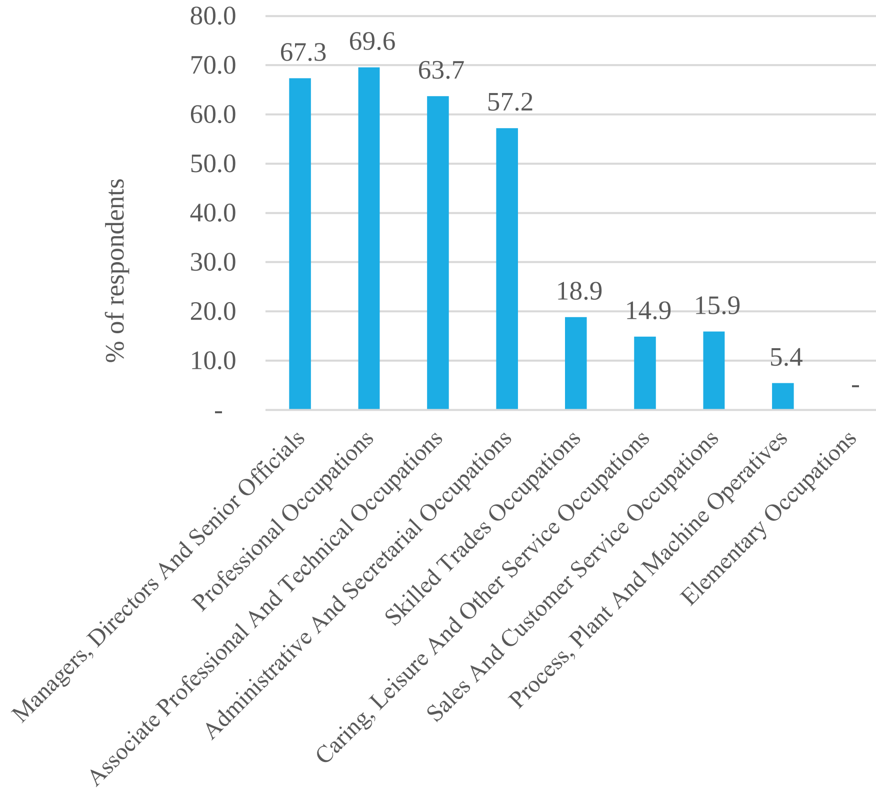
Lower presenteeism may mean that London loses out on significant agglomeration benefits, compared to its global rivals. And over time, the number of days in the office may vary, depending upon culture, expectations and other factors.

Pressure from employers and from government

The lower footfall in London, compared with other locations during summer and autumn 2020 can be partly explained by the relative lack of pressure from British employers and government for office workers to return to their desks (FT, 2020) . French firms had a much firmer view (ibid.), which led to higher levels of returners. The extent to which employers are comfortable with workers contributing from home will be a significant factor in future demand.

Move towards serviced offices, likely outside the CAZ

With businesses wanting greater flexibility in lease terms, serviced offices may offer – at least in the short term – an attractive substitute for companies that are reluctant to sign long leases in the current environment. Carefully managed, good quality serviced office space may see an uptick in demand to accommodate such occupiers, most likely in the outskirts of central London.



Proportion of people working from home in April 2020, by occupation (ONS, 2020f)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Employee behaviours have changed, irreversibly in many cases

Home working and the wisdom of crowds

Behavioural factors are key to determining the likely future demand for central London office locations. They have been central to pre-COVID-19, and during COVID-19 levels of demand. Full-time home working has been possible for white collar workers for many years, but its popularity plateaued before COVID-19, given the disadvantage of being a first mover, whereby individual businesses and workers were less likely to do so, because others were not. If a company decided not to meet its clients in person, or if an individual decided to, they appeared uncommitted and missed out on business and professional opportunities. For now, COVID-19 has wiped the slate clean so that those stigmas no longer exist. And demand for office space will depend on whether these drivers will return, and at what level, after the pandemic ends. Office workers are likely to need tangible incentives to return to their desks.

In the medium term, there are a number of other behavioural factors that will influence the impact of white-collar workers on the wider economy, and supporting systems (including demand for office space and the transport system). This assumes that the threat of further lockdowns has alleviated. They include the following.

Fear of missing out and drifting back

The prospect of the fear of missing out (FOMO) — has long been associated with office culture. In-person "water-cooler" conversations and networking tend to lead to career opportunities, which suggests that the most ambitious (and ultimately successful) workers will return first, and will be present for a greater number of days per week. This provides a significant incentive for white-collar workers to return. On the softer side, many workers attend in-person for social interaction and stimulation. Again, this is more likely to be a draw if others do the same. Over time, this provides an incentive for others to return as well. We may see a gradual drift back to office life.

Office attendance and experience-level

Arguably, the career-based incentives to return to work are greatest for those developing their careers (who also benefit most from in-person learning) and those in senior roles (who also may drive more satisfaction from delivering instructions in person). Those in middle management, or roles that they are less likely to be promoted from, may be more likely to stay away. There is also likely to be increased selection by job type, as there is little need for administrative staff or routine workers to commute, but a greater reward for high-value-added knowledge workers.

There is some evidence that older employees, men, and managers are more likely to return to the office than younger employees and women (such as YouGov, 2020; JLL, 2020; and Hassell, 2020). We examined the potential impact of more women working from home post COVID-19 in Chapter 3.

Flexible working arrangements have previously been shown to have a positive impact on workplace diversity. However, rewarding presenteeism could impact upon progress towards equality, diversity and inclusion policies. Employers may choose to mitigate the impacts of this through ensuring a level playing field across office-based and home workers, perhaps associated with specific inclusion initiatives (such as continuing to make video calls the norm for meetings). In turn, this would encourage more people to work from home.

The need for workers to develop their careers through both upskilling and reskilling will become increasingly important and frequent. The office environment could become the place where high-quality, organisation-specific, in-person learning is focussed. While on-line learning modes are becoming more sophisticated – including micro-accreditation and continuous learning – the challenge for leaders to enable career growth in their workforce may be best suited to the office.

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

The role of long weekends and seasonality

If the new normal is to be a mixture of office-based and remote working, the extent to which the office-based time becomes focussed on the middle days of the week (Tuesday-Thursday) increases, based on the desire for a long weekend. This would mean that the transport system would experience similar peaks (and therefore costs) to the pre-COVID-19 situation, with lower revenues. It would also mean that companies would not be able to downsize their real estate significantly. To an extent this can be mitigated by other behavioural factors (such as a desire to avoid crowds on a transport system, or pricing differentials) and by guidelines by organisations (such as different departments being instructed to attend on certain days).

Likewise, there may be a seasonality to attendance, with the summer months being more popular for home working.

Availability of part-time season tickets

The availability of flexible season ticketing on public transport can have a significant impact on overall demand for office space, and the frequency of commuting. Many white-collar workers may not consider that it is cost-effective to purchase a full-time season ticket if they are only attending part-time, and instead opt to work from home for the full week. Rather than this binary outcome, part-time season tickets would encourage workers to come to the office for (say) 3 days per week. These are currently being considered by the Department for Transport for national rail services (The Times, 2020a).

“Saving up” retail and leisure spending for days in the office

Individuals may choose to save retail and leisure spend for the days in which they attend work in-person. For example, an individual working every Wednesday and Thursday in the CAZ would take the opportunity to go shopping at lunchtime, and ensure that they met friends for dinner on those evenings. In this way, the individual level of spend in the CAZ may be nearer to that if the individual worked five days a week in the office. If this approach became widespread, with a greater number of individuals visiting the CAZ on a less frequent basis, the overall level of spend may be enhanced. This in an intuitive outcome of lower office attendance, and it may mitigate the impacts on the wider economy from the partial absence of white-collar workers.

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Future office design must offer something better than one's home, and must be worth the commute

The implications of increased homeworking on the take-up of offices is huge not only for the demand for floorspace, but in the design and layout of offices too. As maintaining social distancing remains crucial to all office occupiers, the desirability of the traditional open-plan office environment has lessened. Many occupiers are now reassessing the size, location and design of their central London offices to support their long-term business needs.

Whilst these changes are being seen across most sectors, emerging industries, and particularly the creative sector who rely on close collaboration, may be less tied to traditional office environment, or more willing to experiment with different spaces.

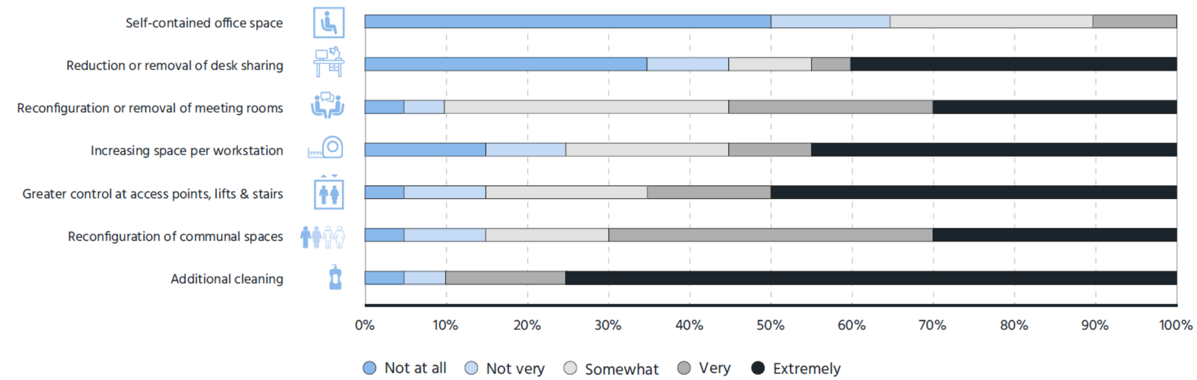
The ability for occupiers to control their office environment and have greater autonomy in the way spaces can be used will also be more important. Gerald Eve conducted a survey that found that the reconfiguration of communal spaces and greater control at access points were top priorities, reinforcing the benefit of flexible interiors that can be easily modified.

Offices have long been used as a recruitment tool. If the significant benefits to firms from in-person working do not trickle down to individuals, companies may have to work harder to encourage people to attend.

Employers, and their buildings, will now need to work harder to draw people back to the office, and to attract and retain talent. The office must offer something better than one's home, and must be worth the commute. This is especially the case as home office environments are improved by workers themselves, with investment in office chairs, computer screens and better lighting.

Furthermore, the emerging office sectors, that were expanding most quickly before COVID-19, were those that arguably place highest value on in-person contact. More menial tasks in other white collar sectors may be more likely to be performed effectively from home. There is evidence suggesting that top-class, high quality products are still in demand. This 'flight to quality' is also being accelerated in the performance of buildings, with good ventilation, light and sustainability key factors for occupiers, and their staff. Linked to this, offices must support and enhance people's wellbeing, with mental health, and workplace loneliness rising up the agenda.

Office buildings which already offer this level of quality are likely to continue to be in demand, but decent quality stock that is adaptable to these new needs will also see a faster recovery of rental values. The reconfiguration of older and heritage buildings, and particularly those in conservation areas which dominate the West End, will be much more challenging.



Responses to the survey question 'How important are the following building criteria to your return to the office?' (Source: Gerald Eve Occupier Survey, June 2020b)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Changes expectations around office design principles and longer term implications

Post-COVID-19 preferences	Detail	Longer-term implications
Volume & light	Promotion of wellbeing is an increasingly important consideration post-COVID-19.	Planning and design considerations.
Air circulation capacity & natural ventilation	Buildings with appropriate ventilation will have better air quality and lower associated liabilities.	Improvement of existing HVAC systems and natural airflow to incorporate new safety measures.
Generous receptions, cores & circulation areas	Enables staff to move around offices more freely and retain social distancing measures.	Features integrated into future fitouts and developments.
Multiple exits	Enables people to keep to social distancing measures as they can exit the building easily and safely.	Designated exit points if a building has multiple tenants.
Self-contained units / ground & 1st floors	Occupier will have autonomy over their space, preventing cross contamination and not using lifts will reduce chance of the virus spread.	Lower floors could attract a rental premium due to exclusive entrances with ease of access becoming paramount consideration for occupiers.
Flexible layouts	Capacity to easily change office layouts to accommodate changing occupier preference.	Interiors could shift to accommodate a more modular type of structure, allowing for quick renovations.
Multiple stair core / generous lift capacity	Allows easing of the vertical transfer of employees throughout the building while adhering to social distancing.	Planning and design considerations to incorporate increased capacity of stairwells and lifts.
Wellness criteria	Multiple companies are reporting that improving employee wellness is vital to staff satisfaction.	Push to include and expand wellness amenities and culture within office premises.
Demised terraces	Self-contained outdoor space as additional area, improving wellness criteria and air circulation.	Planning and design considerations.
Cycling amenities incl. showers	TfL expanding cycling infrastructure coupled with restrictions and risk associated with tube journeys, increasing number of cycling journeys	Fitouts required to increase capacity and current developments may be amended to include additional cycling amenities. Offices close to cycle or scooter hire docking stations could prove more attractive.
Short term lease flexibility	With the expected future office environment constantly evolving, the ability to change lease terms and/or space requirements will be at the forefront of occupier's minds.	Strengthening of tenant position during lease negotiations. Traditional leases may shorten, have shorter break periods and rent-free periods move out.
Turnkey solutions / Cat A+	Fitted out space direct from landlords has been positively received by occupiers who no longer have the Capex to fit out space that they may only need for 2/3 years.	Both service office and landlords will need to re-double efforts to attract occupiers given the emergence of good quality tenant space post-COVID-19 that may offer similar short-term flexibility.
Zone 1 station hubs – lower "transport nodes"	Travel capacity constraints and social distancing associated risk means alternative travel is preferable.	Offices within 20-to-30-minute walk time from train stations may become increasingly in demand.
Intense building management programme	Can coordinate to keep employees safe and reduce associated liabilities.	Continued active asset management for landlords.
Smart building tech	Construct analysis on employee density in real time. Internal building measurements and automated response to improve internal conditions.	Incorporation of smart tech in buildings and consequent improvement of smart infrastructure. Acceleration of the use and adoption of Internet of Things within real estate.

Declining preferences
Tower floors – 1960s stock particularly
Comfort cooling
Hot desking & collaboration lounges
Communal atriums / terraces / amenities
Cluster 'hot spots' & pinch points
Brand / image / profile of lesser importance

(Source: Gerald Eve, 2020a)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

A reduction in worker presence may not fully translate into a net reduction in floorspace

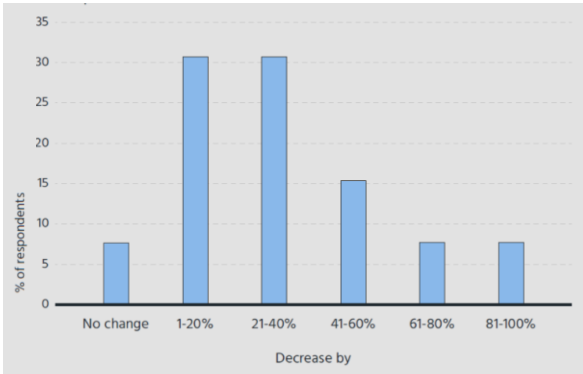
Some consolidation or rationalisation of floorspace appears inevitable for many employers. An occupier study by Gerald Eve found that around three in ten imagined their space requirements would fall by up to 20% in the second half of 2020, and a further three in ten thought they would see a decrease in requirement of 40% (a similar study for the GLA found broadly similar numbers).

However, the combination of the flight to quality, changing preferences in office layout and design (see previous page), and employees coordinating their visits on certain days of the week, will be lower densities, with greater space per worker, and more use of agile areas and large break-out spaces. In terms of occupational design densities, pre-COVID-19 the trend had been to reduce the ratio of worker per floorspace, from typically 1:10 (1 person per 10 sqm) to 1:8 and in some cases 1:6, this trend is set to reverse again, back to the 1:10 ratio, as social distancing remains a common behaviour. Respondents with lower shared desk allocations reported more focus on increasing space per workstation, meaning occupiers will need to remove desks to accommodate a lower employment density, thereby reducing their employee footprint in the office, even at full capacity. Perversely, this could mean smaller businesses may actually take slightly larger office space than previously.

Whilst it will provide some mitigation, is not yet clear whether the trend towards lower density offices will entirely counter-balance the drop in capacity brought about by the trend towards homeworking in terms of spatial requirements. Similarly, it is possible that with any fall in rents as supply increases, businesses who were previously unable to afford to locate in the CAZ, may be tempted to occupy now-vacated offices.

In terms of what uses or sectors could backfill vacated office space (whether short or ever longer term) it is hard to predict. In recent years pre-COVID-19, the London market has been propped up by co-working and serviced office operators, contributing as much as 20% of annual take-up to include both prime and secondary grade - but despite the demand for ready-fitted space, the appetite for more space from this sector has (for now at least) nearly all evaporated. The recent re-purposing of department store retail along Oxford Street is set to deliver a quantum of large floorplate office stock into the market (for example Debenhams delivering 64,000 sq ft at Henrietta Street W1) though it is unclear what demand may exist to absorb this.

We may see an uptick in more centrally located demand for last-mile e-commerce/ logistics for example. In other ideas, some of the landed estates (such as The Crown Estate, for example) have looked at converting certain poorer performing assets into high quality cycle stores and shower amenities, as a means to help attract employees back into the workplace where their existing offices cannot provide for this.



Responses to the survey question 'How do you expect your office space requirements to change in the second half of 2020?' (Source: Gerald Eve Occupier Survey, June 2020b)

1:8

Indicative ratio of workers in typical office: sqm, pre-COVID-19

1:10

Indicative ratio of workers in typical office: sqm, post-COVID-19

Source: Gerald Eve (2020a)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Areas with newer, higher quality stock will be more insulated against market shocks

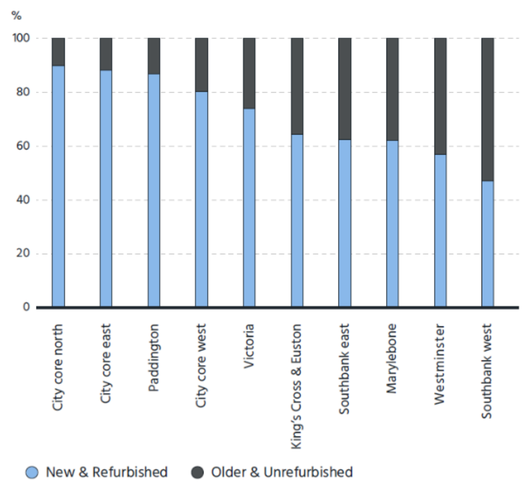
Demand is likely to be strongest in areas with newer office stock, in buildings which can better accommodate social distancing and post-COVID-19 preferences. These areas include the City, Canary Wharf, Paddington and Victoria, where proportionately, office stock is of a better quality. We may also see the refurbishment of poorer quality office stock, particularly in the Riparian South area, to serve the expectations for higher quality accommodation. New competition for the CAZ is also appearing in areas of regeneration and transport upgrades such as new, high-quality office buildings around Stratford in east London.

These hot spot locations are identified as benefiting from the theme of the new commute and there is noticeable ripple effect towards the outer areas of the central London office market. This could further push the consideration of smaller hub offices in outer locations used in tandem with a more central office HQ.

The West End market has naturally been more diverse in recent years, with the smaller premises often encouraging emerging enterprises. This diversity has made the area a little more resilient to change.

High rise buildings

There is a question as to whether the current aversion to older high rise buildings will persist in the light of a fear of future pandemics. From a developer perspective, high rise buildings have been difficult to justify financially. Tenants have also been lukewarm, with the views from lower buildings being equally good in many areas of the CAZ. A reduction in the number of high rise buildings being brought forward may impact upon overall capacity, and in turn upon planning considerations (see Chapter 12).



Proportion of office stock by submarket and quality (Source: CoStar; Gerald Eve, 2020a)

The Stratford Opportunity

Stratford has been the focus of significant regeneration activity associated with the 2012 Summer Olympics. The Queen Elizabeth Park now plays host to a broad and compelling mix of uses, occupiers and activity. Former Olympic venues have been joined by business districts, new residential neighbourhoods, schools, universities and globally significant cultural institutions such as the V&A, UCL, and BBC.

International Quarter London, a joint venture between Lendlease and LCR is set to deliver 4m sq ft of new office space across a 22-acre site by the mid 2020s.

Site Area / acres	22
New Homes	333
Grade A Office Space / sq ft	4,000,000
People	25,000
Retail Space / sq ft	58,000
Fresh Air in Workplaces / %	100%
Parkland / acres	560
Rail Lines	9
Gross Development Value / £	£2.4bn

(Source: International Quarter London, 2021)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

Ease and safety of commuting as a key real-estate driver

The rental profiles of prime buildings in good locations are also likely to be more insulated against downside risks than their secondary counterparts. If indeed occupiers are looking to re-locate, it is possible that they will leave either the CAZ itself, or London altogether. The GLA survey (2020h) found that of the eight in ten businesses looking to downsize, just 9% say they will leave the CAZ, and a further 7% will leave London altogether.

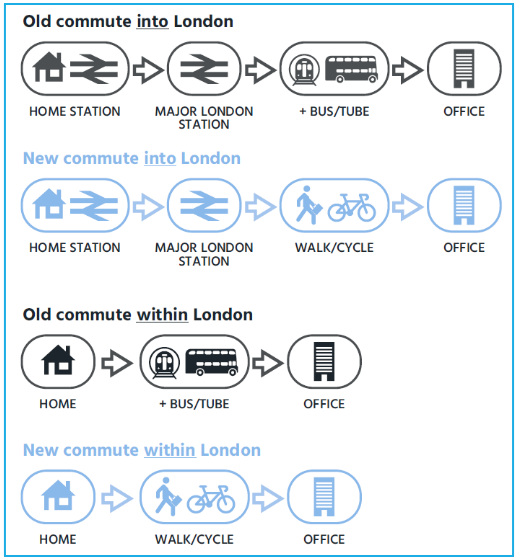
In the GLA survey in September 2020, more than half of CAZ-based businesses suggested that employees' perception of safety on public transport was an barrier to office reoccupation. This is driving a shift in demand toward the major station hubs and peripheral locations, to avoid the transport interchange and making the last mile of the commute able to be undertaken by sustainable means. If it persists, this behaviour risks further impacting upon London Underground and central London buses ridership.

However, if they continue post-pandemic, revised travel arrangements, decreased public transport capacity and new commuter-friendly locations are likely to influence future occupational demand, supply, and pricing in the London office market. Under these circumstances winners outside the CAZ are therefore more likely to be areas which already benefit from a broad range of transport connections, or those which will be connected to the central area and Heathrow, by the Elizabeth Line when it opens. This might include areas such as Watford, Croydon, Borehamwood or Stratford, which, are all seeing increased preliminary interest recently.

The location of the office can play a large part in attracting and retaining top talent. The last decade has seen a centralisation of offices across all sectors, seeking new offices in central locations, close to arts, culture and entertainment offers. It is likely that in the long term when fears over public transport use dissipate, this trend will remain, especially within emerging and high profit sectors such as tech, life science, and 'knowledge cluster' occupiers.

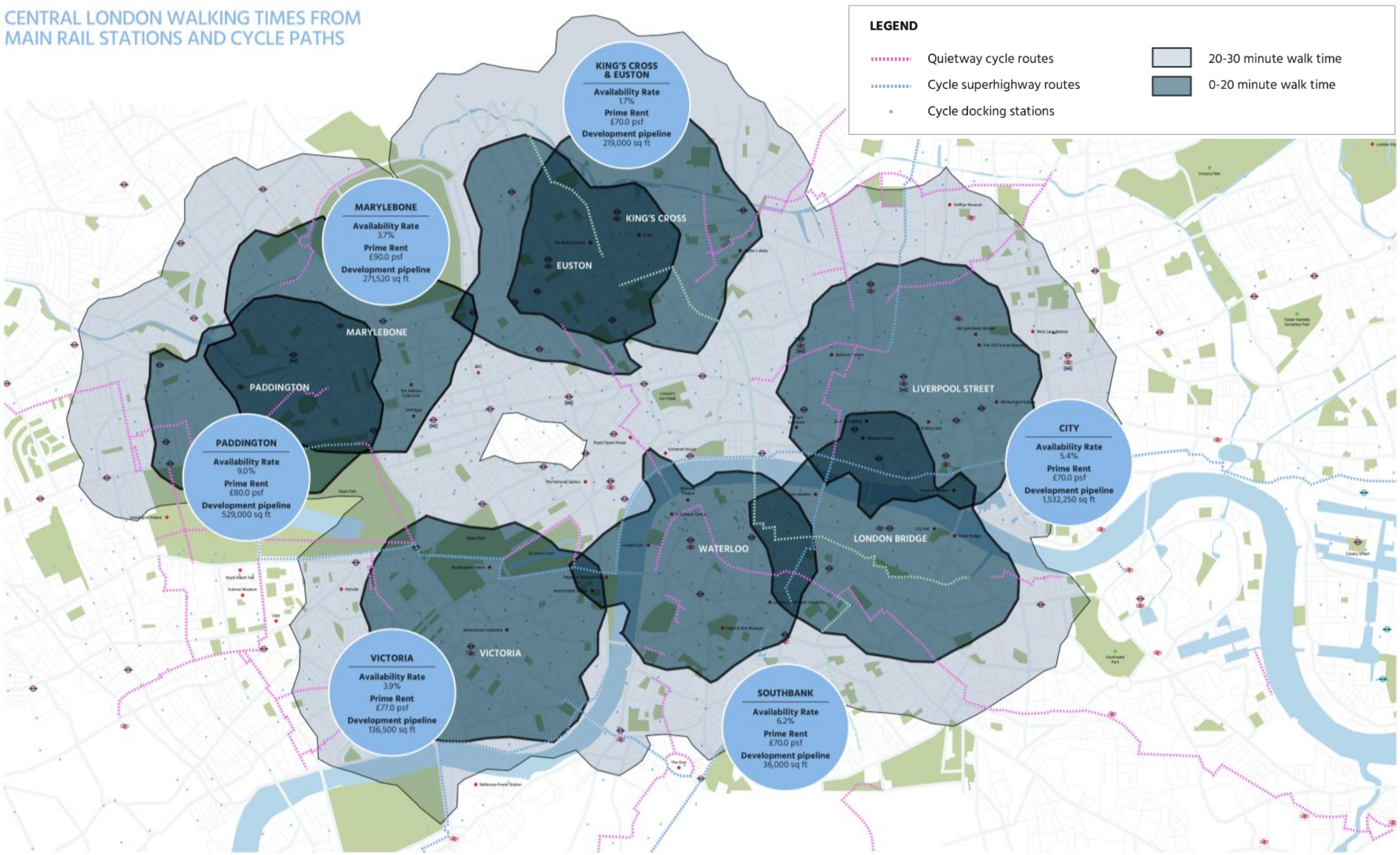
Within the CAZ, significant improvements are continuing to be made to cycling routes and pedestrian infrastructure to encourage active travel commuting to central London offices. Although cycling is still highly seasonal, this additional infrastructure could lead to a long term uplift in its popularity around London, and help with the CAZ's penetration of inner London, its key area of workforce capture. E-scooters trials are also due to begin in London in spring 2021. Accommodating these new methods of travel, for example by providing secure parking and changing/shower facilities, will become increasingly important to office occupiers.

It is possible that areas which are closest to higher density residential areas, and are therefore more suited to one-stop cycling or walking commutes, will benefit in terms of demand and stronger lease values, with occupiers wishing to offer their employees a safer and easier journey to work. The map on the following page, taken from Gerald Eve's Summer 2020 report, identifies these key areas the core and north of the City, Victoria, London Bridge, Southbank, Kings Cross & Euston and the area around the Paddington basin.



Indicative journey changes, pre and post pandemic, of workers from within London, and those who travel into London (Source: Gerald Eve, 2020a)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ



Central London walking times from main rail stations and cycle paths (Source: Gerald Eve, 2020a)

8. Office-occupiers will re-assess their needs, but will not abandon the CAZ

The future of the office

Beyond the immediate future, the office may evolve. The image on this page shows some ideas as to how things might change, to encourage people to return, and to guard against future pandemics. They are illustrative only. Employers are likely to place more emphasis on the office being a productive, collaborative space to work. To ensure inclusivity, regardless of location, the next generation of digital connectivity is likely to be included in all working environments. Collaborative spaces that include audio-visual facilities, from displays to more immersive technologies that can create mixed realities, can be strategically distributed across floorplans. The space for employees may be larger, to allow for collaboration, and in case of a legacy of social distancing.

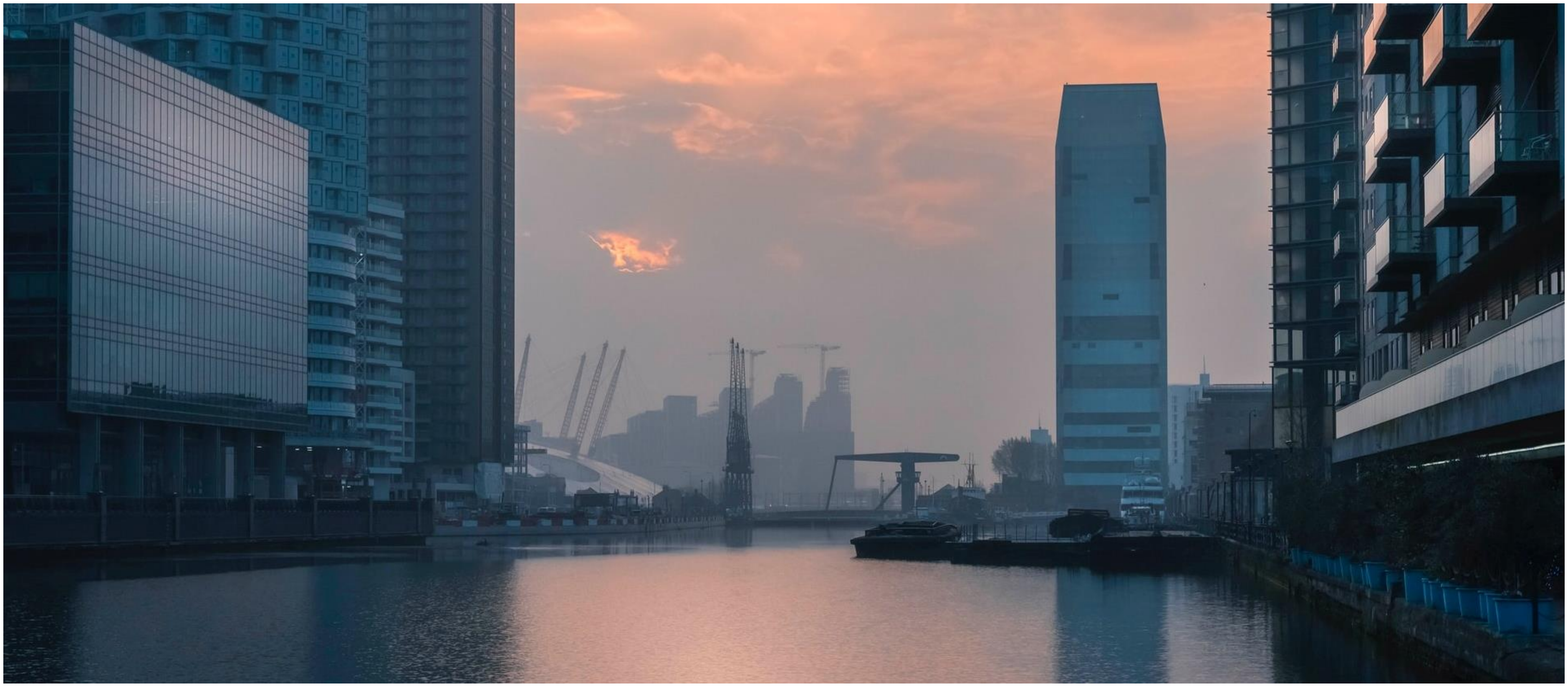
Additional changing facilities encourage employees to access offices by active modes of transport, and shared outdoor spaces can allow for collaboration in different settings.

Sensors and data can be used to control occupancy and inform building operations, from cleaning routines to rapid response to anomalies. Anti-microbial materials and contactless access also help create spaces and behaviours that will make offices more prepared for future outbreaks. Finally, multiplying vertical connections in high-rise buildings and giving more prominence to stairs can help reduce reliance on lifts.

Ensuring that this ‘future office’ continues to attract workers in to collaborate and network is essential to the continued successful functioning of the CAZ ecosystem. As has been suggested elsewhere in this report, there is a risk that we enter a vicious circle in terms of agglomeration, with fewer people using the CAZ meaning less agglomeration meaning fewer people and reduced spending. What London must do in order to attract people into the CAZ for work, and other purposes, will be explored in the final report for this study.

An imagining of a possible future office
(Source: Arup, 2020d)

9. Brexit remains a key challenge, but London is a difficult hub to replace in terms of financial services



Unsplash: Siddhant Kumar

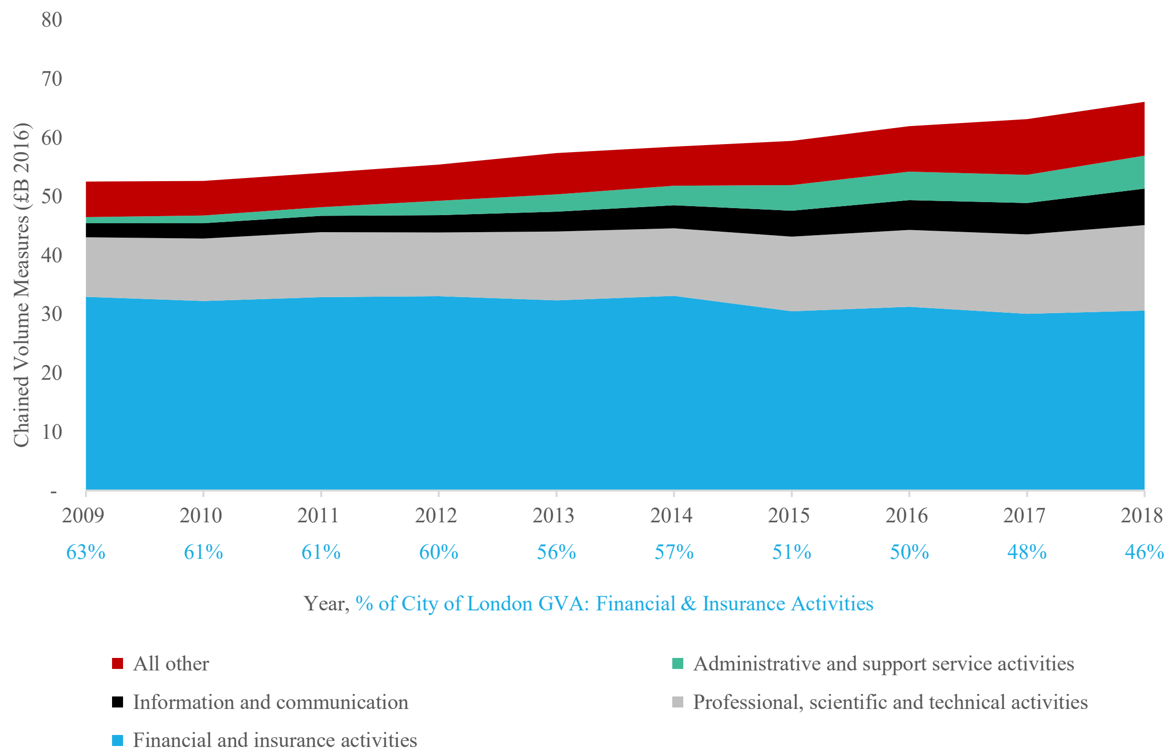
9. Brexit remains a key challenge, but London is a difficult hub to replace in terms of financial services

The financial services industry was declining as a proportion of the City's economy before Brexit and COVID-19

Financial services made up 7% of the UK's (and almost 50% of London's) economy in 2018 (Parliament: House of Commons, 2019). In combination with insurance activities financial services has made up around half of the City's total gross value added (GVA) (constant, £2016) for the past two decades and prior.

The industry's GVA declined by 16% relative to the total GVA of the City between its peak of 63% in 2009 to 46% in 2018. This trend in financial and insurance activities is driven by growth of other sectors in the City and of the City's GVA in general, but also by a 7% absolute decline in the industry's GVA (ONS, 2019). The owners of Canary Wharf have attempted to diversify the range of tenants in that location in the last few years (FT, 2021a).

Despite this, the financial services industry continues to dominate the City's and NIoD's economy; the next closest sector in the City, in terms of GVA is professional, scientific, and technical activities (which includes professional services, advertising, and scientific research) at around 22% by City GVA share in 2018 (ibid.).



City of London Gross Value Added by Sector, CVM (£ Billion, 2016); GVA(B), Balanced gross value added – balanced measure combining gross value added income, GVA(I), and gross value added production, GVA(P) (Source: ONS, 2020j; Arup analysis; Data published in December 2019 for NUTS1 regions)

9. Brexit remains a key challenge, but London is a difficult hub to replace in terms of financial services

The impact of Brexit on financial services

Post-referendum (June 2016 to December 2020)

The success of the British financial industry is driven by many factors, including the UK's legal system, labour regulations, language, and – formerly – EU membership (CAGE & McMahon, 2017). Membership had many advantages for financial services providers, including free movement of people (access to a larger skilled labour pool) and passporting rights (servicing in all EU countries without separate licences). Since 2016, the threat of losing these and other advantages has led many providers to begin to look elsewhere in Europe, moving capital and jobs away from the City and NIoD in particular.

By October 2020, over 7,500 financial services jobs and £1.2tn assets had moved out of London since the 2016 referendum (EY, 2020). EU-member banking lobbyists speculate that this trend will continue in the next two years, as more jobs and assets leave London for the European market (FT, 2020).

Christmas Eve Deal (December 2020)

Under the EU-UK Trade and Cooperation Agreement, the UK leaves the Single Market and Customs Union and can begin setting its own standards, while still allowing zero-tariff, zero-quota trade with the EU.

The inclusion of financial services in the deal is limited, affirming a commitment to establish a framework for regulatory corporation but not setting out the framework itself (UK Government, 2020). The key issue at stake for the financial services industry is the recognition of regulatory equivalence[1] (European Commission, 2021), which will determine UK providers' degree of access to EU markets. As outlined in the December agreement, Memorandum of Understanding (MoU) covering the financial services industry will be negotiated separately, with a deadline of March 2021 (UK Government, 2020).

Providers of ancillary services (part of the second highest value industry group in the City) have lost pan-European recognition of professional qualifications and must now ensure that their qualifications are recognised individually by each EU state in which their work is carried out.

Post-Brexit (January 2021)

Until March 2021 at the earliest, uncertainty will continue to surround the future of EU-third-party financial services regulation, but some UK losses to the EU are unlikely to be regained. Few details concerning the financial services MoU are yet available, but full access to EU markets (passporting) is perhaps not an achievable outcome.

Prospects for future deals

The EU has much to gain from bolstering its own financial capitals and little incentive to enter into a deal in an area in which the UK specialises. EU member states have incentivised financial services firms to move jobs, capital, and headquarters to their own financial centres, which indicates that ensuring the UK's continued free access to EU markets might not be a priority.

Post-Brexit, opportunities are open to the financial services industry in the City and NIoD for deals with non-EU countries. The UK has already agreed a Services Mobility Agreement with Switzerland in December 2020, which came into force on the 1st of January 2021 and allows limited cross-border services activities (Department for International Trade, 2020)[2]. However some new arrangements run the risk of impeding prospect of regulatory equivalence with the EU, like allowing the trading of Swiss stocks (FT, 2021b).

[1] Regulatory Equivalence: that the financial services regulations of a third party state are equivalent to those of the EU (European Commission, 2021)
[2] Trade deals have also been agreed with 60 other non-EU states; agreements with (Canada, Mexico, and Jordan) are signed but not yet in effect. (Department for International Trade, 2021)

9. Brexit remains a key challenge, but London is a difficult hub to replace in terms of financial services

FDI may decline, but London will still attract investment

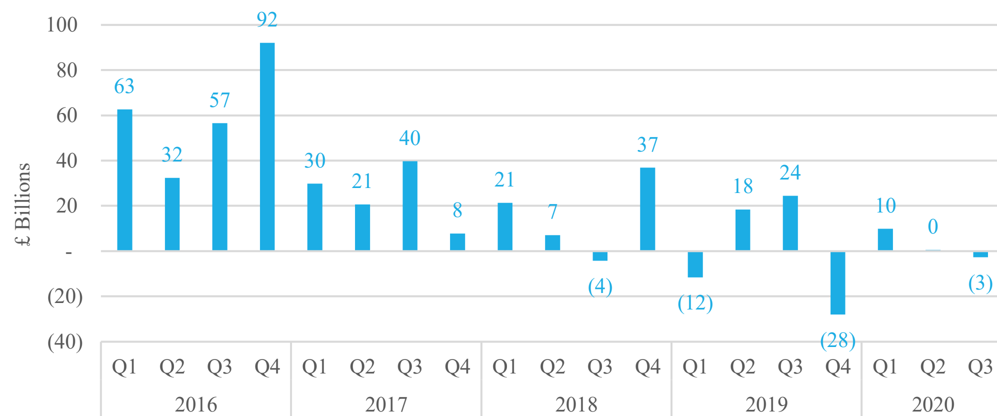
London attracted around half the total FDI of the UK total in 2019, and 69% of UK foreign direct investments in digital (EY, 2020), and is the foremost global city for inward investment. This investment was worth over $100bn and helped create 200,000 jobs in the preceding decade (Deloitte, 2019).

The UK's inward-FDI growth rate has declined since the Brexit referendum in June 2016, but has remained positive, "in all but four quarters between Q1 2017 and Q3 2020" (Parliament: House of Commons, 2020). As a share of GDP, inward-flowing FDI value declined from 10% to 2% between 2016 and 2019; however, FDI value in 2016 was disproportionately high, with positive growth against GDP seen between 2015 and 2019 (ibid.). The UK fell behind the Netherlands and Germany in 2018, and the Netherlands and Ireland in 2019, to the third highest value of inward-FDI – in 2016 and 2017, it was ranked first (ibid.). ONS data suggests that FDI has dropped off substantially in 2020 because of COVID-19; however, this appears to be in line with global trends (see chart opposite).

Despite Brexit and the pandemic, London remains a world leader in FDI. Around 50% of total (and two-thirds of digital tech sector) FDI flowing into the UK is secured by London; the city attracted more than 2.25k FDI projects between the Autumns of 2014 and 2019 and pulls in more FDI than any other in the world (FDI Intelligence, 2020). London & Partners reported that tech firms based in the city raised more in capital investment in 2020 than any other city in Europe – around £8 billion (2021).

In October 2020, UK FDI was projected to fall by almost 40% (UCL, 2020), but London could still remain resilient, possibly widening the already significant gap between the city and the rest of the country. Since the referendum, "London has attracted 249 greenfield investments in financial services — more than Paris, Frankfurt and Luxembourg combined" (FDI Intelligence, 2021). Some 56% of inward UK FDI stock came from the EU in 2019 – London should continue looking outward to strengthen its position.

The issue of reputation might be slightly longer lived. The UK's own political stability has historically been a major factor in FDI decisions, and the political uncertainty of Brexit has led to a decrease in UK's FDI attractiveness rankings (Kearny, 2020). This suggests that it is essential that the Mayor and central government work together on repairing the damage done by COVID-19, and Brexit.



Quarterly FDI Inflows, 2016-2020 (Source: ONS Balance of Payments via Parliament Briefing Paper, 2020l) UK Economic Accounts time series (UKEA)

9. Brexit remains a key challenge, but London is a difficult hub to replace in terms of financial services

London is a difficult hub to replace or replicate, and may not have a single European rival

Will the London be replaced as Europe's financial capital?

After the Brexit referendum, many projected an exodus of financial services providers (and capital) from London; while this has been smaller than some feared, activity continues to leave the City. Nevertheless, the first full day of trading in 2021 after the Brexit trade deal saw almost six billion Euro of trading leave the City for EU member markets (FT, 2021b).

Further, without guaranteed freedom of movement, EU citizens could rethink taking positions in London as post-Brexit hinderances increase. The City has, like the CAZ, attracted a lot of European talent and its less competitive post-Brexit status could disrupt this. The reduction in the volume of financial transactions, the movement of key financial services firms and headquarters and the exodus of skills and talent would lead to a fall in economic activity in the CAZ with wider implications for other services which were associated with the strength of the financial services industry, creating an indirect and induced impact on economic activity.

However, London is a difficult hub to replace in terms of size and competitiveness. Such wide-ranging process of replacement would be a slow one for such a large market, especially one located in a city with strong cultural and social significance. It is possible that there is no 'one natural replacement' for London as Europe's financial capital, which could become more decentralised into specialised hubs across multiple cities. It could be argued that cities such as New York or Chicago could gain relatively and absolutely; by contrast un-settled environments elsewhere could play in London's favour, for example the situation in Hong Kong, could benefit London in terms of business and people. Indeed the City of London Corporation remains optimistic about growth, citing development proposals exceeding pre-pandemic levels (City of London, 2020). The City is looking at opportunities for diversification of its economy, which would provide growth to replace lost business, and make it more resilient to future crises (City of London, Oliver Wyman and Arup 2020). The diversity of uses in the West End suggests that it may bounce back more quickly from COVID-19; this diversification approach has already been taken in recent years in Canary Wharf (FT, 2021a).

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

Unsplash: Daria Shevtsova

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

The CAZ's draw as a place to locate is likely to persist after COVID-19

Why do businesses locate in the CAZ?

The CAZ is an expensive area, so why are firms and workers willing and able to pay to locate there? From an urban economics perspective there are two answers to this – either agglomeration increases productivity or it provides benefits, such as amenities, which make firms and workers willing to pay a premium to locate there. Both factors are important and will continue to be so.

Agglomeration benefits

A large body of evidence suggests that economic density provides significant, but modest, economic benefits to firms and workers. These agglomeration economies were formalised by Alfred Marshall (1890) and there are three forms:

- Matching of specialised customers and suppliers. Location in an area of economic mass provides access to specialised customers or suppliers. This provides an incentive to specialise, increasing productivity for firms. In London, this helps explain the historic tendency of law firms or specialised accountancy firms to locate near financial firms.
- Labour pooling. Firms benefit agglomeration as they have a wider potential set of workers they can employ; workers benefit as they have more employers with whom they might be better matched. This provides an incentive for workers to upgrade their skills, as they know there are more potential markets for these specialised skills; firms can upgrade the skills they use, upgrading production processes to respond to the greater availability of specialised skills.
- Knowledge spillovers. Workers learn from co-location in dense urban agglomerations like London, with this 'learning effect' increasing productivity for workers particularly in the early stages of their career. Jacobs (1961) suggested that cities allow unplanned interactions, and that this serendipity increased productivity. Marshall's studies of industrial districts suggested that local innovation was caused by these knowledge spillovers as: "The mysteries of the trade become no mysteries; but are as it were in the air" (Marshall, 1890).

These benefits mean that firms with strong access to economic mass are more productive, even when accounting for the sectoral composition and skills of the workforce. But while there are effects, they are not large. In one UK study, Rice et al. (2006) show that once controlling for occupation and sector, "A doubling the population of working age proximate to an area is associated with a 3.5% increase in productivity in the area".

As we have explained earlier, the economic costs of working from home also come from the reduced access to density (or economic mass): workers have fewer interactions, fewer new business connections and fewer opportunities to develop their business and social capital both within and outside their organisations. There is little hard evidence yet on how home-working may affect productivity, and the impact may be markedly different across sectors.

One reason the CAZ matters is that agglomeration economies are often very highly localised. While labour pooling is likely to operate at the level of the travel to work area (i.e. there are benefits from locating in the wider South East).

In the US advertising industry, benefits of agglomeration fall away within around 750 metres (Arzaghi and Henderson, 2008). Evidence using the construction and later demolition from the Berlin Wall suggests benefits of agglomeration only extend for around ten minutes of travel (Ahfeldt et al., 2015). There are even studies which show there are agglomeration effects within large office buildings, with benefits of being located near similar firms (Liu, Rosenthal, and Strange, 2020). This desire for proximity has driven the high concentration of businesses in the CAZ, delivering an economic mass, and prices, that are unmatched in the UK.

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

London's agglomeration economy relies on both tradeable and non-tradeable sectors

Types of agglomeration economy

The interactions between different parts of the CAZ are important. Agglomeration economies as outlined above come in two basic forms: localisation economies, which arise from having more of a particular industry in a particular place, or urbanisation economies, which come about from having multiple industries in the same place. Both are likely to be at work in the case of the CAZ, but urbanisation economies are probably larger and more significant for the service industries in which London is specialised (Graham, 2009).

Tradeable and non-tradable sectors

There will also be significant demand relationships between different sectors. One way of thinking about this is to consider the distinction between tradeable sectors and non-tradeable sectors. Tradeable sectors are those which can be performed in one place and consumed elsewhere (i.e. they are not consumed at the point of contact). Many of London's most successful sectors are tradeable – such as finance, consulting, insurance, and so on. The other part of the economy is non-tradeable sectors such as healthcare, hospitality, food, and physical retail. These sectors must be performed at the point of consumption – it is not possible to have a haircut at a distance. There is a slightly fuzzy boundary between these two types of industry. But it is useful because while London's economic dynamism comes from the tradeable part of the economy in which it is generally possible to achieve larger economies of scale, many of London's jobs for less well-educated workers are in non-tradeables. For example, estimates suggest that each ten new jobs in high-technology industry in a UK local labour market creates another seven non-tradeable jobs, most of which go to less well-educated workers (Lee and Clarke, 2019). In short, many of the service jobs in London are reliant on skilled workers in tradeable parts of the economy.

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

The longest lasting impact of COVID-19 may be the experiment of working from home

Speeding up structural change

Over the long-term, we can think about COVID-19 as leading to a significant shock to this agglomeration model. The question is what will persist *after* the immediate crisis. In general, recessions are seen as speeding up structural change; phenomena which were happening before happen more rapidly.

Florida et al., (2020) argue that there will be four main effects of the crisis on cities:

- Social scarring – where the pandemic means individuals are less willing to live and work in proximity to others. Given the likelihood of widespread vaccination and the clear evidence that individuals, even under lockdown, have a clear demand for in-person contact and interpersonal interaction, this is likely to be a minor concern.
- Need to secure the urban built environment against COVID-19 / future shocks –
- Changes to urban form to accommodate social distancing – e.g. the introduction of new cycle lanes.
- Forced experiment of the lockdown – in allowing the trial of new technologies such as remote working / working from home.

Of these, the latter effect is probably most significant and the most likely to linger. In particular, while remote working software has been around for some time (Skype dates from 2002) the forced experiment of the lockdown has led to the adoption of complementary technologies (such as ways of working) and broader social acceptance of these technologies. This is likely to be the longest-term impact of the crisis.

There is likely to be increased use of remote working technologies in part because these are combinatorial innovations which require other changes in business processes or advances in other forms of technology, such as greater bandwidth, to become widespread. However, it is far from clear that widespread adoption of remote working will lessen the economic significance of agglomerations like London – it is more likely that it will change the tasks which are performed in the CAZ.

A flexible and adaptable workforce

It must also be noted that London is generally a resilient place with skilled workers who are able to adapt what they do to the changing economy. We know that these skills in adaptability and flexibility are the most important determinant of long term economic success (Glaeser, 2005), yet an economy can only achieve this with some flexibility which allows new sectors and firms to develop and replace the old ones.

The OECD estimates that more than half of workers in London are amenable to working from home (OECD, 2020). While studies have shown the impact of working from home on productivity to be negligible for some occupations (Bloom et al., 2015), studies have tended to be for voluntary rather than forced movements away from home. Employment which is self-contained and skilled-routine, such as patent examination (see Choudhury et al., 2019), is more likely to be successful in working from home than parts of the economy which are based on non-routine cognitive work which is reliant on the tacit knowledge which is most easily transmitted through in-person communication.

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

The effect of dispersal leads eventually to a desire for more in-person contact

"You ever wonder why Silicon Valley even exists? I have always wondered, why do these people all live and work in that location? They have all this insane technology; why don't they all just spread out wherever they want to be and connect with their devices?"

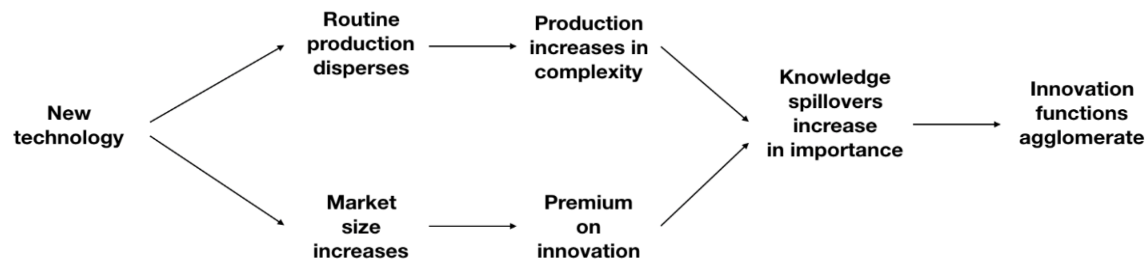
Jerry Seinfeld, quoted in New York Times (2020)

A virtual agglomeration?

Another way of looking at the long-term impact of the shock, and potential shift of COVID-19, is to consider the impact of past technologies, such as the internet. Venables and Storper (2004) suggest a double effect from past rounds of infrastructure improvement, of which remote working software can be considered one. The first effect is to allow economic activity to spread out geographically. Each successive improvement in infrastructure or communications technology, ranging from the boat, the aeroplane, the telephone, or the internet, has allowed economic activity to spread geographically. The internet, for example, makes it easier to do business across the world. These technologies promise that home working will continue becoming more convenient and that the negative impacts on mental health and productivity may be mitigated.

Yet this first effect of dispersal leads to a second effect - it increases the complexity of activities. Cities with skilled workforces and headquarter functions benefit from knowledge sharing and become command-and-control points of the economy, including London's CAZ. However, this does not necessarily mean that the need for in-person meetings drastically decreases. Studies show that in-person communication leads to higher compliance to arrangements (Roghanizad & Bohns, 2017), suggesting that meetings with high importance may stay physical for the foreseeable future. Remote working may actually strengthen London's advantages, as the city will provide the location for the in-person interactions which are necessary to sustain complex remote production networks.

There are three other reasons which suggest that London will remain important. Firstly, remote working is unlikely to be a clear substitute for the benefits of in-person. This is particularly the case for learning, which is especially crucial for workers developing their careers, and tacit knowledge – the importance of 'being there' for economic outcomes. Secondly the shared experience of an office, or company culture is also something that is distinctly degraded when working from home. Lastly, remote communication is a complement to personal relationships which are best developed through in-person contact (Rosenthal and Strange, 2020). This suggests that the CAZ's characteristics as the centre of the UK's transport network will still be an asset going forward.



Leamer and Storper's (2004) model of new communications technologies

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

Opportunities for wider labour market capture

The theory of travel time budgets

Workers in central London spend longer time commuting, with an average travel-to-work time of 54 minutes, compared with a figure of 36 minutes in outer London, and 30 minutes in Great Britain as a whole (DfT, 2019a). This can partly be explained by the more lucrative opportunities in the CAZ. As such, central London's labour market capture pre-COVID-19 was the largest in the UK, and one of the largest in the world.

The theory of travel time budgets (Zahavi, 1974) suggests that individuals have an assigned allowance for travel time. This means that if workers commute less often, they will be prepared to travel for longer when they do so.

A wider central London labour market

This brings forward the prospect of less frequent, ultra long distance commutes, of over two hours, that would have been out-of-the-question if done every day, but are palatable if they only happen for a handful of days each week. This applies to every location, but because the UK's transport network is focussed on the CAZ, the central area stands to gain the most jobs for its labour market. In practice, it is likely to be limited to office workers, who tend to be more willing to travel further, and who receive the largest premiums on their wages for working in London.

White-collar employees based in much of the South West, Midlands, and East Anglia, would be able to consider basing their career in the CAZ. These jobs are likely to be higher paid than those found locally, and the price of a season ticket appears to be outweighed by the central London premium for almost all areas of the UK (ONS, 2020d and National Rail, 2021). This move to more productive jobs would provide a boost to the local economy in the new dormitory towns (which would be somewhat offset by the lack of footfall in previous working locations), and to the UK overall.

Likewise, employers located in the CAZ would gain more applicants for jobs, have a better choice of candidates, and would find it easier to recruit. Over time, however, this wider labour market may erode the central London premiums that are paid to workers.

There is a further, though likely to be less widespread, opportunity for occasional office-based working to widen London's international labour market capture. With the largest airport system in the world, there is the opportunity for London to attract an increased number of commuters that spend part of their week in overseas home locations. This can be further strengthened through the opening of the Elizabeth Line in 2022, which will provide easy and quick access between central London and London Heathrow Airport.

~£10,000

Amount by which annual London wage exceeds that of north west England for professional occupations

~£40,000

Amount by which annual London wage exceeds that of north west England for management occupations

~£8,000

Approximate cost of annual rail season ticket between London and north west England

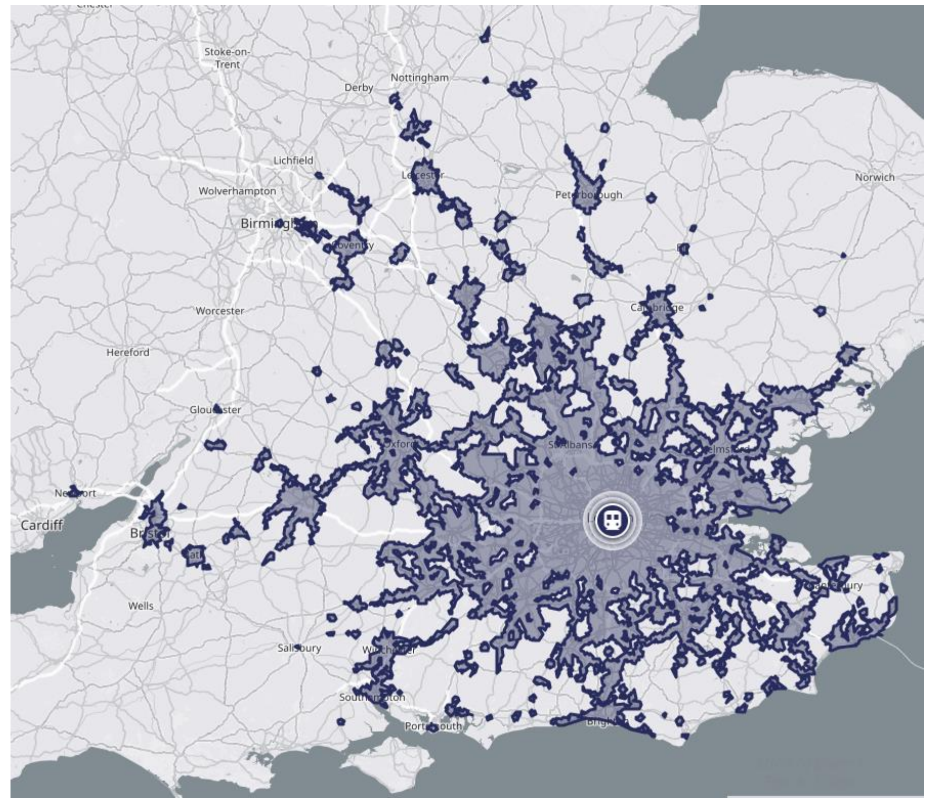
Sources: ONS (2019d), National Rail (2021)

10. The CAZ labour pool may increase, and agglomeration will continue to play a role

There are opportunities for a wider London labour market capture from less frequent office attendance, the Elizabeth Line and HS2

The planned rail upgrades in the next few years suggest that the reach of the CAZ could extend further. The full opening of the Elizabeth Line in 2022, coupled with the new trains and electrification of the Great Western rail line, will bring much of western England, as well as Cardiff and Swansea, within around two hours of the West End, the City and Canary Wharf.

HS2, which is due to open in stages from 2029, will bring much of Birmingham and the midlands within a similar time period. This suggests that London's travel to work area, already the largest in the UK, has the potential to expand significantly, bringing a larger number of individual white-collar workers, travelling longer distances, albeit less frequently, into the CAZ. Experience on HS1 suggests that more commuters have been attracted to London, and home building has been stimulated (Steer, 2019).



Parts of south Wales, the west country, Birmingham, and the midlands are already within 2 hours of Oxford Circus (Source: TravelTime map, 2020)

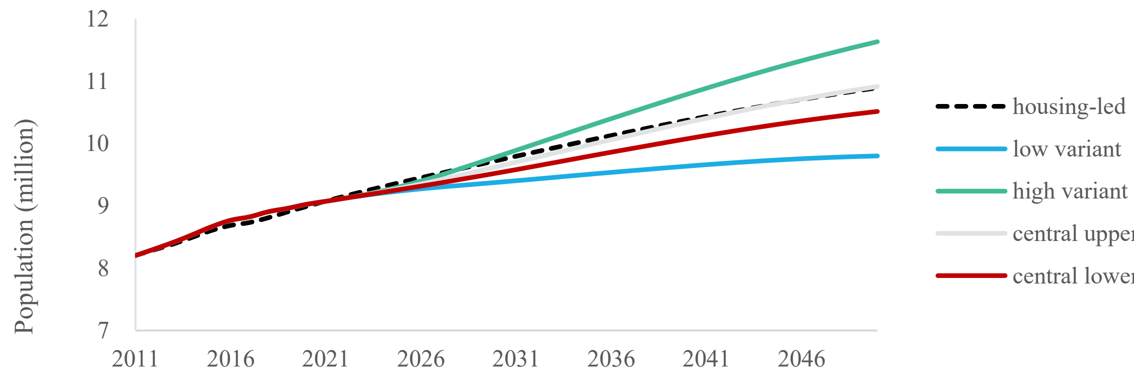
10. The CAZ labour pool may increase, and agglomeration will continue to play a role

The population of London is expected to help drive growth in inner London in the longer-term

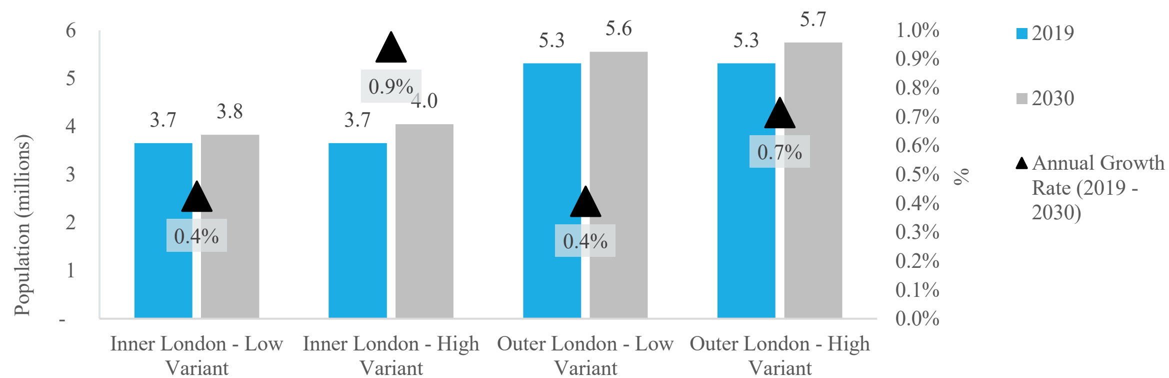
The population of London was at an all time high before the pandemic. Despite reports of recent mass out-migration (FT, 2021c), with one recent estimate suggests that London's migrant workforce has fallen by 700,000 people during the pandemic (O'Connor and Portes, 2021), the GLA expects growth to continue in the long run, albeit at a slightly slower rate than in previous decades. The most optimistic variant predicts the London population, which stands at 9 million today, will reach almost 10 million by 2031 and more than 11.5 million by 2050; and the lowest variant predicts the population to reach 9.3 million by 2031 and 9.8 million by 2050.

With inner London growing faster than outer London, this is expected to concentrate economic growth on the areas surrounding the CAZ in the next decades. In a lower scenario, inner London's population is expected to grow by 100,000 – the equivalent of a large town - and reach 3.8m by 2030.

In all scenarios, the bulk of this population growth is due to declining birth rates and increasing death rates, but migration plays a key role in attracting working age migrants, particularly to London, and so a dip in in-migration below the GLA's projections (from Brexit, or elsewhere) threatens further expansion. Many of the influencing factors are uncertain. The reported 700,000 UK-wide loss of population during the pandemic, for example, may be partly recompensed in future by the new visa available to many Hong Kong residents, which could bring 300,000 people to the UK over the next 5 years (BBC, 2021), many of whom will choose to work, or live in London.



Greater London Population Forecast, 2020-2050 (base year = 2019) (Source: Greater London Authority (2020g) Population and Household Projections)



Greater London Population Forecast and Annual (Compound) Growth Rate, 2019 vs 2030 (Source: Greater London Authority (2020g) Population and Household Projections))

The future of the workplace

Automation is likely to affect employment in retail, hospitality and entertainment, but will create new jobs in emerging industries

Digitalisation

2020 saw an unprecedented and unforeseen change in the way work is conducted and organisations managed to adopt major innovations in a matter of weeks. Zoom and Microsoft Teams saw the largest yearly increase in downloads in the UK in 2020 (ProActive, 2020) – two pieces of software which were almost unknown to the public less then a year previously. COVID-19 has led to a several-years-leap in digitalisation, organisations were forced to fast forward their digital pathways and accommodate new work practices.

Changes in demand of skills

The CAZ has a high proportion of highly skilled workers (IES, 2020). In fact, 68% are in managerial, professional or technical professions, higher than in Outer London (50%) and the UK (48%) (ONSi, 2020).

This is expected to increase as there is a rise in demand for highly-skilled, knowledge-intensive labour, while primary sectors are experiencing a decline. The fastest growing sectors in London are head office services, tech, consultancies, sports activities, amusement and recreation, real estate, and security and investigation activities, most of which are concentrated in central London (Centre for London, 2020c). Looking forward, automation, AI and other technological advancements are likely to continue to contribute to this shift and will change the labour market and the skills that employers look for (Centre for Cities, 2018). This has been further amplified by COVID-19.

Jobs in emerging industries

Automation and the digitalisation of work will change the structure of the workforce, as lower skilled and manual labour will be put at risk. One in five jobs across Great Britain is in an occupation that is likely to disappear due to automation, technological advancements alongside globalisation and demographic changes. Cities located outside of the South East of England have a higher risk of losing jobs to automation (Centre for Cities, 2018). Although big cities are less exposed to job losses, there will still be major disruptions across labour markets. London is estimated to see 16.1% of its jobs decrease in demand (ibid), which is by comparison to other areas a lot less, but still equates to a large number of job losses. Specifically, retail, administrative, customer service, and elementary storage jobs are the most vulnerable occupations (ibid). This will change the labour market within the CAZ with certain jobs disappearing, while other sectors, such as hospitality, head office services, tech and so on can expect to get a larger workforce (Centre for London, 2020c).

London has a high concentration of tech companies focusing on AI, and double the size of Berlin and Paris combined (CognitionX, 2018). It is a fast growing sector and London has quickly become recognised as the AI growth capital of Europe (ibid). This is due to:

- London's start-up environment and ecosystem, which is supported by people's skills, support, and the wider community;
- The large demand for AI in London contributing to its competitiveness;
- The existing research and education on AI in London.

Similarly the city has seen a huge increase in the number of jobs in the 'green economy'. London's low carbon and environmental goods and services sector (sometimes known as the 'green economy') was worth £48 billion in 2019/20, up from £24 billion in 2010/11 (kMatrix for GLA, 2020). In 2019/20 London's green economy employed 317,000 people in 14,000 businesses (ibid.).

These are sectors that are already well established and growing fast in London and the CAZ. How places adapt to this shift can impact where people choose to live. The cities where the shift to automation has been more successful can easily attract more people.

Nevertheless, this shift will have major policy implications and policies and measures will need to support people and places to enable them to adapt.

The future of the workplace

Home working interfaces will develop, but a step-change is unlikely in the next decade

The CAZ has a high proportion of highly skilled workers, which is expected to increase

Automation and other technological advancements will put jobs across the UK at risk, which has been amplified by COVID-19

Although London is less at risk, automation will still decrease demand for jobs by 16.1%

London is well-placed due to well-established and fast growing sectors in tech, head office services, consultancies

The future of remote working

It is expected that working from home will be more common following the pandemic with many workers taking the opportunity to have more leisure time, prompting a better work-life balance for Londoners. Around three-quarters of businesses across the UK have stated that they will continue with remote working after COVID-19. However, working from home can be stressful and contribute to burnout and a lack of motivation for some (Arup, 2020c).

Businesses will still want to attract people to test ideas, drive innovation and connect with employees and the wider workforce. They will need to put in efforts to attract them (Arup, 2020b). And there will still be a need for in-person meetings (see Chapter 10).

Home working hardware and software

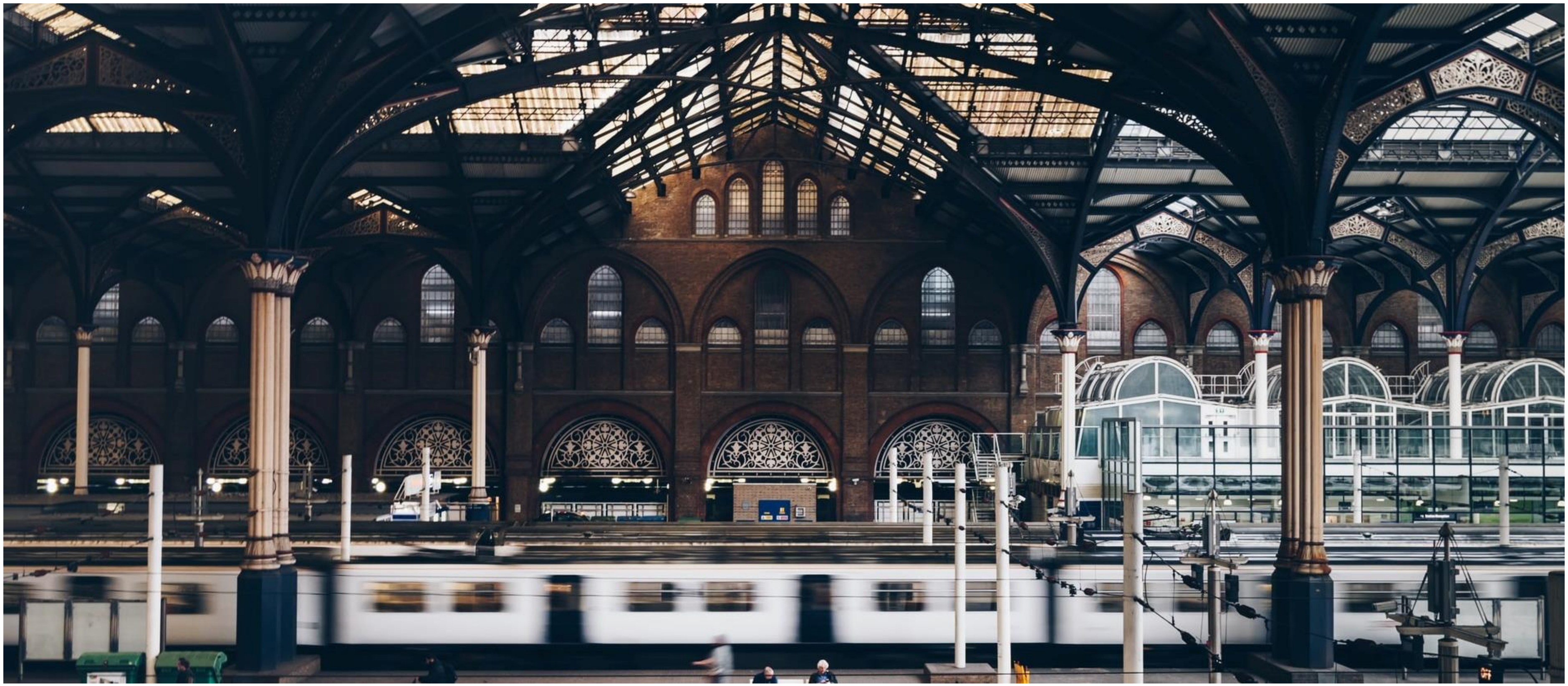
Arup Foresight's predictions (Arup Foresight, 2017) show the Top 20 emerging technologies which may disrupt their market in the next decades. Among others, they suggest that the next 10 years will see the spreading commercialisation of Bluetooth 5.0 and 5G mobile internet (both provide more efficient and reliable mobile connectivity), blockchain (fraud-proof network) and mixed reality (integration of digital information into a real-world environment, allowing live interaction and feedback).

Taken together, these technologies suggest that home working will continue becoming more convenient. They also appear evolutionary rather than revolutionary - with the exception of mixed reality, which would have to become advanced, widely adopted and culturally embedded to offer a step-change in how we work in the next decade. Whilst lag times may reduce, all of this points to a development of existing home working practises, rather than a full change, which in turn points towards in-person meetings still offering an advantage.

Autonomous and electrified vehicles

Electric vehicles are likely to become standard over the next decade. These could have a mixed impact on the CAZ, whilst helping with air quality, if left unmanaged they could lead to a rise in congestion (as the operating costs are much lower than traditionally powered vehicles). Opinions differ on the maturity of autonomous vehicles, and whether fully self-driven cars will appear on our roads in the 2020s, 2030s or beyond. If they are to be widely deployed, they may lead to a further increase in CAZ congestion (as they will effectively lower the price of a taxi and remove the need for parking spaces for private vehicles). They may also offer a step-up to out-of-town business parks, and other suburban office locations as they allow passengers to work whilst travelling to the office.

11. Fewer commuters to the CAZ creates a challenge, relative to its global rivals



Unsplash: Ugur Akdemir

11. Fewer commuters to the CAZ creates a challenge, relative to its global rivals

There is a longer-term opportunity to drive more CAZ footfall through a greater residential population

Compared with London, New York and Paris have a much denser population within their central areas, and shorter travel distances overall, meaning that approximately 3x more people live within a short walk or cycle of their centre.

A permanent shift to home working therefore risks impact more substantially on CAZ footfall than in central areas in these global cities, both because of the first order impacts from working at home, and the second order impacts from a reduced number of people willing to make a journey into the CAZ from their home location after work. Looking towards the long term, future increases in the CAZ's residential population, in line with or even exceeding Mayoral and government plans, would partly mitigate this, and continue the pre-COVID-19 trends.

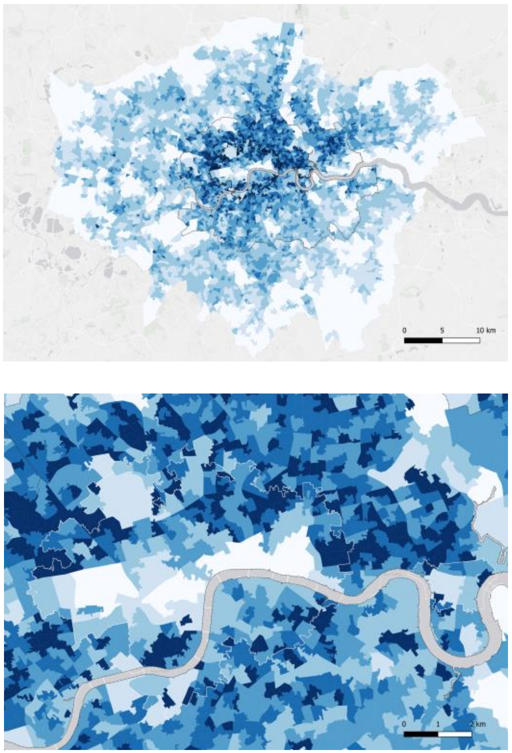
London's cycle route network is currently concentrated on the CAZ. The travel distances involved suggest that the CAZ is well-placed to benefit from a growth in travel in active modes such as cycles and e-scooters, if licensed, especially given the CAZ's key dependency on middle-distance trips from inner London.

In order to encourage greater footfall in the CAZ, it is imperative that the CAZ is a more attractive location so that office workers and others will want to visit. Longer term, there is a case for significantly increasing CAZ residential populations in line with the Publication London Plan (2020b) and the December 2020 government statement on housing need.

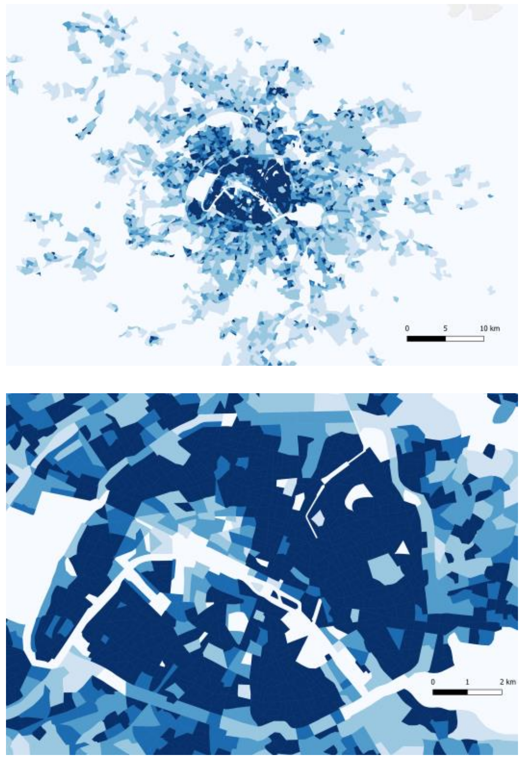
Unsplash: Clay LeConey

11. Fewer commuters to the CAZ creates a challenge, relative to its global rivals

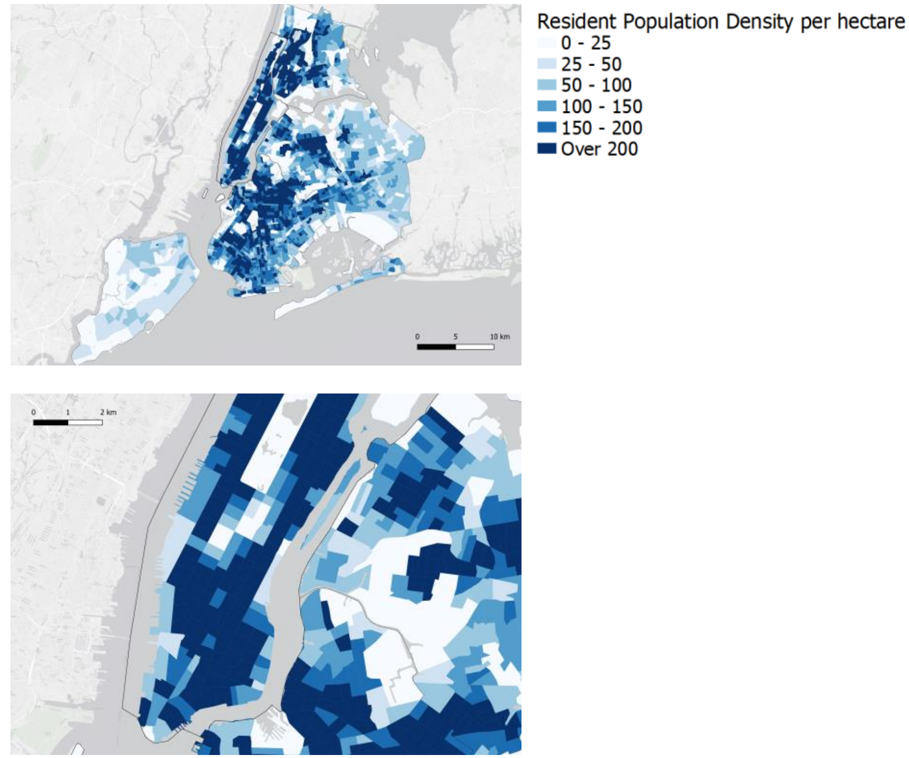
The CAZ is less densely populated than central Paris and lower Manhattan



Population density in London and the CAZ (Source: ONS, Population Estimates, 2019 and LSOA shapefiles from the London Data Store to calculate the surface for each LSOA)



Population density in Ile de France and central Paris ISource: NSEE, 2017, and IRIS shapefile from the IGN Institut de l'information geographique et forestiere to calculate the surface for each IRIS)



Population density in New York and lower Manhattan (Source: US Census Bureau, 2019 ACT 5-year estimates and census tract shapefile from US census bureau to calculate the surface of each census tract)

11. Fewer commuters to the CAZ creates a challenge, relative to its global rivals

The CAZ's walking and short cycle catchment is smaller than that in central Paris and New York

~45,000 residents live within 1.25km / 15 minute walk of Trafalgar Square

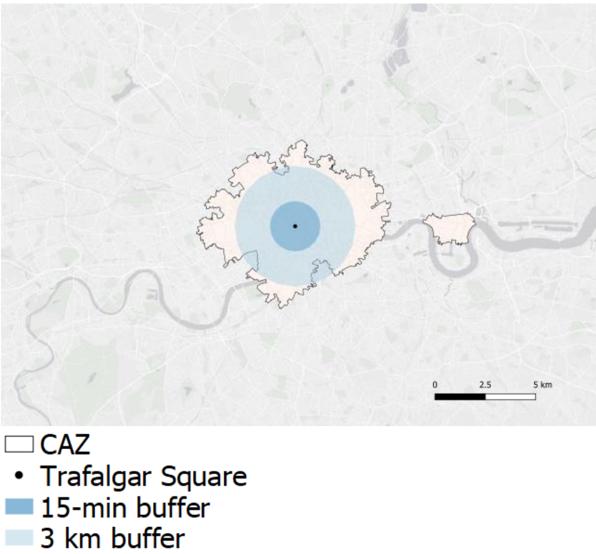
~355,000 residents live within 3km of Trafalgar Square

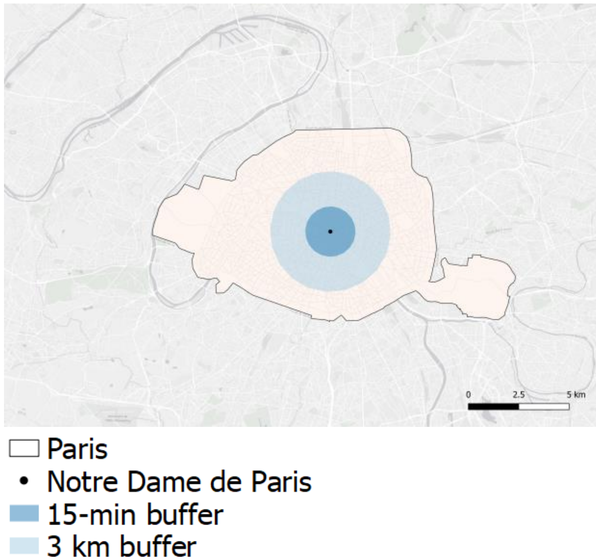
~120,000 residents live within 1.25km / 15 minute walk of Notre Dame de Paris

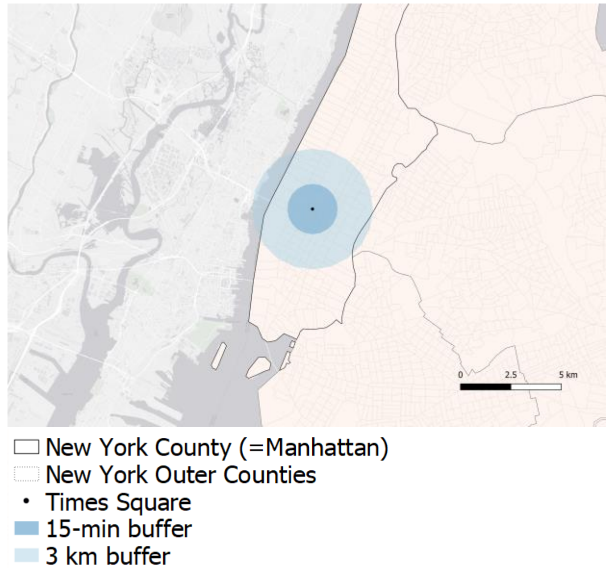
~700,000 residents live within 3km of Notre Dame de Paris

~140,000 residents live within 1.25km / 15 minute walk of Times Square

~600,000 residents live within 3km of Times Square







London, Paris and New York 15-min walking (1.25km) and cycling catchment areas (3km) (Sources: ONS, Population Estimates, 2019; INSEE, 2017; US Census Bureau, ACT 5-year, 2019)

12. Opportunities for change in the CAZ and across London

Unsplash: John Cameron

12. Opportunities for change in the CAZ and across London

Strengthening active travel networks with inner London, and the move to a truly polycentric city

The focus of physical and human networks

The CAZ is the centre of London's infrastructure network, with road, rail, underground, bus, and human networks converging on the central area. This facilitates the vast exchange of people, goods and ideas between the centre and the suburbs. The CAZ is reliant on the rest of London for a supply of labour, goods and food, and for the majority of its international connectivity through its airports.

Because of this, the CAZ is also the epicentre of the most extensive human networks. The places that people meet, attend conferences, mix socially, and the (often chartered) institutions that support business networks are also focussed on the CAZ.

The special relationship with inner London

The CAZ is incredibly dependent on the rest of London for workers: 436,000 people from the rest of London commute into Westminster alone. Of those employed in the CAZ, around two-fifths live in the CAZ or inner London. Just under one-third live in outer London. And the remaining on-quarter live outside of London (ONS Census, 2011).

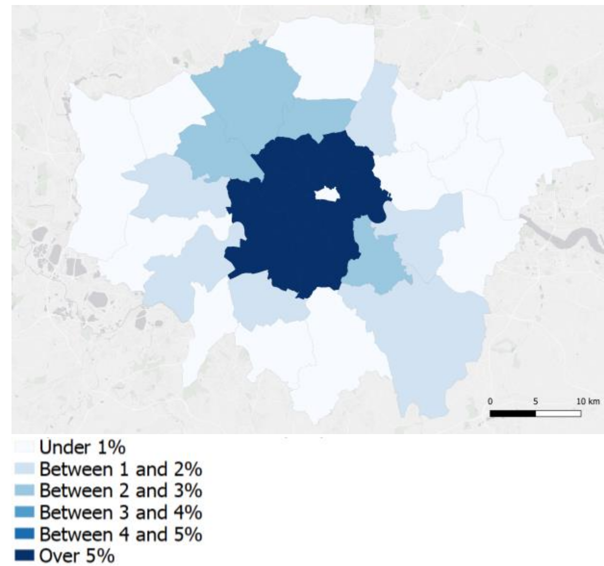
This access to labour is aided by the higher frequencies and faster journey times of the radial links compared with orbital ones (with the exception of part of the London Overground network), the more financially rewarding jobs in the CAZ, and the retail and leisure opportunities as detailed on previous pages. These travel distances of a few miles present an opportunity to draw inner London visitors into the CAZ through active modes, if social distancing conventions remain.

Inner London is important for leisure, culture and entertainment. CAZ visitors are also more likely to live in inner London. Almost two-thirds of visitors to CAZ are Londoners (TfL, 2020b), whose residence is concentrated in inner London.

The opportunity of a polycentric city

The CAZ is the beating heart of London's global city, and is complemented by the distinct offers of the satellites and the significant flows between them. There is an opportunity to build on this in future through improving the links between the suburban locations themselves to create a truly polycentric city. With a new paradigm of work, there is a real opportunity to create supporting centres, in both inner and outer London, each with their own identity and specialisation.

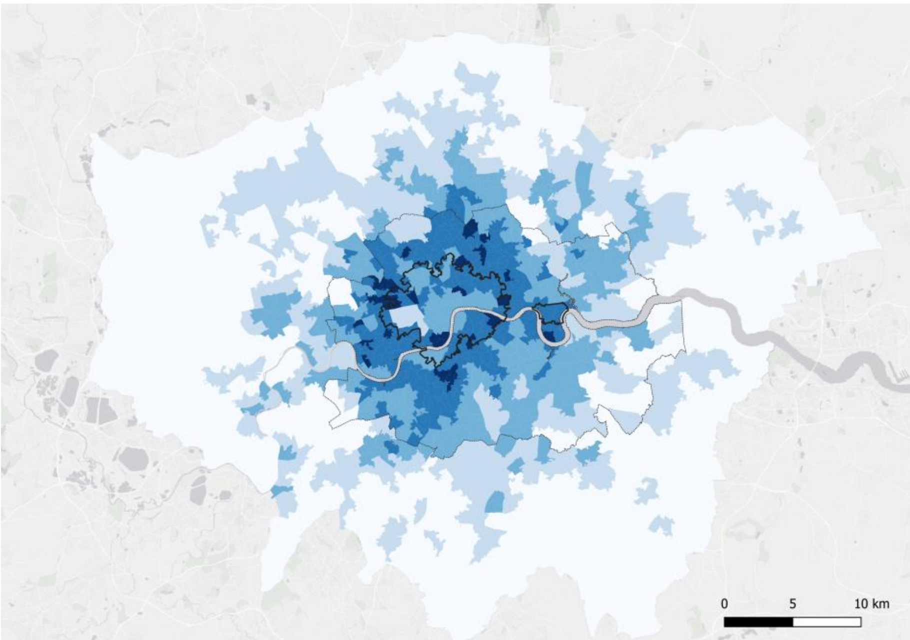
If significant home working remains, there is possibility of increased leisure spend overall, through demand for getting out of the house from home workers. This creates opportunities for increased demand for hospitality, arts and entertainment closer to home. Inner London retail, food, and hospitality sectors thus stand to gain most from a significant, longer term move to home working, and outer London may also benefit.



Proportion of total central London non-work discretionary trips (Source: TfL 2020b) The home locations of discretionary non-work trips to the CAZ are concentrated in inner London boroughs

12. Opportunities for change in the CAZ and across London

Satellite offices may be more viable in outer London and beyond



CAZ
Inner London
Number of residents being CAZ workers by hectare
0 - 5
5 - 10
10 - 25
25 - 50
Over 50

Home location density of the CAZ workforce* (Source: ONS, Census, 2011, WU02EW - Location of usual residence and place of work by age ,MSOA level) *The estimated CAZ workforce being people working in the MSOAs that are at least 1% within the CAZ boundary.

The location of CAZ workers, potentially calls into question the commercial viability of satellite office spaces. For inner London workers, the difference in commute times between the CAZ and their local office may be minimal, and the benefits of a visit to a central CAZ office (in terms of meeting colleagues, clients and suppliers) are significantly higher.

Firms may also encourage workers to visit the central office, so that they benefit from the agglomeration of knowledge, learning opportunities, mentoring and leadership. Satellite offices may be more feasible in outer London, or the rest of the south east, but the volumes may be lower, and the radial nature of London's public transport networks may make it difficult to deliver sustainably and cost-effectively.

12. Opportunities for change in the CAZ and across London

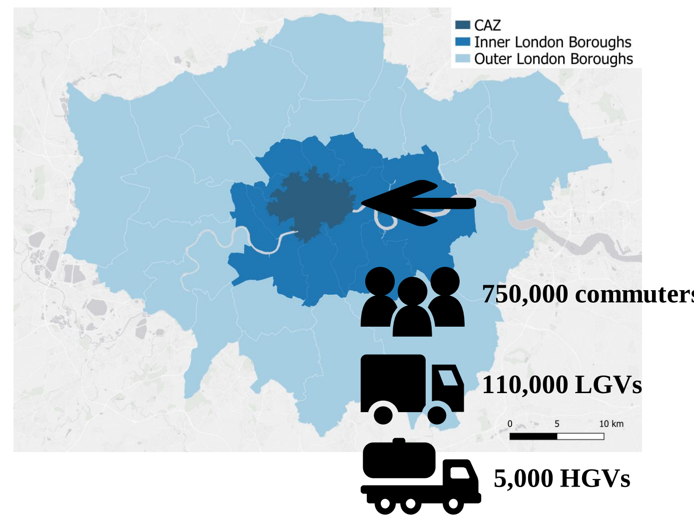
Freight flows between the CAZ and the rest of London are substantial

Flows of goods and strategic industrial land (SIL)

Growth in office space can be a significant driver of good vehicle movements. Freight and goods flows include those of food, laundry, components and other deliveries. Movements are from industrial parks, manufacturing sites and consolidation centres outside of the CAZ. In 2016, almost two-thirds of freight movements that were destinated for the City began their trip within Greater London, itself totally over 15,000 goods vehicle movements every day. Only remaining 4% comes from the rest of the UK (City of London, 2017).

The Park Royal estate, the largest strategic industrial land in London, itself has around 1,700 businesses that employ 43,100 employees, with the vast majority of its customers elsewhere in London. As "London's kitchen and workshop" (GLA, 2014b) Park Royal supplies restaurants, hotels, retail outlets, and others in the CAZ. Park Royal is also an important entrance point to the CAZ for wholesalers that import products from the UK and overseas for warehousing and sending onto consumers. Park Royal itself covers 500 hectares, and together with London's other industrial areas, such as London Riverside, provides 18% of London's employment outside of the CAZ (GLA, 2015).

The CAZ's hotels and restaurants are also dependent on other wholesalers, such as New Covent Garden Market in Nine Elms, which singlehandedly supplies 40% of the fruit and vegetables eaten outside the home in London. Part of the attraction of London's industrial areas are their links to the rest of the world through London's major airports. The CAZ relies on the proximity of these airports to serve the business and leisure markets, and attract inward foreign direct investment (FDI) (see Chapter 9), and maintaining these links, and strengthening them through the Elizabeth line is key to recovery.



Approximate daily flows into the CAZ from the rest of London
Commuters based on flows into City, Westminster, Canary Wharf. Freight flows estimated based on percent of City freight flows that originate in Greater London (Sources: GLA, 2014a; City of London, 2017; TfL, 2019)

12. Opportunities for change in the CAZ and across London

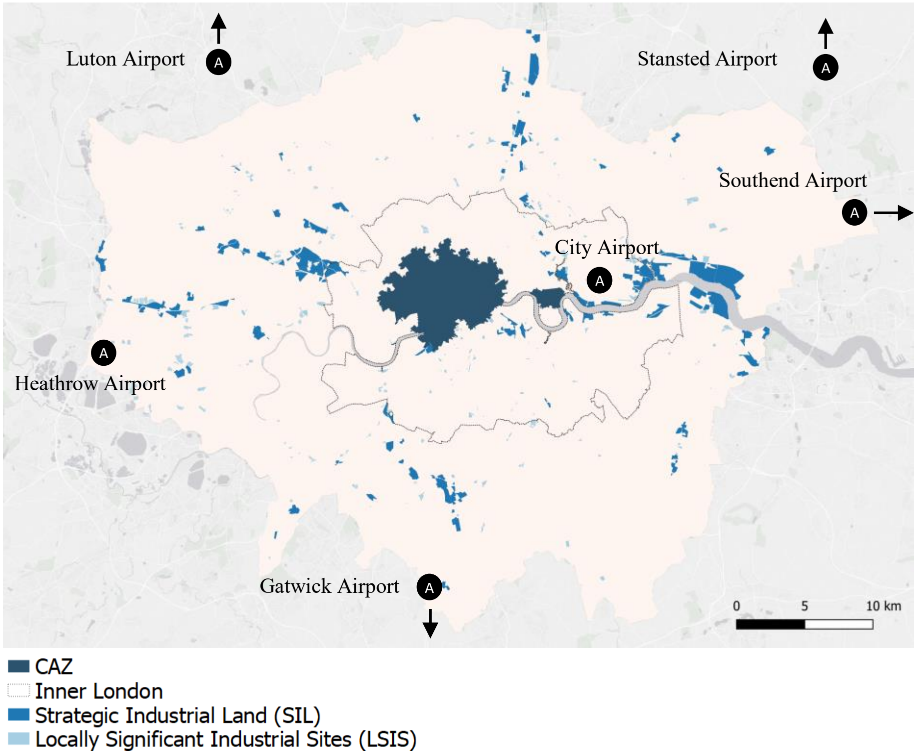
The CAZ relies on outer London and beyond for connections to the largest airport system in the world

Airports

Heathrow itself is one of the largest single-site employers in Europe, with over 76,000 people working on site pre-pandemic. Together with Gatwick, Stansted, City, Luton, and Southend, it provides the CAZ, and the rest of London with the busiest airport system in the world, providing 180m passenger journeys in 2019, and perhaps the best international connectivity of any airport system. Over 70% of Heathrow's terminating passengers either originated from or were destined for the rest of London in 2019 (CAA, 2019). Airport catchment may only differ slightly under an increased, sustained working from home scenario.

Tourism

Although the majority of tourist spending occurs within the CAZ boundaries, there are substantial tourist flows between inner and outer London. 70% of all international Airbnb guests stay in TfL Zones 2 – 3, and areas outside of the CAZ also have a high proportion of serviced accommodation. Notably, Europeans are generally more likely to stay in and explore areas beyond central London (London First, 2019), suggesting that early returners may be more likely to spread the tourist offer further beyond the CAZ. Short haul travel is more flexible and expected to recover more quickly.



Location of SIL, LSIS and airports (Source: London datastore for SIL and LSIS spatial data, 2020)
The CAZ is within easy reach of London's Strategic Industrial Land, Locally Significant Industrial Sites and Airports (spatial data for SIL and LSIS from the London Data Store)

12. Opportunities for change in the CAZ and across London

Alongside COVID-19 and Brexit, the planning system is also undergoing change

This report illustrates that the economic future of the CAZ and the rest of London is uncertain. As will be explored further in Phase 2 of this study, a range of possible futures could take place. In this context, the planning system has a key role to play in facilitating or supporting preferred direction(s) of travel, as well as being a tool to help mitigate some of the negative impacts on Londoners and the built environment arising from economic change.

At the same time as Brexit and the COVID-19 pandemic have been occurring, the planning system has been undergoing significant change. Key changes include:

- The introduction of the new E Class (which combines some of the previous retail/night-time economy and commercial uses);
- Further de-regulation of the planning system through new permitted development rights (PDR) (including demolition and re-build of unused commercial premises for new homes); Government has also consulted on existing permitted development rights further;
- Publication of updated housing need numbers for England; and
- The proposed overhaul of the planning system as set out in the Planning for the Future White Paper, which could be in place by 2024.

Furthermore, the new London Plan will be adopted by February 2020. The interaction of the changes to the planning system will need to be considered in the context of post-COVID-19 recovery and the potential impacts this may have on planning for Good Growth in London.

Given the variety of possible futures for the CAZ, and London, it is not possible to identify those areas where planning policy (including the London Plan and Borough local plans) needs to be changed, other planning tools (such as Article 4 Directions or Local Development Orders) implemented, or collaboration/partnership arrangements that the planning system can facilitate better utilised to support Good Growth/preferred future for the capital through this Phase 1 work. Key considerations for the next phase of work include the following.

Future Development Needs

The preceding analysis indicates that COVID-19 could change the level of demand and spatial distribution of this demand for commercial uses (including office and retail) as well as potentially visitor accommodation, industrial uses, new homes and night-time economy uses. This could therefore change the overall demand for land across the Capital (both increase or decrease), demand for land suitable for different uses (the balance between land uses could change from current needs), as well as where new development takes place.

The potential change in demand for employment uses and how these are spatially distributed across the CAZ, inner and outer London, could also have implications for infrastructure provision across the capital.

Introduction of E Use Class

The introduction of the new E Use Class in September 2020 has rendered some the Publication London Plan and adopted local planning policies obsolete since planning permission is no longer required to move between retail/night-time economy and other commercial use classes.

Whilst all areas across the CAZ and inner/outer London will be affected by this change to a certain extent, within the CAZ, the area with the potential to be most significantly affected is the West End. Policies including those restricting change of use away from retail/night-time economy uses or seeking to protect specialist retail through Special Policy Areas are not able to operate in the way intended. Initial findings on the implications of this are that the protection once afforded by the planning system has been removed, and in the future there is likely to be a greater reliance on landowners using leases to ‘curate’ how their assets are used.

12. Opportunities for change in the CAZ and across London

Government is considering further changes to the planning system which could affect the CAZ

Further reform to Permitted Development Rights (PDR)

In December 2020 to January 2021, Government consulted on further changes to PDR. This includes change of use from Class E Commercial, Business and Service uses to Class C3 residential risks. Discussions with stakeholders have highlighted concerns about the introduction of the proposed PDR due to the potential unintended consequences, which could be far reaching, particularly for high streets and town centres.

Whilst the PDR is intended to address vacant premises, it could result in the loss of viable businesses in favour of new homes due to the higher land values commanded by residential uses. Such a trend was experienced across London when office to residential PDR was first introduced (Ramidus Consulting, 2017). The PDR could particularly affect the CAZ across its office, leisure and retail districts affecting its attractiveness for officer workers as well as domestic and international visitors.

12. Opportunities for change in the CAZ and across London

Key planning considerations for further exploration

As part of the next phase of work, it will be important to consider the temporal element of the study and how the tools and levers available through the planning system could be deployed through two-to-five-year horizon as well as the five-to-10-year horizon. Considerations may include:

- Whether a shift to a more polycentric city model/wider South East is likely and if so, whether key suburban nodes would be able to accommodate the resulting development. This would be both in terms of suitable land being made available and the infrastructure required to support it; with the latter potentially requiring smaller scale public or active travel links which are orbitally focussed rather than more fixed public transport routes which are radial in nature.
- Whether the current town centre hierarchy established in the Publication London Plan continues to reflect future retail trends. There may be a case for retail centres moving down the hierarchy and/or others moving up to reflect changing preferences to shop more locally.
- Linked to this, could changes (reduction) in demand for lower value offices and retail uses both within the CAZ and in inner/outer London result in decreasing rents, which make premises more attractive to new businesses or start-ups. This could have beneficial outcomes in rejuvenating some areas, whilst potentially ‘diluting’ the offer in other areas – particularly where more restrictive planning policies are no longer effective due to the introduction of the E Use Class (see p.114).
- The deliverability of current plans for Opportunity Areas, particularly where they are contingent on new transport investment and where the demand for this new infrastructure was predicated on travel on radial links into/through the CAZ.
- It is also possible to envisage a future where the form of office development within the CAZ (and potentially elsewhere) becomes lower rise to enable the built form to be more resilient to social distancing or other similar requirements.
- Whether we are likely to see a change in consumer preferences for new homes in terms of size, design (including access to light) and location of homes including access to amenities and open space. These factors could reduce the attractiveness of the CAZ as a place to live (or require the provision of more local retail/amenities), as well as resulting in changes in the form and density of new homes.
- In those office locations, which do not benefit from the ‘flight to quality’, whether there is a risk of substantial erosion of office stock through permitted development rights; as was since when they were introduced in 2015.
- Need for higher quality digital infrastructure within and outside of the CAZ. The Publication London Plan (Policy SI 6) focuses on the GLA’s expectations of developers for individual sites reflecting that with a privately regulated utility, the planning system is more constrained on the role it can take. Beyond the planning system, there may be opportunities for public sector organisations to take on a greater role in facilitating and/or delivering higher capacity systems.
- Should COVID-19 change how people move around within London (both mode and destinations), consideration may need to be given to the priority transport schemes identified in the Publication London Plan and whether in the short to medium term a shift in focus may be required to more active travel based, orbital schemes.

V. Conclusions

Conclusions

Summary of outlook

The impact of COVID-19 is severe, and is a threat not only to health and to the economy, but to the longer term survival of the CAZ. The pandemic period, and the aftermath, means that London, and Londoners, are suffering badly. Significant job losses have already taken place, and there are more to come in 2021 and 2022.

But beyond that, we suggest that the overall outlook is cautiously positive. Short term (the next two years) there may be an initial inertia and reluctance to commute back to the CAZ (for those who work in sectors or with employers where they have the choice to work from home) and, a possible rise in the popularity of satellite hubs. Beyond this time horizon, indications are that the appetite for the CAZ as a location could actually be strengthened over time. This is taking into account its labour market capture, its location for the in-person interactions which are necessary to sustain complex networks, and its role as the command-and-control point of the UK. In addition, the CAZ's labour pool may expand further in time, with the arrival of the Elizabeth Line and HS2, and as less frequent commutes from locations further from London become more palatable.

Early signs are for a 'flight to quality' in office space as employers seek to entice workers to return. As such, a return to the office for a sustained period of 3-4 days per week is feasible. In this lower attendance situation, the negative impact on the wider arts and culture, retail and hospitality economy of the CAZ may be mitigated through a broader range of less frequent visitors, who choose to save their retail and leisure spend for the days that they are in town. London may move away from being a market, which you come into for shopping, to being a playground.

Whilst there are immediate prospects for expansion of office accommodation in the rest of London, in the medium term (2-5 years) onwards, we see this as following the lead of the CAZ's revival, rather than taking its place. Given the proximity of the CAZ to its core labour force in inner London, satellite offices have more potential in outer London and beyond. When it comes to visitors and tourism, there is positive news in that inbound tourism is forecast to return to stronger levels in a few years' time, led by domestic and European travellers, although these upbeat projections are threatened by a continuation of travel restrictions, and the fear or reality of another pandemic. The outlook for retail is less positive, and there are challenging days ahead for the areas of the CAZ that depend on it. Furthermore, a host of policies from central and local government are required to enable the delivery of a future that works for residents, workers and visitors. The London Recovery Board is a welcome intervention in this space and has determined a clear agenda for London to deliver on.

Conclusions

A holistic vision for the CAZ

Yet, with optimism, this provides an opportunity to reimagine a vision for the CAZ in the context of the rest of London, so that it is an area that office workers and tourists will want to visit, and residents would want to live in. In turn, this may create a virtuous circle, and create significant agglomeration benefits. London can harness the creativity and innovation it is known for to diversify, revitalise and raise the productivity of the CAZ, and in turn the wider UK economy. This vision should take account of all the CAZ's functions.

There are real opportunities to reimagine the CAZ, to cater for a new generation of experiences, for a new and improved public realm, for lower congestion, inclusive growth, improved air quality, a strengthened cultural offer, and for attracting new types of residents, whilst preserving the existing diversity.

This vision will also be instrumental to achieving other policy aims such as tackling the climate and ecological emergencies, combatting inequality, and ensuring greater housing provision. Whilst no one institution has the responsibility to plan the vision for the CAZ, - indeed a partnership approach is essential - visionary leadership will be required to deliver long-term, effective change. This is a long term programme, and London's global rivals have already started to move. Although the pandemic continues to evolve, it is essential to plan for the future, now.

Look to what's next

The sciences, tech, consulting and hospitality were the fastest growing industries before COVID-19. To achieve sustainable growth, and ensure that there are businesses to replace those that may not survive, we should invest in entrepreneurial innovation, in these, and other industries. Diversification of businesses and organisations is key here, not only to act as different parts of the ecosystem, but to provide increased resilience to future shocks and stresses.

Take action now

Although this study covers the period from 2-5 years, and from 10-15 years hence, it is essential that action is taken now, and that we get off on the "right foot". The protections offered to the most at-risk sectors, the vaccination process, and other efforts to restore the in-person economy, need to take place quickly.

The years 2021 and 2022 are important for encouraging people back into town, establishing behavioural traits, and ensuring that London's unique and internationally significant arts and culture offer survives. With targeted interventions now, these hugely valuable industries can receive a much-needed boost, and help assist in London's, and the UK's recovery. Although the CAZ appeared to thrive following the last great economic challenge, this crisis is different, and there is a risk of complacency, or even the turning of a blind eye, given the policy agenda elsewhere. It is essential that the laudable levelling up agenda does not become, post-COVID-19, a levelling down.

All players in the CAZ ecosystem have a role to play

Good, nimble, innovative governance is important to success. This includes close working between London councils, mayoral government and national government, who together have helped drive London's previous sustained growth (relative to many of its global rivals). This may require a new approach, through a new recovery organisation, for example.

Many of the benefits of the CAZ's concentration of firms accrue to others that are co-located. In this way, firms and employers have a role to play in encouraging good behaviour, from encouraging employees back to the office sustainably, and once it is safe to do so, to ensuring that their own working policies do not impact adversely on equality, diversity and inclusion.

In addition, to enable businesses to replace the ones that are lost, a degree of certainty is required, and in its absence, there may need to be additional incentives to invest. This could extend to some form of future pandemic insurance that will allow borrowers to be sure of meeting debt requirements in the event of a future pandemic.

Conclusions

The London Recovery Board has determined a clear agenda for London to deliver on. London's business and community groups have come together with the Mayor and London boroughs to formulate nine 'missions' for all of London, which overlap substantially with the aims of this work, and which apply to the success of the CAZ. This gets us off on the right foot, and long-term, enduring success requires clear visionary leadership, coupled with deft management, implementation, and stewardship.

Future scenarios modelling

Three scenarios will be modelled in the second phase of work, to focus on the medium-term and long-term timeframes (2-5 years and 5-10 years). The team will collate a long list of variables informing the scenarios, and categorise these into scale of impact and likelihood. Our final report is expected to be published in March 2021.

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