Gatwick Airport Northern Runway Project

Appendix A – The Applicant's Response to York Aviation at Deadline 9

Book 10

VERSION: 1.0

DATE: AUGUST 2024

Application Document Ref: 10.77

PINS Reference Number: TR020005

Table of Contents

1 Executive Summary

1.1.1 York Aviation (York) prepared their own traffic estimates to support the ExA's request to perform sensitivity testing for the baseline and NRP forecasts. Much of this was discussed in the Applicant's response to York's Rule 17 Sensitivity forecasts [REP4-049] in GAL's submissions [REP5-081] and [REP7-073], although this document focuses on the most recent response from York [REP7-104] which uses slightly different numbers.

1.1.2 The York future baseline remains significantly lower than GAL's future baseline forecast. In 2047 York forecast 56.8 million passengers compared to GAL's 67.2 million (a gap of 10.4 million).

1.1.3 This document explores the four principal differences between the forecasts, which can be examined under the following headings (in brackets the figure given represents the difference between the parties represented by each factor):

- Peak throughput (1.5mppa)
- Peak spreading (5.6mppa)
- Aircraft size (1.6mppa)
- Load factor (1.4mppa)

1.1.4 For the reasons explained under each heading, York's approach is considered to be overly pessimistic to the point of not being credible.

1.1.5 On peak throughput, the parties are closely aligned on busy day capacity and throughput but not on the throughput in the busy month (August). Contrary to established trends, evidence and observed demand, York assume that there is no potential at all for further growth into the off-peak hours / days of the peak month.

1.1.6 Whilst York insist (in [REP7-104] at paragraph 15) that they do allow for peak spreading, their forecast shows zero increase in the annual daily average number of ATMs between 2032 and 2047, such that the ratio between busy month (August) and yearly throughput remains fixed at 1.16 throughout that 15 year period. York do allow some limited growth in the busy day and assume that those new movements represent year-round services (which marginally affects the year round average) but that is peak growth, not peak spreading.

1.1.7 Previous GAL submissions and this document contain substantial evidence to support the Applicant's forecast that peak spreading will occur (albeit at a slowing rate compared with that witnessed in the pre-Covid period 2014 to 2019).

1.1.8 York also assumes smaller aircraft sizes than GAL through the forecast, with negligible growth in the last decade of the forecast. However, evidence from recent fleet orders suggests even GAL's forecasts now look pessimistic and there is strong evidence that York's assumptions will prove to be underestimates. Continuing constraints on capacity in the London market are only likely to provide greater incentive for airlines to up-gauge.

1.1.9 The same applies to load factors where recent history shows that GAL's forecasts are cautious.

1.1.10 To support its position, York attaches very little weight to the evidence that these trends were apparent and completely logical in the increasingly constrained market that existed in the years immediately prior to Covid. The over-subscription of peak time capacity which has been a demonstrable feature of Gatwick since at least 2014, naturally drove these trends. However, York suggests that Gatwick's attractiveness to the market is not as strong at GAL suggest, which GAL strongly disputes for the reasons set out previously and summarise in this document.

1.1.11 In this context, it is highly material that demand in the UK and London aviation market is forecast to continue to grow. The latest government forecasts are those published in 2023 (the Jet Zero updated forecasts). These show forecast growth in real terms of 1.3% p.a. for the period 2018-2050, with stronger growth to 2040 (1.5%) and lower growth (0.9%) post 2040 ([REP1-052] at Table 19 on page 61). Both GAL and York consider that the slowdown in growth post 2040 may be exaggerated, but equally both recognise that the NRP will be close to capacity before then.

1.1.12 The forecast growth amounts to demand for an additional 147mppa in the UK market between 2018 and 2050. At the same time, there is no consented additional capacity beyond that which is available at Stansted, where spare capacity has not prevented excess demand building at Gatwick. It is unsurprising in these circumstances that GAL forecasts a return to the constrained conditions experienced before the pandemic when increasing, excess demand resulted in peak spreading, larger aircraft size and increased load factors. To assume that there will be no change in performance of the airport outside Gatwick's already constrained busy day in these circumstances is fundamentally unrealistic.

1.1.13 This document addresses these factors and York's expressed concern that lack of peak capacity or delays in operational performance will prevent the growth that GAL forecasts.

1.1.14 It also addresses two other issues:

- York's misunderstanding of GAL's forecasts for the busy day (the false but repeated assertion that GAL has forecast an increase of 47 ATMs in the busy day); and
- York's approach to the NRP forecasts, although these are of secondary importance because the NRP can only be an increment above the current and future base growth of the airport – until that base capacity is understood, no NRP forecast can be reliable.

1.1.15 When adjustments are made to York's NR forecast to account for the undeliverable increases in runway capacity and aircraft gauge, the benefit of the NR under York's forecasts is reduced from "*18-19 mppa*" to around 13 mppa. This is a comparable differential to that modelled under the GAL forecasts.

1.1.16 The final section of this document deals with a number of associated concerns raised by York and demonstrate the robustness of the Applicant's position.

2 Purpose of Document

2.1.1 This document addresses the primary differences between the quantitative components of the future baseline and NRP forecasts presented respectively by York Aviation on behalf of the JLAs and those presented by Gatwick Airport.

2.1.2 It also responds to some miscellaneous points relevant to forecasts arising from Deadline 8 submissions.

3 York's Baseline

3.1.1 York Aviation have provided alternative numbers regarding GAL's baseline (& NRP) submission for sensitivity testing, as requested by the ExA. Compared with GAL's future baseline forecast of 67.2mppa in 2047, York Aviation provided forecasts of 56.8mppa and 60.5mppa in its Rule 17 Response [REP4-049] and its submission at Deadline 7 advises that it regards the ceiling on the future baseline forecast to be 57mppa [REP7-104] at paragraph 18.

3.1.2 This section summarises the main assumptions as well as the main differences and identifies four principal reasons why York's assumptions are overly conservative.

3.1.3 To make sure this paper was soundly based in an accurate understanding of York's figures, GAL sought that clarification from York following ISH9. The confirmation is reproduced as **Appendix 1** to this document.

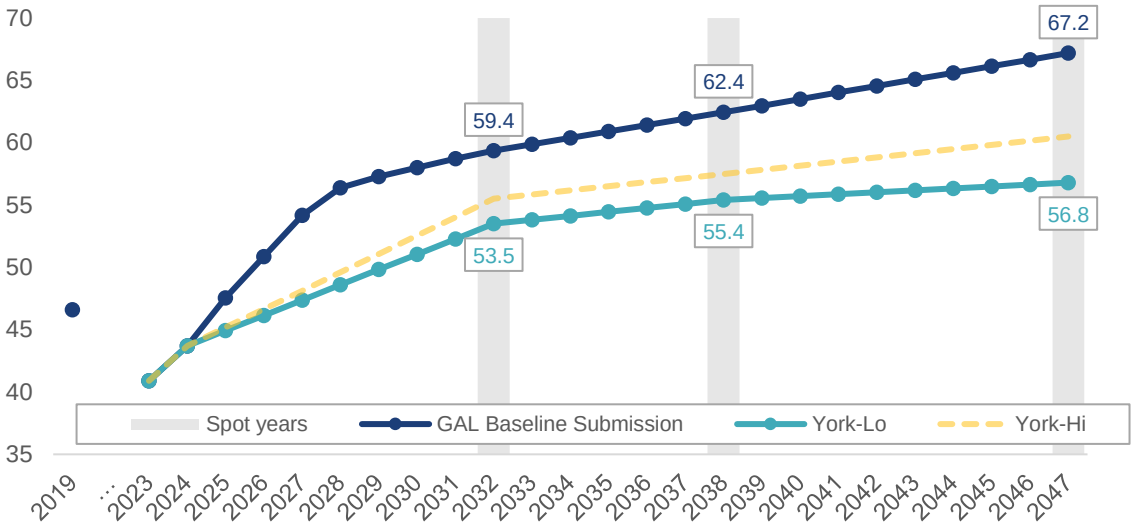
3.2. Summary of York numbers (compared with GAL's)

3.2.1 York considers their low case to be the most realistic baseline for Gatwick and explain this further in their D6 submission [REP6-099]. It is noted that the numbers discussed in their D6 submission differ slightly from those offered in their sensitivity analysis [REP4-049] (e.g. 292k vs 290k annual ATMs, assumed to be in 2047 whilst the total annual passengers is assumed to remain consistent at 56.8 mppa).

3.2.2 York's position now is: "Based on our assessment of the expected aircraft size and load factor, it seems likely that the most realistic Baseline throughput would be of the order of 57 mppa, with around 292,000 annual aircraft movements, an increase of 3% in annual commercial aircraft movements and 22% in passengers above the peak levels handled in 2019." [REP6-099] Appendix III paragraph 16.

3.2.3 The spot years provided by York (2032, 2038, 2047) are shown in the following chart with the intervening years interpolated. The GAL DCO baseline submission is also shown for context.

3.2.4 Chart 1: LGW Baseline Passenger Comparison (millions)



3.2.5 For 2032 York forecast 53.5 million passengers compared to GAL's 59.4 million (a gap of 5.9 million), and by 2047 York forecast 56.8 million passengers compared to GAL's 67.2 million (a gap of 10.4 mppa).

3.2.6 The sensitivity forecasts have been built up from high level ATMs, gauge and load factor assumptions. The York assumptions were set out in its Rule 17 response [REP4-049] and clarified by GAL in correspondence, which is appended to GAL's response [REP5-081]. Their preferred low case assumptions are provided in the following table.

3.2.7 Table 1: Gatwick Baseline - York Low, Assumptions (2014 & 2019 from GAL actual)

	2014	2019	2032	2038	2047
ATM: August (Peak day)*	892	928	c950	c950	c950
ATM: August (avg. day)	851	900	921	921	921
ATM: Annual (avg.)	698	769	793	793	793
Peak Month Ratio	5%	3%	3%	3%	3%
Peak Month Ratio (Aug:Avg.)	1.22	1.17	1.16	1.16	1.16
Seats per ATM	179	192	210	215	218
Load Factor	84%	86%	88%	89%	90%
ATMs, Annual (k)	255	281	290	290	290

Passengers, Annual (m)	38.3	46.6	53.5	55.4	56.8

3.2.8 Summary of data sources/references:

3.2.8.1. ATM: August (Peak day): Busiest day of year for ATMs [Appendix A to GAL's REP5-081]

3.2.8.2. ATM: August (avg. day): The average number of ATMs per day in August [Appendix A to REP5-081]

3.2.8.3. ATM: Annual (avg.): The average number of ATMs per day in the year [Appendix A to REP5-081]

3.2.8.4. Peak vs Aug Avg.: The ratio of Peak day of peak month: Avg. day of peak month. Calculated from above (3.2.8.1 / 3.2.8.2)

3.2.8.5. Peak Month Ratio (Aug:Avg.): The ratio of Avg. day of peak month: Avg. day of year. Calculated from above (3.2.8.2 / 3.2.8.3)

3.2.8.6. Seats per ATM: Average seats per ATM (reflects aircraft size) [Appendix A to REP5-081]

3.2.8.7. Load Factor: Seat occupancy rate [Appendix A to REP5-081]

*Following receipt of the JLA's Rule 17 Response [REP4-049] at Deadline 4, GAL sought to distil the characteristics of the revised YA scenarios in a set of slides and asked for confirmation that GAL's understanding was broadly correct. This was confirmed by York on 21 May. GAL also asked further confirmation about detailed aspects of YA's scenarios, particularly relating to busy day movements and the split between short and long-haul movements. That information was also provided by York and has informed GAL's analysis. The exchange was provided as an Appendix to [REP5-081].

Note: ATM numbers refer to commercial movements

3.2.9 Whilst GAL worked to ensure its understanding of York's forecasts was correct following their publication in [REP4-049] (the Rule 17 response) (see the correspondence conducted for this purpose at Appendix A of [REP5-081]), GAL was surprised at claims made, particularly about peak spreading in [REP7-104] and engaged in further correspondence following ISH9.

3.2.10 Gatwick's DCO submission figures are provided in the following table for comparison, the main areas of difference relate to figures for the peak month (August), the annual average ATMs and long-term seats per ATM.

3.2.11 Table 2: Gatwick Baseline – DCO Assumptions (2014 & 2019 from GAL actuals)

	2014	2019	2032	2038	2047
ATM: August (Peak day)*	892	928	950	954	956
ATM: August (avg. day)	851	900	938	942	944
ATM: Annual (avg.)	698	769	859	873	892
Peak vs Aug Avg.	5%	3%	1-2%	1-2%	1-2%
Peak Month Ratio (Aug:Avg.)	1.22	1.17	1.09	1.08	1.06
Seats per ATM	179	192	210	215	224
Load Factor	84%	86.5%	90%	91%	92%
ATMs, Annual (k)	255	313	313	318	326
Passengers, Annual (m)	38.3	46.6	59.4	62.4	67.2

Metrics sourced from **Forecast Data Book** [APP-075], Chapter 8. Additional data points added for completeness as they were used for sensitivity analysis

4 Review/ Comparison of York Assumptions

4.1.1 The primary differences can be explored under four headings. The conservatism of York's assumptions is discussed. It is also shown graphically in the charts set out in **Appendix 2.**

4.2. Peak Throughput (day and month)

4.2.1 Whilst York have previously raised doubt on the busy day throughput achievable under the baseline capacity assumptions, their 57 million passenger case is largely aligned for peak day throughput.

4.2.2 York assume an average of 921 daily ATMs in August in future years, which equates to approximately 950 ATMs on a busy day[1]. This is comparable to GAL's future year assumptions of 954 ATMs in 2038 and 956 ATMs in 2047.

4.2.3 Whilst the peak day is largely aligned, therefore, the busy month (August) is not. York make no allowance for quieter days in August to become busier.

4.2.4 Gatwick has provided evidence to support the achievability of the busy day throughput. Since 2019, Gatwick (in conjunction with ACL) have declared an increase in the peak day capacity at Gatwick. This increase equates to 12 additional daily slots across the day. Assuming these additional peak day slots are utilised as efficiently as current slot holdings (nearly 100% utilisation) will support the growth from 928 ATMs (2019) to 950 ATMs (2032).

4.2.5 In contrast, Gatwick forecasts that the greater growth of the off-peak days in the peak month continues, in line with performance demonstrated pre-Covid. For example, in 2014 the peak August day was 5% busier than the average August day. By 2019 the peak August day was only 3% busier than the average August day. This ratio is forecast by GAL to decline to 2% by 2038 and ~1.5% by 2047.

4.2.6 Demand clearly supports this and examples of airlines currently growing in quieter periods of the peak month were provided in Figure 3 of REP4-022. For example, this highlighted growth in the off-peak hours (including during busy months) from Vueling, Swiss, Wizz, Air India, Qatar Airways, several Chinese carriers amongst others. These movements include demand to/from Europe, China, Asia and other markets.

4.2.7 **Peak throughput summary:** Whilst the busy day assumed by York is relatively aligned with GAL, York make no assumptions for further growth into the off peak hours / days of the peak month (i.e. the growth in the peak day is comparable to the growth of the average day in the peak month). Whilst the differences appear small, it is agreed that more peak capacity is likely to translate into year-round services. **Assuming further infilling of peak month flights would add c1.5 mppa to York's baseline.**

4.3. Peak day clarification

4.3.1 In [REP7-104] at paragraph 16, York set out what appears to be its principal concern with GAL's future baseline forecast, as follows:

"What we demonstrated in REP4-049 (paragraphs 6-14) was that to achieve the growth in the number of daily aircraft movements required to achieve an increase in Baseline throughput to 67 mppa, set out as being 47 additional daily movements in the peak by the Applicant in Annex 6 to the **Forecast Data Book** [APP-075], is simply not possible within the declared and future planned capacity with the single runway."

4.3.2 However, the numbers referenced by York refer to approx. average monthly increase at Gatwick, not forecasts increases in the busy day. The numbers in the Forecast Data Book table referenced also appear on page 4 of Annex 6 to the

Forecast Data Book [APP-075], where it is clear this refers to August / peak month throughput. This was also explained at the TWG sessions prior to the DCO process.

4.3.3 It is surprising that the JLAs are not clear on the busy day throughput assumed by Gatwick as this has been provided and discussed with them on several occasions, with hourly breakdowns of traffic flows provided in working group sessions prior to the DCO submission. GAL's forecast increase in busy day movements in the future baseline is an increase of 20 movements in the peak day, compared with 2018 (934, total ATMs) to 954 in 2038 (commercial ATMs)[2].

4.3.4 This has been set out multiple times to the examination - for example the forecast components are clearly set out in the **Capacity and Operations Summary Paper** [REP1-053] para 3.4.2 and **Airfield Capacity Study** [REP1-054] para 3.1.4. GAL also clarified this in response to York's query in its **Response to York Aviation – Capacity and Operations** [REP4-023] at point 58, and again confirmed the same directly in its **Response to Deadline 5 Submission – Response to York Aviation** [REP6-091] at paragraph 4.3.5.

4.4. Peak Spreading

4.4.1 York's D7 submission is adamant that:

"..in our Baseline case [REP4-049], we do allow for between 12 and 24 additional daily movements on average over the peak month, consistent with the Applicant's assumption as to the additional slots available on a busy day and consistent with the pattern of post-Covid-19 take up of slots set out by the Applicant at paragraph 3.3.4 of REP6-091. Given that the peak hours on the busiest day are already full, this amounts to spreading of the peak in terms of times of day and days of the week over the busy month. Furthermore, we assumed that these services are added year round so contributing to a seasonal spreading of the peak for the reasons explained at paragraph 16 of REP4049. The Applicant is completely wrong to say that our Baseline case made no allowance for peak spreading." [REP7-104] at paragraph 15.

4.4.2 Since York assume that demand is added in the peak, which will operate year round, it is peak growth they are assuming rather than peak spreading. The fact that the airport's overall seasonality reduces marginally is a minor output of the peak growth. The peak day of the peak month of the peak season is considered

[2] Note: Gatwick has served up to 939 peak day commercial ATMs in a day in 2017. Therefore, increasing throughput to 950 should be considered achievable, especially in light of the recently released peak daily capacity (+12 ATMs)

a narrow enough definition of the peak rather than implying that Gatwick's peak is in fact limited to just one peak hour of the peak day.

4.4.3 This helpfully clarifies the difference between the parties. At paragraph 16 of REP7-104, York set out their criticism of GAL's peak spreading assumptions:

"Hence, the only way in which the Applicant could achieve its claimed growth in the Baseline is if airlines are willing to operate a large number of new services only in the off-peak months. This is simply not plausible to the extent required to deliver the claimed level of growth."

4.4.4 This represents a misunderstanding of GAL's case and of the available evidence. As historical data shows, peak spreading is typically achieved through the use of the peak capacity on a more consistent year-round basis. GAL has demonstrated how this has been consistently achieved over recent years and set out a number of examples, for example, in its **Response to Rule 17 Letter – Future Baseline Sensitivity Analysis** [REP5-081] at paragraph 3.4.5 and in [REP4-037] (Actions following ISH7, when it was asked by the ExA to explain this specific issue – see Action Point 8). See also **Response to York Aviation – Forecasts** [REP4-022]. Simple examples include:

- An airline with peak slots progressively extending its season, so that it flies its slots increasingly in the spring or autumn months;
- Slot swaps, loans and transactions – from an operator that does not use its slots year-round to one who does;
- Chapter 5 of this document sets out strong evidence of historical peak spreading trends.

4.4.5 York is wrong in principle to assert that this is not plausible / possible and wrong in practice to ignore the evidence that it has and will continue to occur, particularly in a constrained market where there are very limited opportunities for growth.

4.4.6 GAL has explained before, for example in the **Needs Case Technical Appendix** [REP1-052] at paragraph 5.2.15, that its forecasts are cautious in this respect, representing a significant slowing down of historic trends – but to ignore the potential for any is to underestimate the growth of the airport.

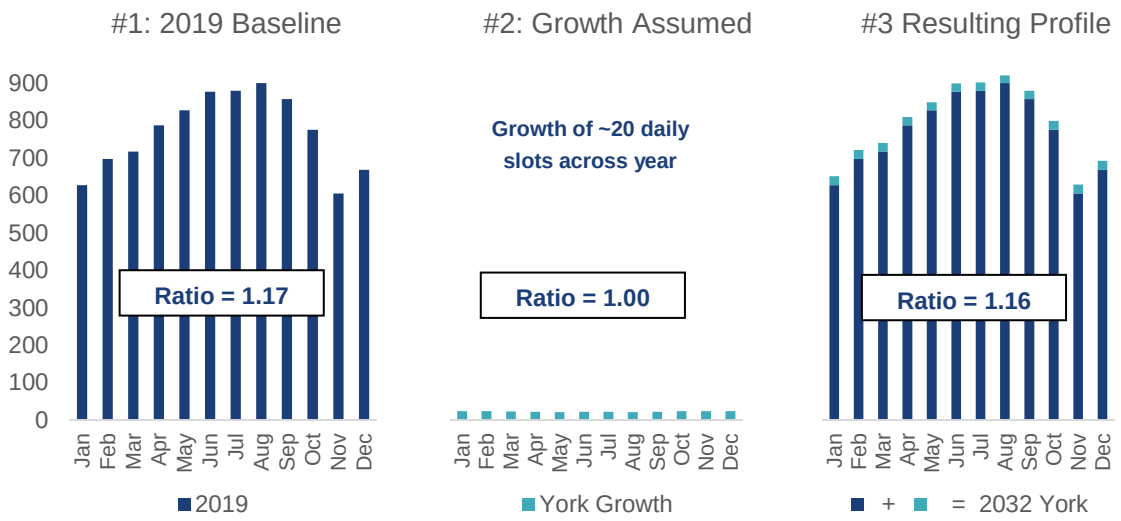
4.4.7 In the 2014-2019 period Gatwick's peak month ATM ratio declined from 1.21 to 1.17.

4.4.8 In 2019 the average August day for ATMs was 17% busier than the annual average (thus a ratio of 1.17), although if adjustments are made to reflect the exit of Thomas Cook (which ceased operations in September 2019 and which York suggest may be a one-off event) then Gatwick would have achieved a ratio of 1.16.

4.4.9 In future years, York assume that this ratio remains fixed at 1.16 all the way to 2047 (once the peak growth is factored in).

4.4.10 This is illustrated in the following charts. Taking the unadjusted 2019 baseline (Chart 8: #1) and adding in the peak growth assumed by York (Chart 8: #2) results in the resulting approximate monthly profile assumed by York (Chart 8: #3).

4.4.11 Chart 2: Approximate Growth Assumed by YA in Baseline, Daily ATMs



4.4.12 This is the approximate static monthly profile assumed by York throughout the forecast.

4.4.13 Peak spreading is discussed further in section 5. This section simply seeks to identify and quantify the principle. Comparisons between York and Gatwick's assumptions regarding peak spreading are also provided in Appendix 2: Gatwick Submission & York Assumptions

4.4.14 **Peak Spreading Summary**: York make no allowance for future peak spreading of Gatwick's traffic base. Modest assumptions for future peak spreading would add 5.6 mppa to the future baseline.

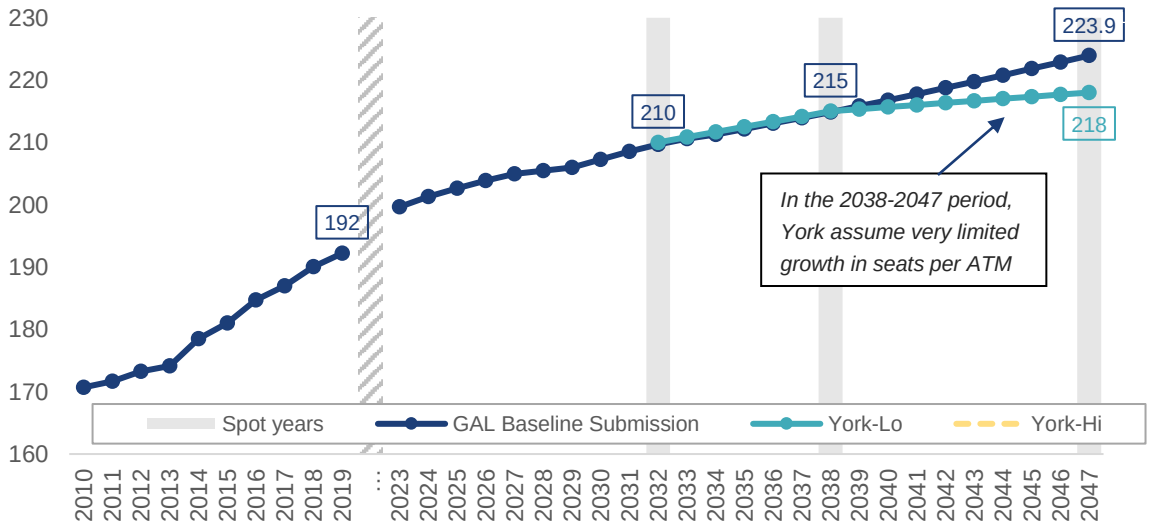
4.5. Aircraft size

4.5.1 Aircraft gauge has been a key driver in Gatwick's growth over the decade leading up to 2019. In the 2010-19 period the average seats per movement increased from 171 to 192, an increase of 13% or 21.5 seats per aircraft in just 9 years. **Needs Case Technical Appendix** [REP1-052] at Section 5.2.

4.5.2 By 2038 the DCO baseline forecasts that the average aircraft size will grow to 215 seats per movement (S/ATM) representing a further 12% increase compared to 2019, but over a near 20-year time frame. By 2047 Gatwick forecast S/ATM to approach 224 supported by airlines continuing to up-gauge fleets in a constrained London market.

4.5.3 Whilst aligned in the 2019-2038 period, in the final decade of the forecast, York assume negligible growth with S/ATM growing just 1% in the 2038 to 2047 period.

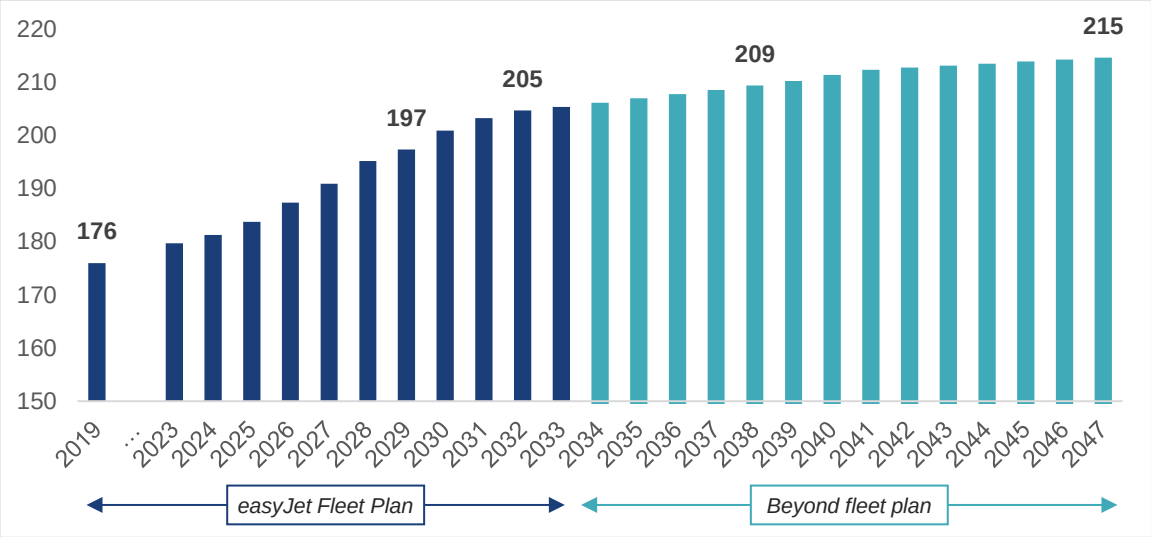
4.5.4 Chart 3: LGW Seats per Aircraft Forecast



4.5.5 Future growth is well supported by evidence of fleet trends of many of LGW's key airlines and the future 12% increase by 2038 may in practice be considered conservative.

4.5.6 easyJet are Gatwick's largest airline so Gatwick's overall trends will be heavily linked to their performance. Their latest fleet plan shows that their average S/ATM will increase +16% by 2032 (176 to 205). The growth in easyJet's average aircraft size is shown in the following chart.

4.5.7 Chart 4: easyJet Planned S/ATM increase under fleet plan (2023-2033). Assumptions beyond 2033



4.5.8 The attractiveness to airlines is clear; larger aircraft types enable airlines to increase capacity at constrained airports such as Gatwick, they decrease unit costs and carbon intensity metrics. This is a common theme with similar trends reported at airports like Heathrow.

4.5.9 easyJet's planned increase in aircraft size is now substantially more than the +9% assumed by GAL for the fleet as a whole under the baseline forecasts (192 to 210) in the 2019-2032 period.

4.5.10 The modest growth assumed by York should be considered in the context of Gatwick operating in the 2040s in a highly constrained London aviation market when demand is forecast to exceed supply. Airlines will be incentivised to up-gauge aircraft as demand projections will significantly exceed supply.

4.5.11 Comparisons between York and Gatwick's assumptions regarding aircraft size are also provided in Appendix 2

4.5.12 **S/ATM Summary:** The average aircraft size at Gatwick will continue to increase, a forecast strongly supported by fleet orders from many of Gatwick's largest carriers. There is potential to outperform the forecasts in the medium-long term and no reason to suggest the negligible growth assumed by York in the last decade is realistic.

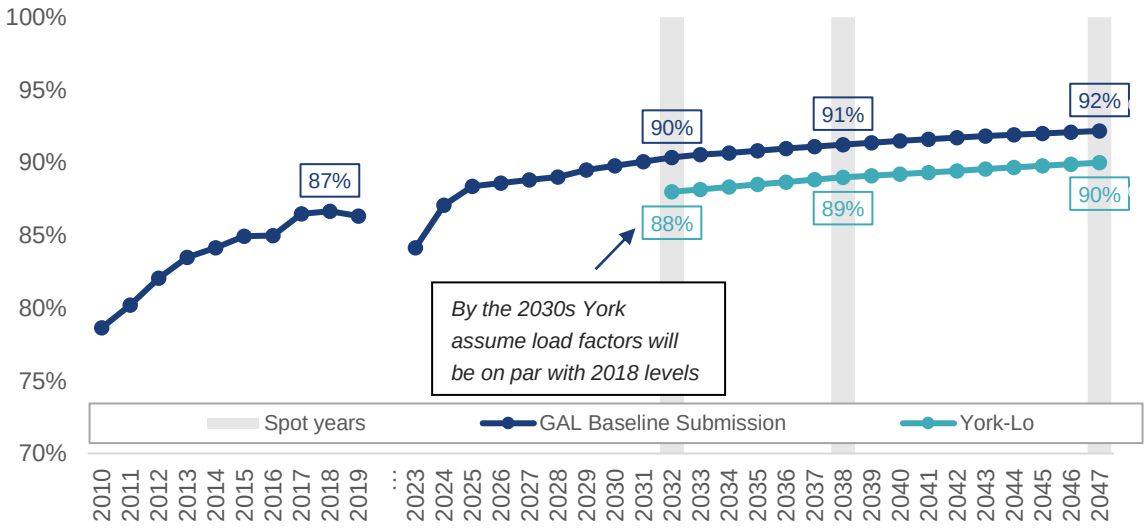
4.5.13 Adopting GAL's more realistic forecast for aircraft size, York's future baseline forecast would increase by 1.6 mppa.

4.6. Load Factor

4.6.1 Load factors have also increased at Gatwick over the decade leading up to 2019. In the 2010-19 period the average seat occupancy rate increased from 79% to 86%,, peaking at 87% in 2018. This is an increase of ~8% points in just 9 years.

4.6.2 For the DCO baseline case, Gatwick forecasts load factors will increase to 90% in 2032, 91% in 2038 and 92% in 2047. This growth of <6% points is forecast over a near 30-year period, significantly lower than historical trends. York's forecast by comparison is shown below.

4.6.3 Chart 5: LGW Load Factor Forecast



4.6.4 Recovery in load factors is already well progressed, with 2023 returning to 84% and the first few months of 2024 already tracking comfortably above 2023 (+1.5% YTD Q1)

4.6.5 Whilst it is recognised that the rate of growth in historical load factors is not sustainable, there is still opportunity to continue growth albeit at a slower pace, particularly in a constrained market.

4.6.6 York forecast that load factors will remain comparable to 2018 in 2032 before assuming an increase of +2% points between 2032 and 2047 (88% to 90%). In the same period GAL also forecast a comparable increase (+2% points) but from a slightly higher base.

4.6.7 Whilst Gatwick have assumed modest growth from 2019's position by 2032, York have not. They assume an increase of just 1% point in the 2019-32 period (13 years) and a further 1% point in the 2032-38 period (just 6 years).

4.6.8 Further growth in load factors should be expected reflecting, for example that low cost carriers are continuing to increase their share of the short haul market. These carriers operate with high year-round load factors, often reporting year-round load factors of c90%.

4.6.9 Full-service carriers have also responded by unbundling their products and increasing their load factors. Also, as Gatwick's new airlines and markets mature over time further growth in load factor is expected to arise and achieve levels in line with more-established markets.

4.6.10 Further growth in LCCs and the ability of airlines to manage their capacity will provide further upside in load factors

4.6.11 Comparisons between York and Gatwick's assumptions regarding aircraft size are also provided in Appendix 2.

4.6.12 **Load Factor Summary:** As Gatwick completes its recovery from Covid, load factors are on track to return to pre-Covid levels in the next year. Further growth is expected reflecting the performance of Gatwick's top operators today and maturity across Gatwick's airlines which have recently entered the market. Longer term constraints in the overall Gatwick and London market will support load factor growth as demand will outstrip supply across the year.
By adopting GAL's forecast load factors, York's future baseline would increase by 1.4 mppa.

5 Peak Spreading (in more detail)

5.1.1 York maintain that Gatwick has only 'de-peaked' its operation by releasing peak slot capacity which has subsequently been used for year-round operations, and that this is the only driver of peak spreading.

5.1.2 In submission **Response to Rule 17 Letter – Future Baseline Sensitivity Analysis** [REP5-081], GAL demonstrated categorically that this was not the case. This information has been re-produced at a summary level in the following section. More detail on the individual airlines/markets is now provided below to further demonstrate these well-established trends.

5.2. Gatwick Annual Trends

5.2.1 The vast majority of Gatwick's growth in recent years has been attributable to the in-filling of quieter hours, days and months of the year. This is peak spreading.

5.2.2 York continue to assert and assume in their forecasts that growth outside the peak can only occur if peak capacity is introduced at Gatwick, thus resulting in peak spreading from this peak growth. This is demonstrably not the case, and this section highlights how strong peak spreading has historically been at Gatwick.

5.2.3 Between 2014 and 2019, Gatwick's peak day slot capacity increased by just 14 movements (from 856 to 870 daily slots in the 17-hour day period, 0500-2159, (Source: ACL).

5.2.4 In the same period Gatwick's average daily slot utilisation increased by 71 movements per day (annual average of 698 to 769 daily ATMs). Even if 100% of the newly released peak time capacity was taken up by year-round services (i.e. the 14 slots released between 2014-19), then the remaining 57 incremental ATMs are all attributable to peak spreading. This is summarised in Chart 7 at an annual level, with an explanation of the ATM growth drivers below.

A. The release of 14 extra slots on a peak day was worth 4k annual ATMs. (at 2014 levels of seasonality).

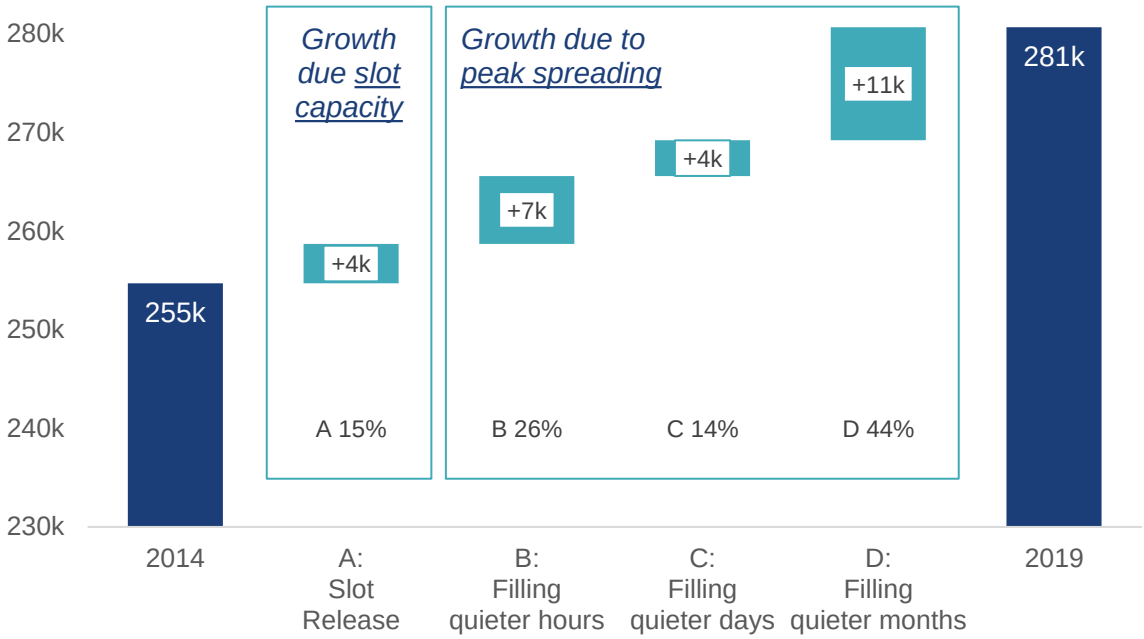
B. The infilling of quieter hours on peak days was worth 7k annual ATMs.

C. The quieter days in the peak month continued to grow without new capacity. This was worth 4k annual ATMs.

D. The quieter months have out-grown the peak months. This was worth 11k annual ATMs.

5.2.5 Combined, the growth from 255k annual ATMs in 2014 to 281k annual ATMs in 2019 is shown in the following chart.

5.2.6 Chart 6: Gatwick Annual ATM Growth, 2014-19



5.2.7 So, historically just 15% of Gatwick's annual ATM growth is attributable to the release of new capacity whilst 85% is directly related to peak spreading.

5.2.8 Over time, as LGW's constraints become more pronounced, airlines will continue to add capacity at less busy times of the year. LGW will still see modest growth in the peak months although growth in off peak months will continue to outperform the peak periods.

5.3. Gatwick's Airlines / Markets Driving Peak Spreading (easyJet)

5.3.1 It is worth considering the behaviour of key airlines like easyJet in the period leading up to 2019, a period when Gatwick was heavily constrained and short haul ATMs fell in some years as airlines converted slots to long haul flying.

5.3.2 In the 2014-2019 period, easyJet demonstrated strong de-peaking trends. In 2014 August ATMs were 21% busier than average and by 2019 this ratio had fallen to 14%, a reduction of 32% (or 7% points).

5.3.3 Detailed ATM analysis highlights that these trends were experienced across all route groups and their network has been analysed considering their highly seasonal leisure routes (routes that only operate during summer season), other

leisure routes (other leisure dominated routes) and mixed routes (which reflect a mix of leisure/business travel).

Highly seasonal routes

5.3.4 Declines in seasonality were pronounced as rates declined from 2.59 in 2014 to 2.25 in 2019 (i.e. August was 125% busier than average in 2019). This was a decline of 34 basis points.

5.3.5 Routes like Mahon only operated in the summer months in 2014 but by 2019 were operated on a **year-round basis**.

5.3.6 Routes like Ibiza operated shorter seasons in 2014 compared to 2019. Now these routes operate **longer seasons.**

Leisure Routes

5.3.7 Declines in seasonality were pronounced as rates declined from 1.44 in 2014 to 1.32 in 2019, a decline of 12 basis points.

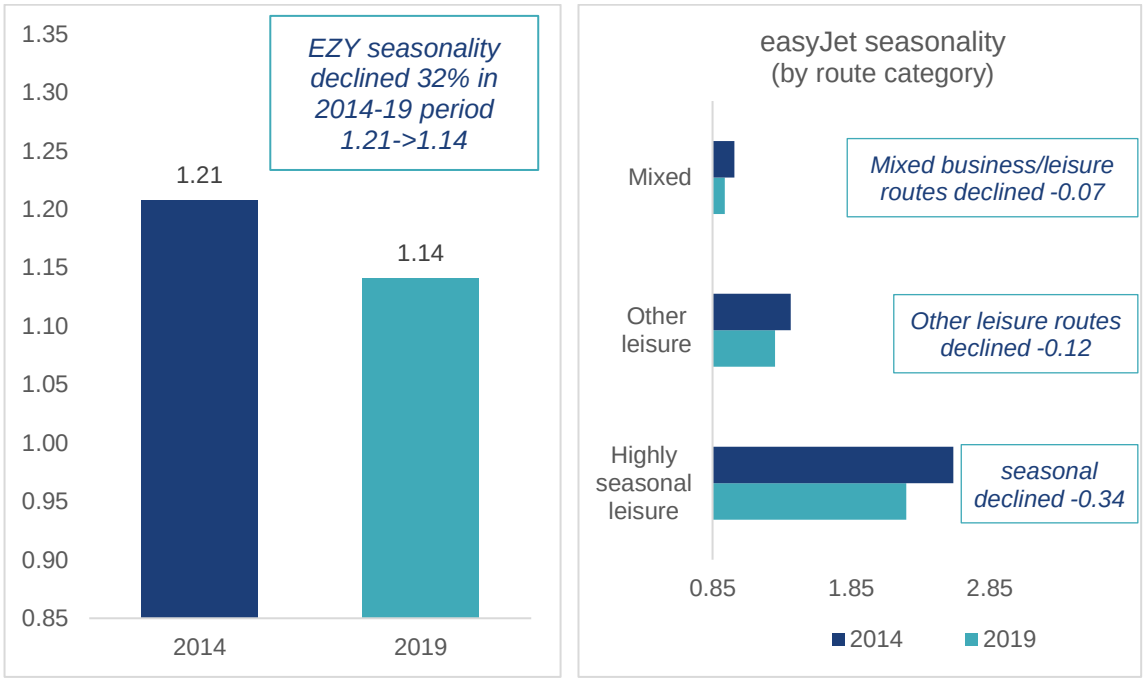
5.3.8 Of the 29 routes in this category, 22 demonstrated peak spreading. Routes like Palma, Faro, Alicante and Valencia all spread by in more than 10 basis points.

Mixed Routes

5.3.9 This segment declined in seasonality by 7 basis points. Slots for some routes switched to more leisure focused routes in the peak periods as easyJet flew more capacity to these markets in the shoulder months than the peak.

5.3.10 Many of easyJet's largest routes like Munich, Geneva and Milan all demonstrated strong levels of de-peaking

5.3.11 Chart 7: easyJet Seasonality Comparisons, Peak month ATM ratio (2014-2019)



Note: Mixed route = Domestic, Milan, Geneva, Amsterdam, Barcelona, Berlin, Madrid, etc.
Highly seasonal = Heraklion, Ibiza, Mahon, Split, Greek Islands, Dalaman, Antalya, etc.
Other Leisure = Malaga, Nice, Faro, Alicante, Toulouse, Valencia, Bordeaux, etc.

5.4. Other Airlines / Considerations

5.4.1 Other airlines like Norwegian and Vueling also demonstrated strong de peaking trends.

5.4.2 Norwegian converted some short-haul flying to long haul supporting their reduction in seasonality from 1.11 to 1.02. They added 10 new long-haul routes between 2014 and 2019 which were being operated on a relatively consistent year round basis in addition to their short haul network focused on European cities.

5.4.3 Vueling added 5 new routes between 2014 and 2019 (Paris, Rome, Alicante, Bilbao, Asturias) on a relatively consistent year-round basis with their overall seasonality reducing by 8 basis points in this period.

5.4.4 **Slot trades**: Slot trades and slot swaps are more common and characteristically are being used to trade up to year-round services. It is simply not reasonable to refuse to recognise this established trend [REP4-022 paragraphs 2.3.9-2.3.10] as York continue to do.

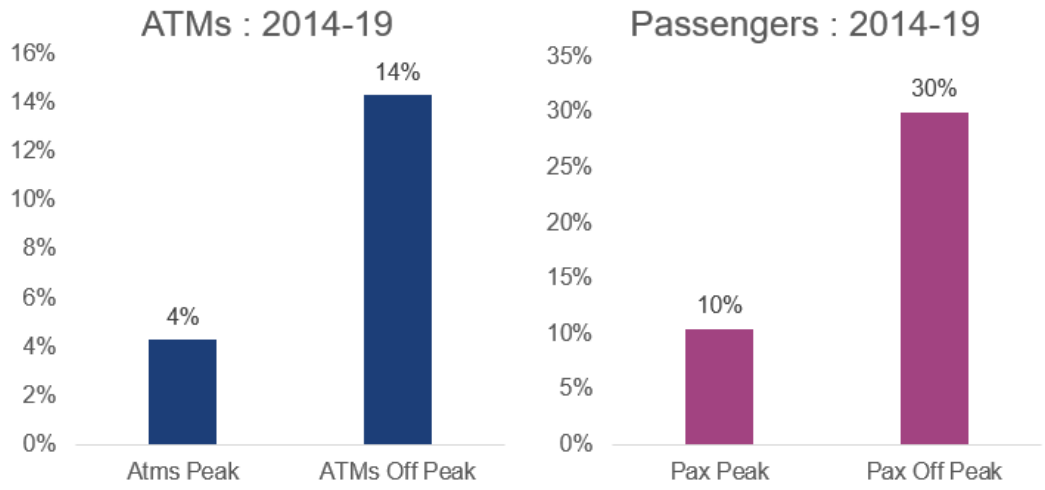
5.4.5 **Airline charging**: GAL has produced detailed evidence of the seasonal pricing [REP4-037 Action 7] which it has introduced to incentivise off-peak traffic. York acknowledge this at their Rule 17 Response [REP4-049], paragraph 20: "*We do accept that, on the margin, price incentivisation may allow for some extension of the operating season for services that currently only operate at peak periods but we have not separately calculated this as it is likely to have a relatively marginal impact within the range of outcomes set out below*." In GAL's view it would be fairer for York to recognise that price incentives can be a significant driver, particularly for low cost airlines and to adjust its position that peak spreading will not occur.

5.4.6 **Benchmarks**: Gatwick is forecast to decline to seasonality levels of other airports today, for example Dublin which has a mix of long haul and short haul LCC demand, or Ryanair's profile at Stansted which also has a large established European LCC as their number one ranked carrier.

5.5. Peak Spreading Performance

5.5.1 Growth outside the peak is very well demonstrated at Gatwick, the following charts highlight the strength of demand growth outside the peak. Typically, growth in the off-peak periods has grown three times as quickly as the peak.

5.5.2 Chart 8: Peak Spreading: Comparison of peak (day) vs off peak growth



UK Airport Comparisons

5.5.3 The JLAs seek to use comparisons with other UK airports to show Gatwick is also a seasonal airport and infer that it will always remain this way, we think that these comparisons are irrelevant.

5.5.4 In the 2014-19 period, LGW's ATM seasonality decreased by 22% whilst airports including Birmingham and Manchester saw negligible shifts in their seasonality. These other airports benchmarked by York are not constrained, so the market factors that have historically driven Gatwick's peak spreading are not present.

5.5.5 Heathrow's flatter seasonality is driven by binding constraints (ATM planning cap) rather than the JLA's incorrect suggestion that connecting passengers vary significantly throughout the year.

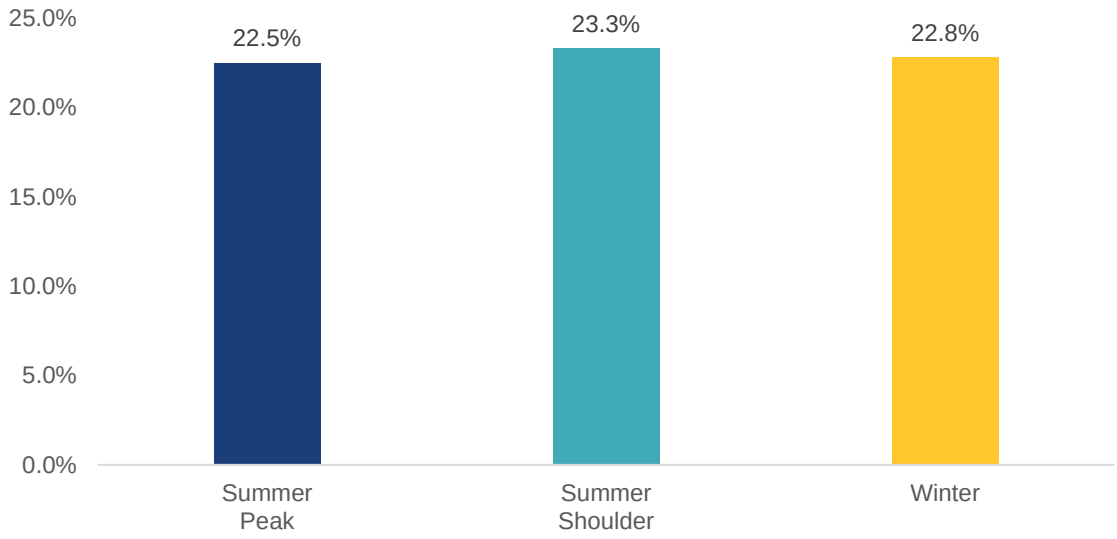
5.5.6 In 2023 LHR's transfer passenger profile was very consistent through the year:

5.5.7 In the peak summer months (Jul/Aug) LHR transfers accounted for 22.5% of total passengers.

5.5.8 This share is comparable to the winter off peak months (Nov-Mar) which averaged 22.8%.

5.5.9 These figures align with LHR's own reported statistics for annual levels, or half yearly levels.

5.5.10 Chart 10: LHR transfer shares through the year, 2023 (source: Heathrow / IATA)



5.5.11 For comparison, Heathrow's busy month ratio has averaged <1.04 over the 2009-2019 period and in several years was low as 1.03. Gatwick's future ratio of ~1.06 would therefore be twice that of Heathrow's historical ratio.

5.6. Summary (Peak spreading)

5.6.1 Gatwick's seasonality clearly declined leading up to 2019 and this arose through airlines using their existing slot portfolios on a more consistent year-round basis or acquiring slots (either from the slot pool or secondary trading market).

5.6.2 To suggest that these trends just stop and the market ceases to evolve so no further peak spreading of Gatwick's traffic occurs is not credible.

6 Benefit of the NRP

6.1. Overview

6.1.1 From York's overly conservative forecast for Gatwick's baseline growth trajectory, York then assume overly optimistic assumptions regarding the NR's potential. This results in an overstatement of the benefits in traffic arising from the NR. Whilst that overstatement would only further enhance the need case for and the benefits of the NRP, GAL considers it appropriate that the evidence which informs any decision is soundly based.

6.1.2 If the higher delta was promoted in order to increase any apparent adverse effects of the NRP, it failed to do so. The JLAs accepted at Deadline 6 [REP6-099] at Appendix IV that they were in general content with the conclusions reached in the Applicant's sensitivity analysis presented in the **Response to Rule 17 Letter – Future Baseline Sensitivity Analysis** [REP5-081], which concluded that the analysis of the York sensitivities, including the use of a lower future baseline, "*does not identify significantly different environmental outcomes from those reported in the Environmental Statement*." ([REP5-08] at page 105)

6.1.3 Again, York have revised their previous forecasts though it is not completely clear what has been adjusted. In REP6-099 para 22, the JLAs state that "*On the basis of a more realistic profile of demand over the year, the maximum throughput attainable with the NRP would be 75-76 mppa with 366,000 annual aircraft movements*." And "*the difference between the with and without development cases for the purpose of environmental assessment would be 18-19 mppa and 74,000 additional commercial aircraft movements*"

6.1.4 In their previous submission their low case was under 75 mppa in 2047 and the high case was 80.2 mppa, so this range is new.

6.1.5 In order to assist comparison of the respective components of York's estimate and GAL's NR forecast, they are set out below.

6.1.6 Table 3: Gatwick NR – York Low Assumptions (2014 & 2019 from GAL actuals)

	2014	2019	2032	2038	2047	2047*
ATM: August (Peak day)*	892	928	1,035	1,166	1,166	1,166
ATM: August (avg. day)	851	900	1004	1131	1131	1131
ATM: Annual (avg.)	698	769	892	1003	1003	1003
Peak vs Aug Avg.	5%	3%	3%	3%	3%	3%
Peak Month Ratio (Aug:Avg.)	1.22	1.17	1.13	1.13	1.13	1.13
Seats per ATM	179	192	213	218	227	229
Load Factor	84%	86.5%	88%	89%	90%	90%
ATMs, Annual (k)	**255**	**313**	**326**	**366**	**366**	**366**
Passengers, Annual (m)	**38.3**	**46.6**	**61**	**71.0**	**74.8**	**75.5**

*For York's NR case (2047), we assumed 229 seats per ATM and other metrics remained the same. This means the output passengers fall within York's range as covered in REP6-099 para 22, the JLAs state that "O*n the basis of a more realistic profile of demand over the year, the maximum throughput attainable with the NRP would be 75-76 mppa with 366,000 annual aircraft movements*".

6.1.7 Table 4: Gatwick NR – DCO Submission (2014 & 2019 from GAL actuals)

	2014	2019	2032	2038	2047
ATM: August (Peak day)*	892	928	1,126	1,132	1,134
ATM: August (avg. day)	851	900	1,110	1,117	1,119
ATM: Annual (avg.)	698	769	1,036	1,046	1,057
Peak vs Aug Avg.	5%	3%	1-2%	1-2%	1-2%
Peak Month Ratio (Aug:Avg.)	1.22	1.17	1.07	1.06	1.06
Seats per ATM	179	192	213	218	227
Load Factor	84%	86.5%	90%	91%	92%
ATMs, Annual (k)	**255**	**313**	**378**	**382**	**386**
Passengers, Annual (m)	**38.3**	**46.6**	**72.3**	**75.6**	**80.2**

Note: Numbers generated from sensitivity analysis to provide comparisons to York.
Any deviation of monthly / Leq / other profiles are all <1% from submission

6.2. Incremental NR Capacity

6.2.1 York maintains that they "*match the number of daily slots on the runway modelled by the Applicant*", which is incorrect. York in fact assume materially higher throughput for the peak month and busy day assumptions. For example, the busy day assumed by York is over 30 ATMs higher than that assumed by GAL and the capabilities of the NR (1132 vs 1166, 2038, York's low forecast figure confirmed on email).

6.2.2 York essentially assume the NR provides more capacity than it can deliver, and the overstatement of the busy day continues through the annual numbers.

Compared to the York baseline, an additional 200 daily slots are generated by the NR which is an overstatement by 12% of the NR's capabilities. The 74,000 additional ATMs assumed by York is more than the capabilities of the NR.

6.2.3 Summary NR Capacity increment: York continue to assume an unreasonable uplift in NR capacity over their baseline scenario.

6.3. Resulting and implied peak spreading

6.3.1 As was discussed in section 4, in the baseline forecast, York have assumed no peak spreading of the underlying traffic demand in the future baseline thus maintaining that Gatwick's traffic demand will maintain its current seasonality for ever.

6.3.2 Whilst it is recognised that peak growth which is then operated year-round can result in a net impact of peak spreading, this potential benefit is overstated by York's Northern Runway forecasts for two reasons.

6.3.3 Firstly, the level of incremental capacity discussed in the previous section overstates the capacity generated by the NR (i.e. the 1,166 daily ATMs in the peak month). The more peak day capacity you add (and fill with year-round demand), then the more peak spreading you can drive. Therefore, if you moderate the levels of demand that the NR can achieve to a more realistic figure, then you also moderate the levels of peak spreading achieved by the peak growth.

6.3.4 Secondly, whilst York makes no allowance for peak spreading in the underlying profile, they then assume that every new slot arising from the NR is operated 365 days per year. This contradicts their assertions that Gatwick's airlines prefer not to operate leisure markets year-round. Whilst some services will undoubtedly operate year-round, it is unrealistic to assume that 100% of the incremental capacity will be taken up in this way, especially as York argue that LGW's current carriers will not use their slots any more efficiently in 2047 than in 2019 in their baseline forecast.

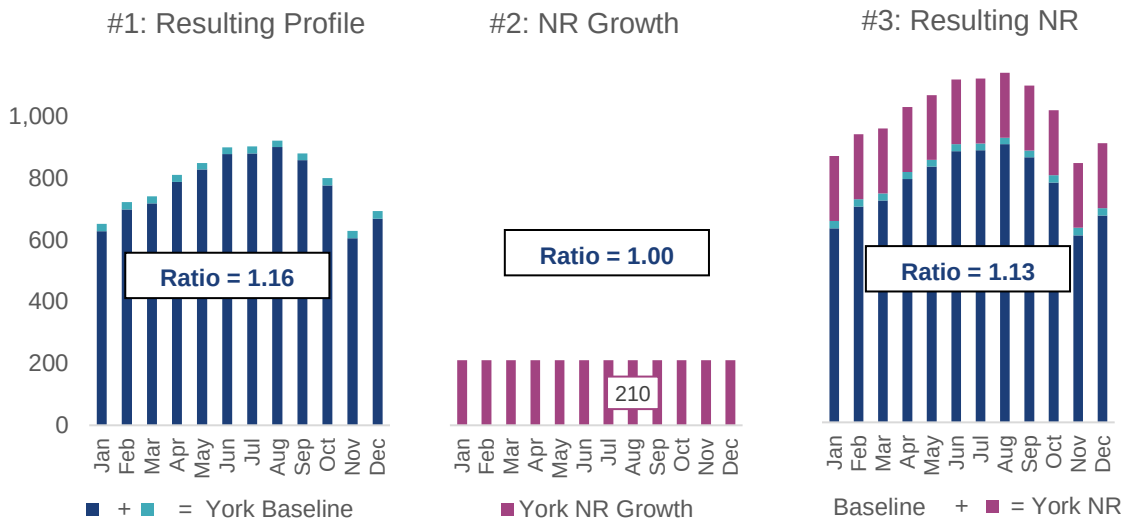
6.3.5 Combined, these two assumptions result in York assuming a reduction in seasonality between their baseline forecast and their NR forecast from 1.16 to 1.13 (York Lo for Baseline and NR).

6.3.6 The impact of York's assumptions is shown in the following chart(s).

6.3.7 In Chart 11: #1, the York ATM profile from the baseline forecast is shown. This is then combined with Chart 11: #2 which is York's overly ambitious growth forecast for the NR capacity with a completely flat profile. When these are combined,

York's resulting NR ATM profile is shown in Chart 11: #3. This results in 3 basis points of peak spreading (1.16 to 1.13)

6.3.8 Chart 11 Approximate monthly ATMs assumed by York (NR forecasts), daily ATMs



6.3.9 Using York's approach but with more realistic levels of demand growth (approximately 180 incremental in the peak) and seasonality more in line with York's assertions around seasonality of demand (e.g. 1.08), this results in the peak spreading arising from the NR reducing to between 1 and 2 basis points.

6.3.10 **Summary**: Compared to the York baseline where no peak spreading is assumed through the forecast, the NR case overstates the potential for peak spreading in part due to incorrect assumptions around peak NR capacity.

6.4. Aircraft Size / Gauge

6.4.1 The overstatement of assumptions continues with aircraft size. In York's baseline forecasts they assume an average seats per ATM of 218 but this increase to a figure of approximately 229 in the NR forecasts (229 used to align with their 75-76 mppa throughput[3]).

6.4.2 York attribute this difference due to a "*higher proportion of the incremental growth being long haul and driving up average aircraft size*", although when back solved this implies a completely unachievable share of traffic being long haul.

6.4.3 For the incremental capacity of the NR to deliver an additional 11 seats per ATM (229 vs 218, 2047) across the airport would require the NR capacity to be used by approximately 70% of long-haul traffic! Whilst we welcome York's optimism

[3] York's Low case for the NR only results in under 75 mppa so a modest uplift was applied to aircraft gauge to ensure the numbers fell in the 75-76 mppa range)

regarding the levels of long-haul demand achievable by the NR, the applicant recognises that this is unrealistic, both from a demand and operational perspective.

6.4.4 This is shown in the following table; whilst long haul traffic has materially higher seats per ATM, using an illustrative breakdown of aircraft sizes to match York's assumption for 218 seats per ATM in the baseline, to achieve the 270 S/ATM required by York for the incremental NR ATMs would require a long-haul share of NR capacity of 70%.

6.4.5 Table 5: Implications for York's S/ATM assumptions

	ATMs	S/ATM	Seats
York base	292k	218	63,656
York NRP benefit	74k	270	19,980
York NRP	366k	229	83,636

SH ATMs %	LH ATMs %	SH S/ATM	LH S/ATM	**Total S/ATM**
83%	17%	201	300	**218**
30%	70%	201	300	**270**
72%	28%	201	300	**229**

6.4.6 Assuming a more realistic uplift for the NR of approximately 60k annual ATMs would result in an even higher share of long-haul demand being required to use the NR's capacity.

6.4.7 Assuming 227 S/ATM, as per the original York Low forecasts (which result in under 75 mppa), would still require a 60% share of long haul ATMs from the NR being required to achieve the average gauge uplift.

6.4.8 In summary the S/ATM assumptions portrayed by York are significantly overstated for the NR when compared to their baseline case.

6.4.9 Summary Aircraft Size: York assume an unachievable uplift in average aircraft size in their NR project forecast.

6.5. Load Factor

6.5.1 We understand that York have assumed comparable assumptions to their baseline forecast of approximately 90% seat occupancy.

6.5.2 Given that York assume a materially higher long haul share, it may be prudent to reflect a modest negative impact on load factors under their NR scenario compared to their baseline. This is because long haul traffic has historically operated at load factors below those in the short haul market which is dominated by ULCCs and LCCs.

6.6. Summary

6.6.1 York have assumed overly ambitious assumptions for their NR scenario - the levels of incremental capacity assumed for the NR are not deliverable and the

uplift in average aircraft size is also unachievable without an unrealistic share of long-haul traffic using the NR.

6.6.2 Adjusting for these errors by York in their NR throughput calculations to maintain consistency with their baseline, the NR runway capabilities would result in a NR forecast 5.4m lower than that assumed by York. The following table highlights the impact of the assumptions discussed above.

6.6.3 Table 6: Implications of York's NR assumptions

Impact	Assumption	NR Impact
Busy Day capacity	Revise to GAL's NR capacity limits on busy day	-2.0 mppa
Peak spreading	Assume incremental NR added at 1.04	-0.8 mppa
Gauge	Revise to a more realistic LH share of NR	-2.5 mppa
Total	Combined impacts	-5.4 mppa

6.6.4 Therefore, York's gap for "*18-19 mppa*" would in fact be closer to 13 mppa once the unrealistic assumptions in their NR scenario are accounted for.

7 Miscellaneous

7.1.1 The JLA's have made some recent comments in the SoCG regarding the current short-term outlook at Gatwick, an allegation of slow recovery, the capacity release at Gatwick, and the overlap of catchment with other airports (notably STN). The Applicant considers these comments are either wrong or misleading.

7.2. Gatwick's Short-Term Performance

7.2.1 Like other airports, Gatwick is continuing in 2024 to recover from the impacts of Covid.. Gatwick's recovery has been on par with the wider UK market although a couple of the other London airports (Heathrow / Stansted) have posted slightly faster recovery profiles.

7.2.2 Whilst in the short term, Gatwick has seen a re-peak in demand , this is as a result of the market continuing to be in recovery mode, which has, constraints across the London airports' runways are less pressing than experienced in 2019.

7.2.3 In 2023 London ATMs were at 91% of 2019 demand levels. In 2024 GAL is expecting recovery to continue as ATMs track towards nearly 95% of 2019's throughput, in line with the wider London market.

7.2.4 Gatwick's initial recovery lagged other airports reflecting the mix of airlines and markets served by the airport; for example;

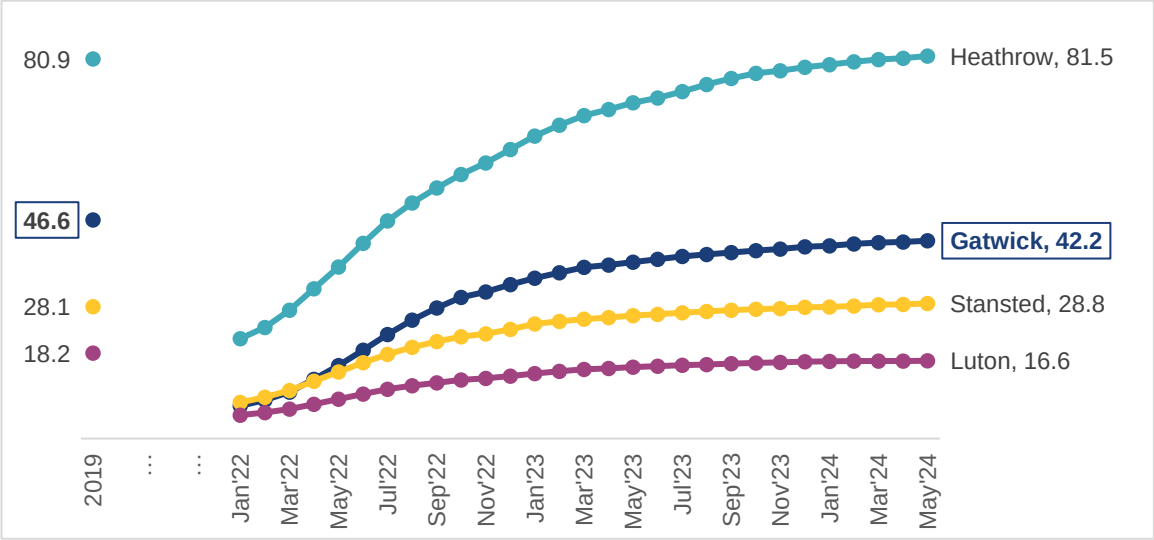
7.2.5 Gatwick's major carriers were more conservative in their growth and recovery profiles. easyJet are by far LGW's largest carrier and in 2023 they were still recovering to 2019's levels of demand whilst carriers like Ryanair and Wizz were operating at 120% and 150% of 2019 levels respectively, therefore supporting the recovery of airports such as Stansted and Luton.

7.2.6 One of Gatwick's major carriers consolidated operations at Heathrow. BA is Gatwick's second largest carrier and, with penalties removed for the non-use of slots, during the pandemic and through the early recovery period BA relocated some of their Gatwick operation to Heathrow.

7.2.7 Gatwick, unlike Stansted and Luton, has direct flights to China which is a market notable for a far more prolonged recovery period reflecting Government imposed restrictions.

7.2.8 The following chart profiles the recovery in passengers across London's largest airports. Whilst Gatwick's recovery was initially comparable to Stansted and Luton it has now clearly re-established itself as the number 2 ranked London airport.

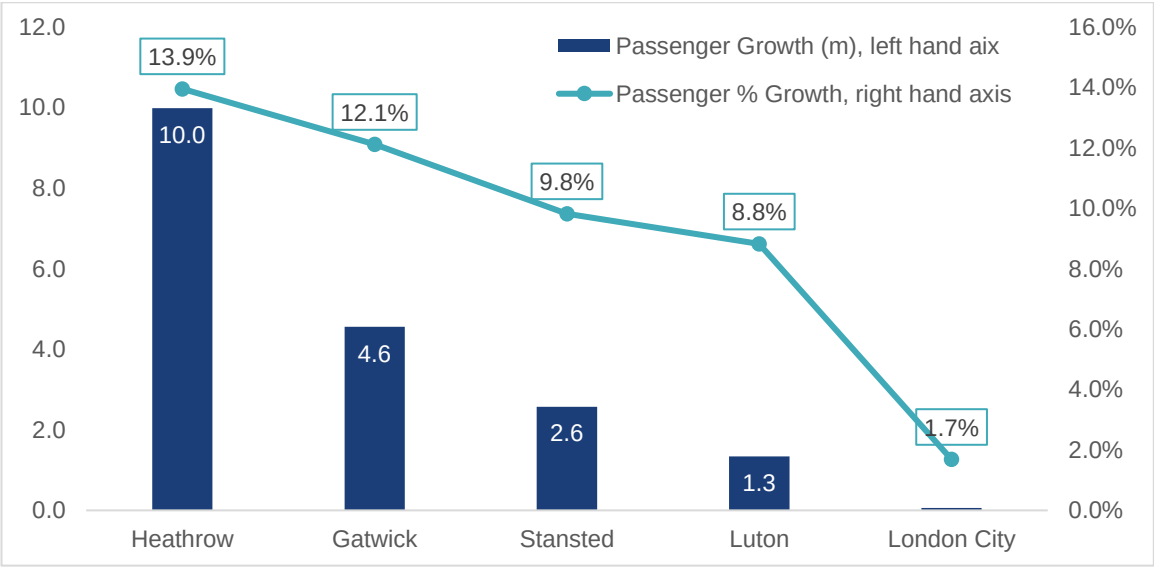
7.2.9 Chart 12 Major London Airport Passenger Recovery, m (rolling 12-months to May'24)



7.2.10 The latest recovery trends are now even stronger for Gatwick. In the 12 months to May 2024, Gatwick has posted 4.6 million passenger growth on the prior year. This growth is more than the combined growth achieved by Stansted, Luton and London City in the same period.

7.2.11 The growth achieved is 12% up on the prior year, the second fasted growing London airport just behind Heathrow but clearly ahead of the other London airports.

7.2.12 Chart 13: London Airports - Passenger Recovery (YE May-24 versus YE May-23)



7.2.13 The latest current outlook for the upcoming winter season (Winter 2024) continues this positive momentum with significant growth in passengers and movements expected.

7.3. Stansted Catchment Relevance

7.3.1 It is not agreed that the overlap between STN and LGW is as significant as stated by the JLAs.

"It is not agreed that there is limited overlap between the catchment areas of Gatwick and Stansted. Based on CAA Passenger Survey Data for 2019, there was substantial overlap between the catchment area for the two airports in London, with 37% of Gatwick's passengers having surface origins or destinations within London compared to 46% for Stansted. There was also substantial overlap in terms of the specific districts from which the two airports attracted passengers. For example, 4 of the top 10 districts overall from which Gatwick drew passengers were also in the top 10 districts from which Stansted drew passengers and for the top 20 districts, accounting for 40% of Gatwick's traffic, the overlap was 10 out of 20 shared. This indicates a substantial degree of competition between the airports for traffic." (draft SOCG)

7.3.2 Whilst a detailed profile of Gatwick and other airports' core catchment was provided in the Needs Case Technical Appendix [REP1-052, Chapter 6], further information using the catchment data from 2019 (CAA Survey) is also provided below.

7.3.3 Stansted has limited overlap in catchment (with Gatwick) compared to other airports such as LHR, for example:

7.3.4 In LGW's top catchments LGW achieved >40% share of demand, compared to 35% demand for LHR. STN achieved just 12% which is very limited compared to LHR.

7.3.5 In the long-haul market, STN barely features and does not provide any material overlap due to the lack of connectivity (just x1 route).

7.3.6 Treating London as one catchment is overly simplistic as North, South, West and East boroughs of London typically behave differently. For example, in the S. London Boroughs LGW typically achieves a share of 40% compared to STN's 15%. LHR provides the most overlap/competition with a 30% share of these catchments.

7.3.7 LGW provides more competition to STN than STN is able to provide at LGW. For example, in the North London Boroughs, STN achieves a c30% market share

whilst LGW attracts 22%. However, these boroughs account for less than 10% of LGW's total passengers and are not considered as part of LGW's core catchment.

7.4. Relocation of airline capacity

7.4.1 The JLAs suggest that airlines would ***not*** relocate from other airports to Gatwick when the NR is opened [REP7-070, para 1.1.6].

"The Applicant has provided no evidence to support the notion that airlines would relocate capacity from other airports when additional capacity is provided with the NRP. If services are already established at the other airports, there is no economic reason why airlines would relocate."

This is not credible given the clearly established preferences for Gatwick which is ranked the #2 airport in the London market for total passengers, and the #1 ranked by many airlines.

7.4.2 Gatwick has been the airport of choice for growth when compared to the likes of Stansted and Luton:

7.4.3 A range of carriers including easyJet, Wizz, Vueling, Norwegian have sought to prioritise growth at Gatwick over other London airports (**Needs Case** [APP-250], 4.1.15-17). For example, between 2005 and 2015, easyJet prioritised their growth at Gatwick over the other London airports. By 2015, easyJet had added 12.3m passengers at Gatwick to reach 17m, whilst at Luton and Stansted their demand had reduced by 160,000 and 2.3m respectively.

7.4.4 Other than LHR, LGW is the only London airport with an established secondary trading market, highlighting airlines' confidence that they can make above average returns i.e. it is preferable to invest millions getting access at Gatwick than to fly existing capacity at Luton or Stansted.

7.4.5 Carriers like Norwegian pulled all their capacity from STN when they got access to LGW slots. Long haul at Stansted has a very poor record with only a service to Dubai operating today, for example. US and Asian markets have been tried but failed. In contrast, Gatwick has a very well-established network to many of these regions.

7.4.6 Carriers that Gatwick sees demand from (e.g. many long-haul airlines) do not also request slots at airports like LTN/STN. Without Gatwick slots, they will not risk other London airports reflecting their limited appeal. (Source: ACL 2019, 2023 etc.)

7.5. Slot Release

7.5.1 The JLAs suggest that slot growth would be slow and only peak slots would be taken up [REP7-070, para 1.1.6].

"Whilst there might be some initial boost from airlines seeking peak period slots released by the NRP in the first year, the fact that these slots would be taken up early is likely to slow growth in the following years if the peak slots have already been allocated, particularly in circumstances where there is still spare capacity in the system overall, the pattern of growth overall would be expected to conform to the top down modelling."

Whilst this might be relevant at smaller airports (e.g. LTN or STN) it is not the case at Gatwick.

7.5.2 The definition of peak and off-peak slots is less relevant at LGW when compared to other less popular airports since Gatwick has a much wider traffic base to draw demand from and fill its capacity. For example, compared to other airports like Luton / Stansted with clear off-peak periods of the day:

7.5.3 LGW has an established base of long-haul demand which utilises capacity across the day. Recent growth from Asian, Middle East/other markets use slots at times of day other airports would not experience demand.

7.5.4 Demand already exceeds supply in all hours of the day. ACL slot subscriptions for e.g. Summer 2019 and S23, S24 highlight the levels of excess demand versus capacity [REP1-052 Para & chart 1.74].

7.5.5 Based aircraft use slots through the day, with demand well spread reflecting the wide range of markets served (from very short to long sectors lengths).

7.6. London Baseline & Growth Projections

7.6.1 UK/London levels of aggregate demand are forecast to grow significantly by 2050. Latest Jet Zero forecasts forecast UK aviation demand growth of 147 million passengers by 2050 vs their 2018 baseline (430m vs 283m) (**Needs Case Technical Appendix** [REP1-052], Table 20, para 6.3.8). Whilst this is below previous projections (JZ 2022), which forecast growth of 199 million passengers by 2050 (482 vs 283) (**Needs Case** [APP-250], Para 7.14), it is still significant growth above an already constrained the baseline and reflects a CAGR of 1.5% from 2018-2040 before dropping off to 0.9% in the 2040-2050 period when Gatwick would already be operating at capacity in either the baseline or NR scenario.

7.6.2 London's baseline demand has been robustly considered, correctly taking into account 'actual' local / transfer splits provided by reliable data sources.

7.6.3 London airports handled 181 mppa in 2019 (CAA).

7.6.4 LHR reported 18m transfers (vs CAA 27.1m), whilst the remaining 3 million are accounted for by LGW, STN and LTN combined. Their significance should not be overstated [REP3-080, Chapter 2 and Table at 2.1.6].

7.7. Strength of GAL's bottom-up forecasts

7.7.1 Gatwick has confidence in its bottom-up forecasts and the strength of its pipeline of demand with many airlines looking to significantly expand their footprint at Gatwick in the years ahead.

7.7.2 **ACL slot subscriptions**: Gatwick is consistently oversubscribed in all core hours of the day in the summer season. Airlines are not able to expand home or away based flying and are routinely turned away due to lack of available slot capacity.

7.7.3 **Airline engagement:** Gatwick is in regular discussions with current and potential new airlines which validates this position. All recent growth of long-haul carriers was predicted in Gatwick's pipeline report from pre-Covid.

7.7.4 These bottom-up forecasts also considered the available capacity at Stansted (43 mppa) and other airports whilst also reflecting the limited ability of some other airports to grow in overlapping traffic segments (e.g. Long-haul demand growth limited at LHR)

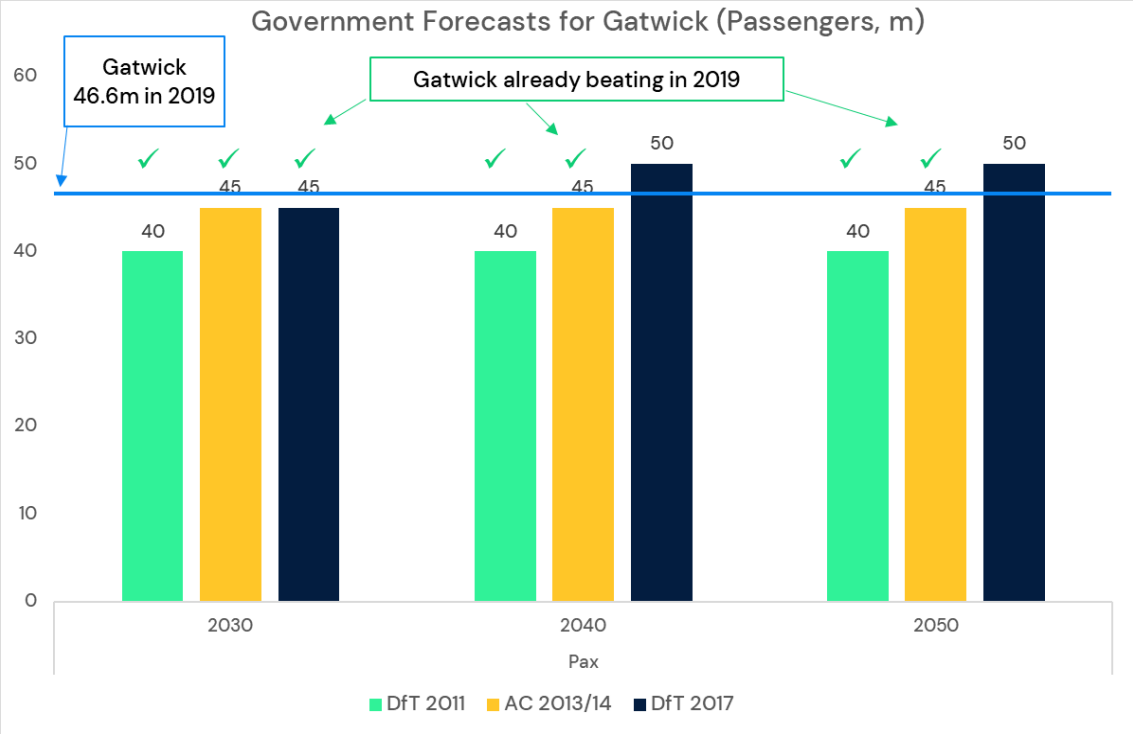
7.7.5 Gatwick has strong confidence in continuing to out-perform top-down models:

7.7.6 DfT forecasts from 2011 forecast LGW would only reach 40 mppa and by 2030. Gatwick in fact passed the 40 mppa mark in 2015 (note: LGW had just 33m in 2011)

7.7.7 DfT/AC forecasts from 2013 forecast LGW would only reach 45 mppa by 2030. Gatwick in fact passed the 45 mppa mark in 2017 (note: LGW had just 35m in 2011).

7.7.8 DfT forecasts from 2017 forecast LGW would not pass 45 mppa by 2030 and reach 50 mppa by 2040. Gatwick passed 45 mppa in 2017 and subsequent years pre Covid. With capacity returning and larger aircraft arriving, LGW expect to beat this mark within a few years.

7.7.9 Chart 14: Previous Gatwick top down performance / forecasts (DfT)



7.7.10 Gatwick therefore continues to favour their bottom-up forecasts.

7.8. Sensitivities

7.8.1 Sensitivities set out in **Needs Case Technical Appendix** [REP1-052] Chapter 7, have been prepared to model:

7.8.2 **Slower ramp up**: This included more recent slower demand outlook assumed to align with Jet Zero 2023 forecasts. Whilst the NR would fill more slowly under a top-down approach and lower demand outlook, the NR is forecast to be operating at its capacity by the late 2030s.

7.8.3 **LHR R3**: this reflects the opening of LHR R3 in the mid 2030s. Gatwick can provide capacity many years before LHR and provide connectivity, consumer and economic benefits. Capacity at both airports will provide increased resilience and operational performance.

7.8.4 **LTN / LCY capacity**: LCY provides relatively limited overlap with Gatwick given their focus is on inbound business-oriented routes. Luton's major uplift in capacity is not likely before the very late 2030s and would only have a very modest impact on LGW's NR performance. By the time LTN's new terminal is open Gatwick will already be at capacity.

Appendix 1: Email Correspondence with York

From:	Louise Congdon
To:	Jonathan Deegan
Cc:	John Rhodes
Subject:	RE: Alignment on the basis of your future baseline
Date:	08 August 2024 11:38:39
Attachments:	image001.png image002.png 240805 York baseline confirmation document.pdf

Jonathan,

I have marked up some comments on the attached ahead of our meeting tomorrow. However, I am not sure where this note takes us or the ExA as the point at issue is not the mathematics – save that a shift from 1.17 to 1.16 in terms of the peak to annual ratio is not 'no peak spreading' as stated in absolute terms at the hearing and is, of course, a more material spreading of the peak when the adjusted post-pandemic profile is taken into account. The difference between us is the extent to which there is actual evidence that airlines are willing to grow so substantially outside of peak periods as to deliver your baseline case.

We can discuss further when we meet.

Best regards,

Louise

Managing Partner
York Aviation LLP
Atlas House
Old Hall Street
Macclesfield
Cheshire
SK10 2DT

[redacted]

website: www.yorkaviation.co.uk

Follow us on:

copy of our privacy notice here.

From: Jonathan Deegan [redacted]
Sent: Monday, August 5, 2024 8:22 PM
To: Louise Congdon [redacted]
Cc: John Rhodes [redacted]
Subject: Alignment on the basis of your future baseline

Hi Louise,

We mentioned last week that we wanted to make sure we were not misrepresenting your forecast assumptions for the future baseline.

We have prepared the attached note, which we think captures the components of your assumptions, based on our previous exchanges.

I would be very grateful if you could check it through and let me know if it is accurate please. Many thanks.

Kind regards,

Jonathan Deegan
NRP Programme Lead
[redacted]

www.gatwickairport.com

Confirmation of YA Baseline Assumptions

5th August 2024

Table of Contents

1 York's Baseline forecast - Confirmation

1.1.1 The purpose of this document is to help make sure that GAL and York Aviation have an agreed understanding of the numerical basis for York Aviation's future baseline forecast.

Summary of York numbers

1.1.2 York considers their low case to be the most realistic baseline for Gatwick and explained this further in their D6 submission [REP6-099].

1.1.3 It is noted that the numbers discussed in their D6 submission differ slightly from those offered in their sensitivity analysis [REP4-049] although for these purposes we have assumed they are comparable to enable us to use the detailed numbers provided to the Applicant.

1.1.4 York's position "*Based on our assessment of the expected aircraft size and load factor, it seems likely that the most realistic Baseline throughput would be of the order of 57 mppa, with around 292,000 annual aircraft movements, an increase of 3% in annual commercial aircraft movements and 22% in passengers above the peak levels handled in 2019.*" [REP6-099] paragraph 16.

1.1.5 This is comparable to the 56.8m provided by York's Low case, which was set out in its Rule 17 Response document [REP4-079] in Table 2 and paragraph 38.

1.1.6 As a result, and using information provided by or confirmed with York Aviation, GAL understands York Aviation's future baseline forecast to be comprised from the assumptions set out in Table 1.

1.1.7 **Table 1: Gatwick Baseline - York Low, Assumptions (2014 & 2019 from GAL actual) Source: YA (2032-47), [REP4-049 for 2047 Aug avg., annual avg., seats per ATM, load factor, Annual ATMs, annual passengers. Numbers for 2032 and 2038 provided via email on 15th of May to Gatwick]**

	2014	2019	2032	2038	2047
ATM: August (Peak day)	892	928	*c949**	*c949**	*c949**
ATM: August (avg. day)	851	900	921	921	921
ATM: Annual (avg.)	698	769	793	793	793
Peak Month Ratio	5%	3%	3%	3%	3%
Peak Month Ratio (Aug.:Avg.)	1.22	1.17	1.16	1.16	1.16
Seats per ATM	179	192	210	215	218
Load Factor	84%	86%	88%	89%	90%
ATMs, Annual (k)	**255**	**281**	**290**	**290**	**290**
Passengers, Annual (m)	**38.3**	**46.6**	**53.5**	**55.4**	**56.8**

Note: Commercial ATMs
*Discussed/shared and confirmed with York as appropriate

Summary of Comments on Confirmation of YA Baseline Assumptions

Page: 3

Number: 1 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 09:21:03
We did not prepare forecasts but made an assessment of the demand that the Baseline capacity could realistically accommodate

Number: 2 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 09:52:16
REP4-049 presented the calculations. The D6 submission was a summary of the broad position. There is no material difference.

Number: 3 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 10:59:21
YAL has no means of validating historic numbers and has worked from CAA Airport Statistics only

Note:

1.1.7.1. ATM: August (Peak day): Busiest day of year for ATMs

1.1.7.2. ATM: August (avg. day): The average number of ATMs per day in August

1.1.7.3. ATM: Annual (avg.): The average number of ATMs per day in the year

1.1.7.4. Peak vs Aug Avg.: The ratio of Peak day of peak month: Avg. day of peak month

1.1.7.5. Peak Month Ratio (Aug:Avg.): The ratio of Avg. day of peak month: Avg. day of year

1.1.7.6. Seats per ATM: Average seats per ATM (reflects aircraft size)

1.1.7.7. Load Factor: Seat occupancy rate

August Peak Day

1.1.8 Through exchanges with York, which are contained in Appendix A to GAL's REP5-081, it was confirmed that a busy day of approximately 950 ATMs was assumed within their forecasts.

1.1.8.1. York have therefore assumed peak day growth of approximately 20 ATMs per day (from 928 in to 2019 to approximately 949 in 2032/38/47)

1.1.8.2. We understand York have assumed this growth in the peak day reflecting the additional slot capacity released by Gatwick, as well as some modest growth in the peak day reflecting current spare capacity, and recognising that Gatwick previously achieving busy day demand of c940 commercial ATMs (e.g. in 2016 and 2017).

August Average Day (supplied by YA)

1.1.9 The peak day growth is mirrored by the growth of the average day in August (again growth of approximately 20 ATMs per day (from 900 to 921,). These figures are also contained in Appendix A to REP5-081, in York's email of 15 May.

1.1.9.1. Therefore, the ratio of the peak day in August to the average day in August is maintained very close to 2019's levels throughout the forecast period (i.e. a 103% ratio, calculation = 949/921 – as confirmed in the slide deck contained in Appendix A of REP5-081).

1.1.9.2. York assume no further growth in the average August day after 2032.

Annual Average Day (supplied by YA)

1.1.10 The average day of the year is also assumed to grow by 24 ATMs per day (from 769 to 793, row 3). This means that effectively the limited growth in the peak day (see above) is assumed to be operated on a year-round basis (the annual average of 793 movements was set out by York in their email of 15 May and confirmed through the confirmation from York on 21 May that GAL's understanding set out in slides is "broadly ok"). This exchange is again contained in Appendix A of REP5-081.

1.1.10.1. Again, the average day of the year and hence total annual ATMs does not change through the York forecasts resulting in 290k annual ATMs in each year of the forecast.

Page: 4

Number: 1 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 11:02:28

This is GAL's assessment not YAL's. As we has no way of verifying peak day data, we accepted GAL's estimate as 'broadly OK' see e-mail. We do not otherwise comment on the specifics of the busy day.

Number: 2 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 11:03:18

beyond 2032

Number: 3 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 11:04:45

Note again these are not forecasts but interpretations of attainable throughput

Peak month ratio (calculated from YA numbers)

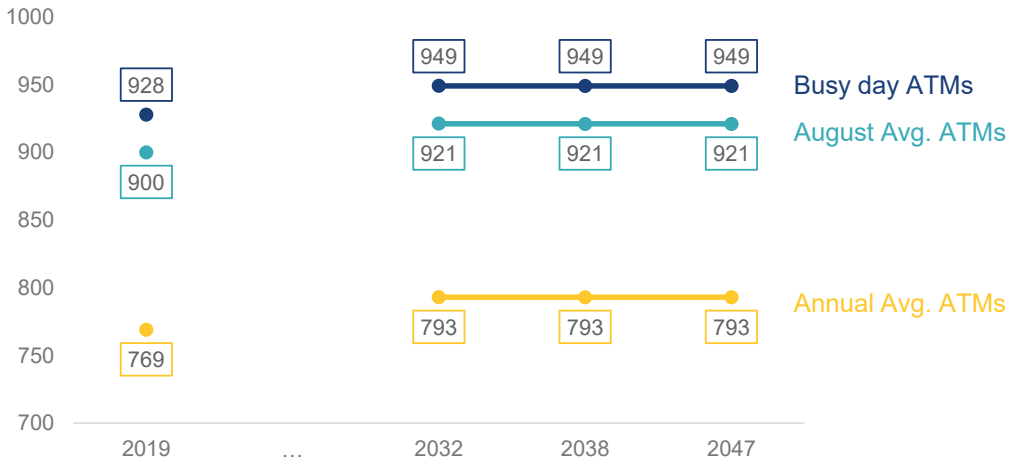
1.1.11 Consequently, the peak month ratio does not change through the forecast. The peak (day) growth supports the very modest levels of overall peak spreading (1.17 to 1.16).

1.1.12 This peak month ratio is maintained unchanged throughout York's forecast years for 2032, 2038 and 2047.

Summary of Main ATM related Metrics

1.1.13 The following chart captures York's assumptions regarding ATM growth at Gatwick for the baseline.

1.1.14 Figure 1: York Baseline ATM Assumptions for Gatwick



Seats per ATM (supplied by York)

1.1.15 The average aircraft size was provided by York growing from 210 in 2032 to 215 in 2038 and 218 in 2047

Load Factor (supplied by York)

1.1.16 The load factor provided by York grows from 88% in 2032 to 89% in 2038 and 90% in 2047

Annual ATMs (supplied by York)

1.1.17 These were provided by York remaining flat at 290k annual movements in each year (2032, 2038 and 2047).

Annual Passengers (supplied by York)

1.1.18 These were provided by York and verified to match the calculation of:

1.1.18.1. Annual ATMs X Seats per ATM X Load Factor = Annual Passengers

Number: 1 Author: Louise.Congdon Subject: Sticky Note Date: 08/08/2024 11:06:48

Not YAL forecasts - we have worked to interpreting GAL forecasts. Hence, we essentially cap the Airport when the demand forecasts reach the point that the hourly and daily capacity is effectively full in terms of meeting a realistic profile of how airlines demand slots.

Appendix 2: Gatwick Submission & York Assumptions

1.1.1 This appendix provides a visual summary highlighting the overall conservative nature of York's assumptions in light of historical trends and future market trends continuing to play a factor in Gatwick's future traffic performance.

1.1.2 Each of the main drivers of growth are considered in turn, prioritising the main areas of divergent assumptions.

Inter-month peak spreading:

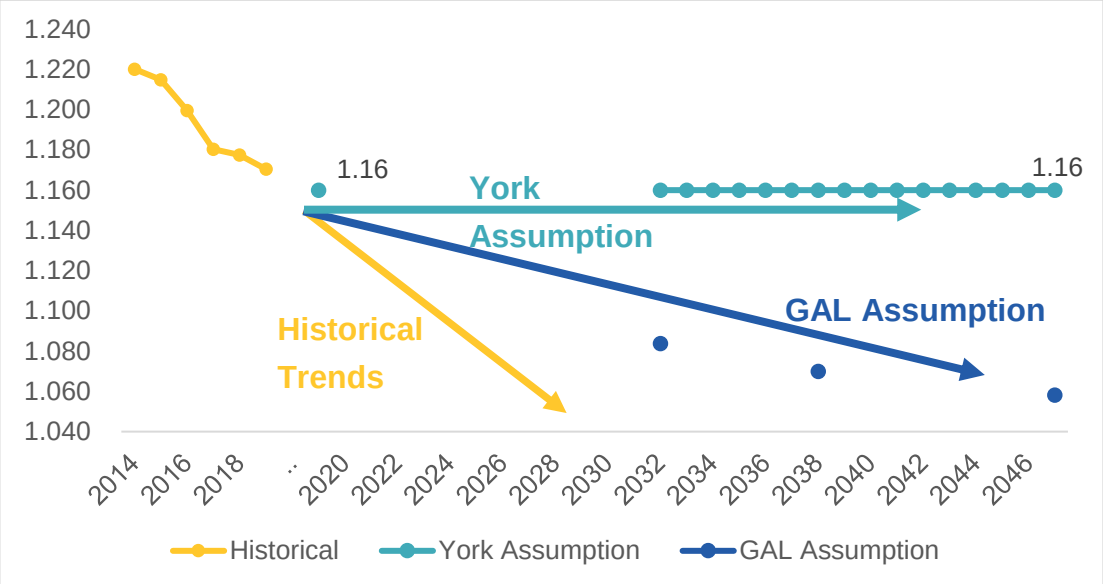
1.1.3 Summary: "JLAs assume virtually no change in future seasonality ratios"

1.1.4 To demonstrate the conservative assumptions made by York under their baseline scenario, the historical development of Gatwick's seasonality ratio is plotted in the following chart alongside York's assumptions.

1.1.5 It is clear that the JLAs assume virtually no change in seasonality across the next 30 years, despite a clear trend of reduction observed from 2014 to 2019.

1.1.6 It is not credible that these trends will just 'stop', especially at a constrained airport such as Gatwick in a constrained London market.

1.1.7 Chart 1: Comparison of Peak Month Ratio (Ratio = Aug Avg. ATM / Annual Avg. ATMs)

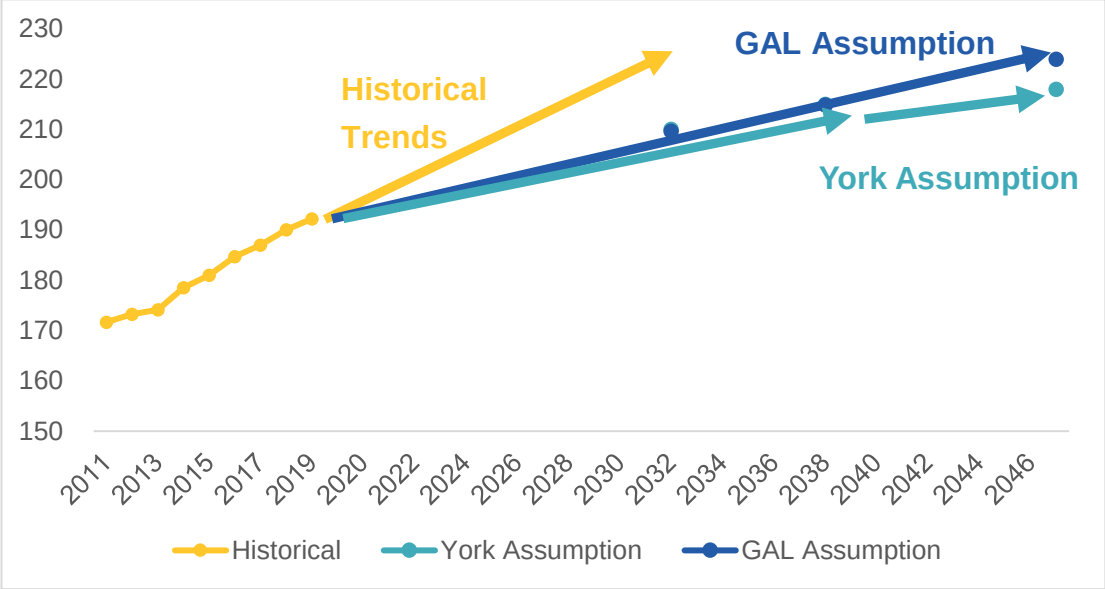


Seats per ATM

1.1.8 Summary: “JLAs assume very conservative growth in aircraft size, especially in the long term”

1.1.9 To demonstrate the conservative assumptions made by York under their baseline scenario, the historical development of Gatwick’s average aircraft size (measured as average seats per movement) is shown in the following chart.

1.1.10 Chart 2: Comparison of Gatwick’s Average Seats per ATM



1.1.11 Gatwick have highlighted that recent fleet orders by Gatwick’s major carriers will likely mean that Gatwick outperforms the DCO submission assumptions for aircraft size. Despite this information, York have adopted a highly conservative view in the long term,

1.1.12 In the long term, York assumes marginal growth. For example, in the 2038-47 period just 3 additional seats per movement are assumed which is equivalent to just 1.2 years of growth pre-covid.

1.1.13 It is not credible that airlines will just ‘stop’ up-gauging in the 2030-2040s as the London market will be even more constrained than it is today, and efficiency driven by carbon targets drives larger aircraft. The assumptions regarding aircraft size should be in no way considered a ceiling. For example, the short haul aircraft dominating current fleet order books is the A321neo which can hold over 235 passengers. When factoring in long haul aircraft (typically 300+ seats), there is clearly further potential for growth.

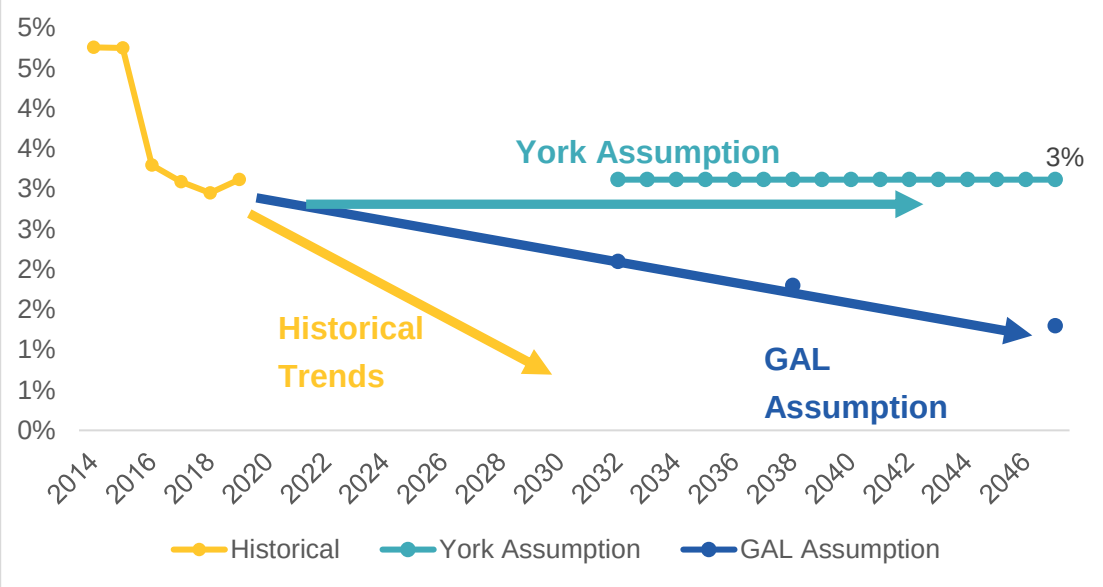
Intra-month spreading:

1.1.14 Summary: “The JLAs assume no in-filling of quieter days, even in the peak month”

1.1.15 This assumption is captured in the following chart contrasting historical trends for intra-month spreading against a steady state assumption for York’s assumptions.

1.1.16 Essentially the JLAs assume no change in the intra-month profile, i.e. the quieter days do not become any busier over the next 30 years, in stark contrast to historical trends and at odds with expectations for a constrained London market in the next 20+ years.

1.1.17 Chart 3: Peak day of August % higher than Avg. August day (ATMs)



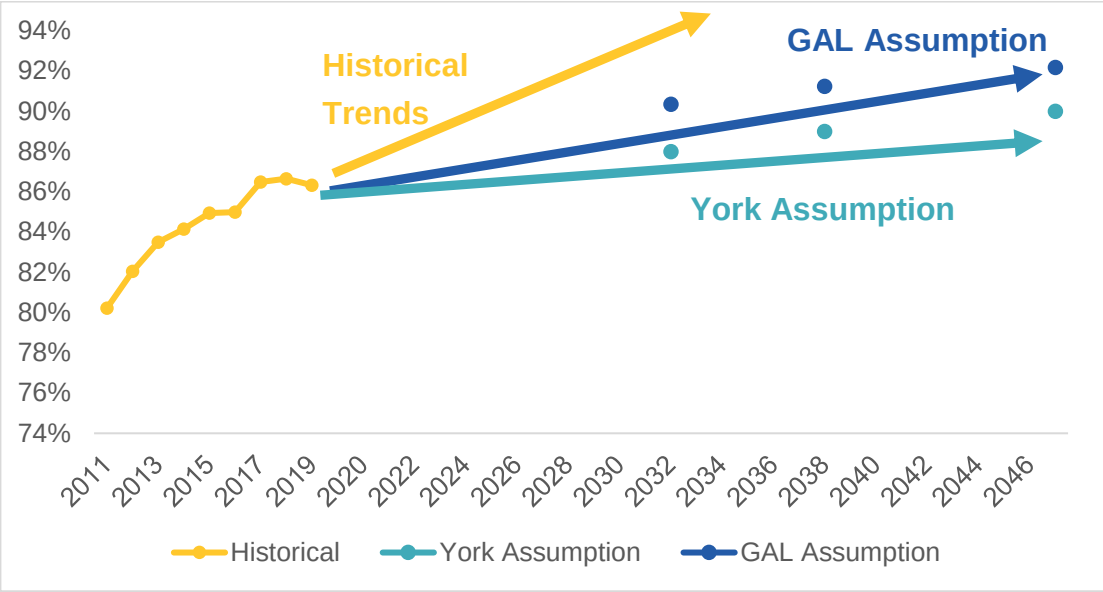
Load Factors

1.1.18 Summary: “The JLAs assume limited long term growth in load factors”

1.1.19 Whilst growth in seat occupancy rates has slowed, there is still opportunity to grow. Over the 2019-2047 period Gatwick assume an uplift in load factors less than was achieved in the 8 years leading up to 2019.

1.1.20 Many of Gatwick’s most efficient operators already achieve load factors >90% today. Over the course of a 30-year forecast in a constrained London market, further upside exists.

1.1.21 Chart 4: Gatwick Load Factor Comparison


94%
92%
90%
88%
86%
84%
82%
80%
78%
76%
74%
Historical
Trends
GAL Assumption
York Assumption
2011
2013
2015
2017
2019
2020
2022
2024
2026
2028
2030
2032
2034
2036
2038
2040
2042
2044
2046
Historical
York Assumption
GAL Assumption