Revision to The Airport Slot Allocation Regulations using the Retained EU Law Act

Lead department	Department for Transport
Summary of proposal	The proposal is to expand the conditions under which JNUS (Justified non-utilisation of slots) can be granted. This enables airlines to apply for an exemption in the rules governing the take-off and landing slots at airports. The proposal also updates the definition of which airlines can qualify as new entrants in slot allocation.
Submission type	Impact assessment (IA) – 17th April
Legislation type	Secondary legislation
Implementation date	TBD
Policy stage	Final
RPC reference	RPC-DfT-5348(1)
Opinion type	Formal
Date of issue	19 July

RPC opinion

Rating[1]	RPC opinion
Fit for purpose	As originally scrutinised, the IA was deemed not fit for purpose. The RPC considered there was no evidence in the IA to support the likelihood of a 'mid-shock' health crisis occurring in the 10-year appraisal period; that further justification was needed as to why temporary legislation was not used in the counterfactual scenario; and that a number of direct impacts to business, including familiarisation costs, administrative costs and adjudication costs were not monetised. The Department has now correctly identified the direct impacts on business in the EANDCB, and presented the impacts as not quantified to reflect the uncertainty of a health shock occurring. The Department assesses that the policies are not expected to negatively impact SMBs but could consider any appropriate mitigations for medium sized businesses.

[1] The RPC opinion rating is based only on the robustness of the EANDCB and quality of the SaMBA, as set out in the Better Regulation Framework. RPC ratings are fit for purpose or not fit for purpose.

Business impact target assessment

	Department assessment	RPC validated
Classification	Zero – qualifying (unquantified OUT)	Zero – qualifying (unquantified OUT)
Equivalent annual net direct cost to business (EANDCB)	JNUS: -£85.5m NER: £0.0001m - £0.0007m (initial IA estimate) JNUS: NQ NER: £0.0003m - £0.001m (final estimate)	JNUS: NQ NER: £0.0003 - £0.001 *(2019 prices, 2020 pv)*
Business impact target (BIT) score	BIT no longer required	BIT no longer required
Business net present value	JNUS: NQ NER policy: -£0.002m - -£0.008m	JNUS: NQ NER policy: -£0.002m - -£0.008m
Overall net present value	JNUS: NQ NER: £1.3m - £3.9m	JNUS: NQ NER: £1.3m - £3.9m

RPC summary

Category	Quality[2]	RPC comments
EANDCB	**Green**	The Department has taken an appropriate approach to estimating the EANDCB by correctly identifying the direct impacts of the proposal and presenting the best estimate of the business impact as unquantifiable as a point estimate.
Small and micro business assessment (SaMBA)	**Green**	The Department assesses that the policies are not expected to negatively impact SMBs but could consider any appropriate mitigations for medium sized businesses.
Rationale and options	**Satisfactory**	The IA outlines the problem under consideration but could benefit from providing some evidence to support the incentives for ghost flights. The Department has not included non-regulatory options and could have given more consideration to these in the IA.
Cost-benefit analysis	**Satisfactory**	The IA appraises a range of costs and benefits across all policy options and has utilised data from a range of sources. The IA could benefit from further discussing the 28% probability for a health shock scenario used for the indicative EANDCB estimate and how the National Risk Register

[2] The RPC quality ratings are used to indicate the quality and robustness of the evidence used to support different analytical areas. The definitions of the RPC quality ratings can be accessed here.

		estimate compares with others. The Department does well to discuss the uncertainties in the analysis but could have conducted further sensitivity analysis to test key assumptions that underpin the analysis.
Wider impacts	**Satisfactory**	The IA considers some of the wider impacts of the proposal on innovation, competition, equalities, justice and trade, but could provide some further discussion on the trade impacts.
Monitoring and evaluation plan	**Satisfactory**	The Department sets out the metrics that could be used to evaluate the success of the policy, research questions and possible data sources. The IA could expand on how it expects to retrieve data.

Response to initial review

As originally submitted, the IA was not fit for purpose for 3 reasons:

1. The Department's assessment of business benefits from the expansion of JNUS (which largely drives the EANDCB) were measured against a counterfactual scenario (Option 0A) of a 'mid-shock' health crisis occurring. However, there was no evidence in the IA to support the likelihood of a shock of this size occurring in the 10-year appraisal period. Therefore, the assessment of business impacts against this counterfactual could not be validated by the RPC.
2. Equally, if a shock was to occur, the Department needed to further justify why temporary legislation was not used in the counterfactual scenario.
3. The Department had not monetised a number of direct impacts to business, including familiarisation costs, administrative costs and adjudication costs.

The Department has now:

1. Reflected the uncertainty in estimating the probability of a health shock occurring by presenting the best estimate of the business impact as unquantifiable as a point estimate. The Department also *indicatively* estimates that Option 1 will save businesses £23.7m per year, now based on a 28% probability of a 'mid' health shock scenario occurring in the next 10 years.
2. Justified why temporary legislation could not be used in the counterfactual scenario, explaining that temporary legislation would need to be implemented before each scheduling season to grant alleviation, and only then if a suitable primary legislation vehicle can be progressed through Parliament at pace.
3. Included familiarisation costs in the EANDCB estimate, alongside an explanation of how they have been calculated. The Department has also further justified why administrative and adjudication costs cannot be monetised.

Summary of proposal

An airport 'slot' is a permission to use all necessary airport infrastructure to operate an aircraft at a specified date and time for take-off or landing at the airport in question. Airport slots are governed by Regulation (EEC) No 95/93, Article 10 of which provides for the Justified Non-Utilisation of Slots (JNUS). JNUS enables an airline to apply for exemption from the rules governing slot holdings under certain conditions.

The Department for Transport (DfT) would like to update the Regulation to expand the conditions under which JNUS can be granted to permanently include pandemics or similar health emergencies. DfT would also like to update the Regulation to change the new entrance rule (NER) to change the definition of which airlines can qualify as new entrants, specifically to allow airlines holding fewer than seven slots rather than fewer than five slots a day to qualify as new entrants. These amendments could be made through the Retained EU Law Act.

The Department considers four options:

- Option 0: Do nothing
  - Option 1 is assessed against two baselines, 0A (airlines operate the maximum number of ghost flights) and 0B (airlines do not operate ghost flights)
  - Option 2 is assessed against baseline 0C (no changes to the New Entrant Rule)
- Option 1: Update the Regulation to allow pandemics or similar health emergencies to be covered by JNUS
  - Option 1A is to update the regulation, but using Emergency Legislation on an ad hoc basis.
- Option 2: Update the regulation to change the New Entrant Rule (NER) to allow airlines who hold fewer than seven (rather than fewer than five) slots a day at an airport to qualify as new entrants
- Option 3: (Preferred option) Update the regulation regarding JNUS and the NER

The Department estimates that the impact of expanding JNUS provisions (Option 1) is unquantifiable as a point estimate, but *indicatively* estimates that Option 1 will save businesses £23.7m per year, consisting of savings on operator costs minus the impact of reduced airport profits. The Department estimates that the proposal to change the NER will produce a negligible net cost to business of between £0.0001m and £0.0007m per year, consisting of producer surplus impacts.

EANDCB

Direct/indirect impacts

The Department estimates that the proposal to expand JNUS provisions (Option 1) will produce a net benefit for businesses consisting of savings on operator costs minus the impact of reduced airport profits and a minor familiarisation cost. The best estimate of the business impact is unquantifiable as a point estimate, as there is insufficient evidence to robustly estimate the probability of a health shock occurring in the appraisal period. Instead, the Department *indicatively* estimates that Option 1 will save businesses £23.7m per year, based on a 28% probability of a 'mid' health shock scenario occurring in the next 10 years. The impacts of Option 1 relative to Option 0B are non-monetised. The Department also estimates that the proposal to update the NER (Option 2) will produce a negligible net cost to business of between £0.0003m and £0.001m per year, consisting of producer surplus impacts.

The IA states that the actual impact of Option 1 is likely to lie between Option 1 assessed against Option 0A and Option 0B, as the more likely baseline scenario is some airlines running ghost flights and others not running ghost flights. Therefore, the IA could consider applying an appropriate adjustment to reflect this more realistic impact.

Counterfactual/baseline

The Department's assessment of business benefits from the expansion of JNUS (which largely drives the indicative EANDCB estimate) are measured against a counterfactual scenario (Option 0A) where there is a 28% chance of a 'mid-shock' health crisis occurring, subsequently causing airlines to run ghost flights. As the probability of this shock occurring in the 10-year appraisal period is inherently uncertain, the Department adjusts the counterfactual to reflect the likelihood of a pandemic occurring, specifically applying a 28% probability weighting of a pandemic occurring in the next 10 years. This weighting is based on the National Risk Register estimate of a 15% probability of a pandemic occurring in the next 5 years. This approach appears reasonable to reflect the inherent uncertainty within estimating the likelihood of health shock occurring in the appraisal period. However, the IA would benefit from further discussing the methodology behind the 28% assumption, particularly when compared to CAA and Heathrow shock factors. This is discussed in the Cost-Benefit analysis section below.

Changes to the NER (Option 2) is measured against a baseline scenario, Option 0C, where the requirement for a New Entrant to hold fewer than five slots at a particular airport on a given day remains. The preferred option (Option 3) is to simultaneously implement both Option 1 and Option 2. Therefore Option 3 has no unique baseline, but accounts for the counterfactuals captured in Option 0A, 0B and 0C.

Missing impacts

The main monetised impact from Option 2 is the producer surplus received by airlines, calculated based on how the change in passenger numbers drives the

change in the shadow cost (the additional profit airlines will capture based on the fare and average cost per passenger). However, Option 2 does not include an impact to reflect the overall value of the premium airlines expect to earn for holding the historic rights to a slot series over a number of seasons, that will be displaced and reduced by the slots now being allocated by new eligible airlines. This impact is considered as a transfer impact for Option 1 (when compared against Option 0B) and the IA could include this (or justify against including this) for Option 2.

Proportionality

The RPC expects that a lower level of analysis and evidence gathering will be applied for smaller measures when compared to larger ones. In light of this, the level of analysis included in this IA could be considered disproportionate to the expected impacts of the proposal (even when the EANDCB estimate of -£23.7m is taken) and the analysis considered complex for a lay reader. Therefore, the Department could have placed further consideration on whether the level of analysis undertaken in this IA is proportionate.

SaMBA

The IA has provided a sufficient SaMBA. Exemptions are not appropriate as the proposal is likely to be beneficial for business and any *theoretical* negative impacts on SMBs have been assessed to be proportionate to the size of the business.

Scope of impact on SMBs

The Department assesses that the policies are not expected to negatively impact SMBs, as slot-coordinated airlines and airports tend to be medium-or large-size. Additionally, any burdens that could *theoretically* affect small businesses are expected to be minimal (such as producer surplus impacts, negligible familiarisation costs and impacts to upstream business), as the proposal is designed to be beneficial for business. Any theoretical burdens are also expected to be proportionate to the size of the businesses, as they correlate directly with the number of ghost flights that an airport operates or would co-occur with the realised benefits.

Exemption and mitigations

An exemption for SMBs is not appropriate as it would explicitly undermine the key objectives of effective slot allocation and improved competition. Furthermore, an exemption is not required as the proposal is expected to benefit business.

Despite the expected small size of the impact, the IA could still benefit from discussing any potential mitigations for impacts on upstream or downstream SMBs and ACL (Airport coordination limited, the slots coordinator with around 40 employees), such as providing guidance to assist the transition to the new policies.

Medium size business consideration

The IA states that some medium-sized businesses will be impacted by the policies, such as Bristol Airport, which has 350 employees. Similarly to the assessment for SMBs, the IA argues that any burdens *theoretically* affecting medium-sized businesses are expected to be minimal and proportionate to the size of the business. However, the IA could have benefitted from identifying the exact number of medium-size businesses impacted, as well as detailing any potential mitigations for these.

Rationale and options

Rationale

The IA outlines the problem under consideration for Option 1, explaining how low demand during the Covid-19 pandemic created potential incentives for airlines to operate ghost flights and flights with low load factors. The IA could benefit from providing some evidence of these incentives to support this argument. In the absence of quantitative data, the IA could have considered qualitative evidence from the airlines affected (perhaps through the consultation), literature or international data. Furthermore, as the main problem considered in the IA is the incentive for airlines to operate ghost flights, the IA could benefit from providing further explanation on the rationale for Option 1 against Option 0B, where it is assumed no ghost flights are operated.

The IA could also discuss the relevance of “scarcity rent” in relation to the proposal. Scarcity rent refers to excess over normal profits earned because of limited supply in relation to demand. Although, the policy is aiming to address excess supply of slots (rather than demand), the IA could discuss how scarcity rent could be applied to understand the impacts of slot allocation rules at airports where there is the different scenario of excess supply. This has been well-researched at congested airports, in particular at Heathrow. The IA could also expand upon the methods employed by other countries for slot allocation to support the rationale for intervention, detailing the historical changes to EU slot rules since they were originally introduced. This should include analysis of what changes have been enacted over time, what has been considered but not implemented, and the reasoning behind these decisions.

The IA could also benefit from clarifying the scope of the conditions under which JNUS can be granted, as set out in the policy background. It is not clear whether the conditions (and the relevant shock probability assumptions) also include terrorism, financial disruption and other crises as well as health pandemics, as the IA states that it covers *“Other highly disruptive events”* (Page 9). The IA should clarify this to ensure the assumption on the shock probability is correct, to ensure the rationale for intervention is clear for a lay reader and to ensure legal certainty, as the wider the potential remit of the conditions, the greater the potential for a negative impact on competition.

The IA also outlines the problem for consideration for Option 2, evidencing the highly concentrated and constrained slot shares of airlines at Heathrow and Gatwick. The Department identifies the market failures that currently exist, such as the lack of

consistency and increased restriction, but could be improved by making reference to market imperfections such as externalities and information failures.

It is also worth noting that the current regulations (under Option 0, do nothing) define 'new entrants' as 'air carriers' rather than 'airlines', meaning that an air carrier belonging to an airline group would qualify as a new entrant even if its parent airline has an established presence at the airport. The IA should clarify whether this definition is changed under implementation of Option 2, as this current definition risks undermining the objectives to reduce barriers to entry and improve competition. Furthermore, the IA should confirm whether the proposed change to the NER applies to code shares.

Options

The IA considers five options, including three do-nothing options. The IA has not included non-regulatory options, explaining that the problem is unlikely to resolve itself or be resolved by measures other than regulatory intervention. The IA could have given more consideration to the non-regulatory option, as this may align with existing regulatory options, such as guidance for airlines to disincentivise ghost flights and new informal standards for ACL slot allocation.

Cost-benefit analysis

Methodology

The NSPV for Option 1 (when measured against 0A) is estimated to range between £0 and £11,136m. As with the EANDCB, a point estimate for the best estimate has not been provided due to uncertainty. The NSPV for Option 1 (when measured against 0B) is non-monetised but is assumed to be small. The NSPV for Option 2 is estimated to lie in a range of £1.8m and £5.3m. In order to calculate these estimates, the IA appraises a range of costs and benefits across all policy options, including the benefit from reduced emissions (which drives the difference between the business NPV and the NSPV), reduced airport profits, savings in operator costs and changes to producer surplus.

The NPSV estimates for Option 2 largely consist of the carbon emissions benefit resulting from changes in airlines using pool slots, alongside a small producer surplus impact, which the IA states is likely to be an underestimate. The overall producer surplus is negative for all profiles (a set of rules used to simulate new slot allocations) across both airports (except Profile 2 at Heathrow), a result which aligns with the estimated loss in passengers estimated in Figure 59. The IA helpfully provides some explanation for these findings, although it could benefit from providing some broader discussion on how these results reflect the policy aims and if these results are expected to remain in the long term.

Evidence and data

The Department has utilised data from a range of sources, including from the CAA (Civil Aviation Authority), the RDC (a global aviation data provider) and ACL. The IA has done well to discuss the strengths and limitations of the data sources throughout the IA.

The IA also uses values from Frontier Economics to estimate the value of the avoided transfer of a slot series, a benefit received by airlines in Option 1 relative to the counterfactual where airlines choose not to operate ghost flights. Despite this impact being presented as a transfer, the IA could have benefitted from providing more detail on how these values were derived by Frontier Economics, as it could be argued that different airlines and groups value this premium differently, and this impact could be expanded to capture this.

The IA makes use of the National Risk Register to estimate the probability of a pandemic occurring in the next 10 years. While the use of a 28% probability for a health shock scenario is grounded in the National Risk Register estimate, it is not clear whether this includes both the (i) probability of a pandemic and (ii) the subsequent and different probability that there is an impact on international airline traffic through a government-imposed lockdown and a behavioural response by consumers. It is also not clear whether the 28% estimate accounts for terrorism, financial disruption and other crises as well as health pandemics. Furthermore, the 28% assumption is considerable, particularly when comparing evidence from CAA and Heathrow in the price regulation process which uses shock factors of 1% and 5% respectively. While these figures may not be directly comparable, it would be useful to include a discussion of these approaches and the lower assumptions in the assessment.

Uncertainty and assumptions

The Department acknowledges that there are a number of uncertainties inherent in the cost-benefit estimates and uses a range of different scenarios throughout the analysis to account for this, such as the slot allocation profiles and the four different shock scenarios. The Department also does well to discuss the possible risks and unintended consequences associated with implementing the policies, such as efficacy risks and the risk of airlines not trusting that alleviation will be granted.
The IA also conducts sensitivity analysis, testing the impact of including data from the Covid-19 pandemic on the results of Option 2 and uses sensitivity analysis to test the parameters underpinning the four shock scenarios in Option 1. Adjusting these parameters showed that a 50% reduction in demand reduction was estimated to

change the benefits by nearly 100% and the IA could benefit from providing further discussion on what the results of this analysis meant for the robustness of the results of Option 1.

The analysis in the IA relies on a number of assumptions, including the assumption that the sample of (only Western Europe) routes used to inform the estimated ghost flights avoided in Option 1 are reliable, and assuming that eligible slots that were not previously allocated will be displace historically allocated slots in order to model the new allocation of slots in Option 2. The IA could have considered conducting further sensitivity analysis to test these key assumptions that underpin the analysis.

Wider impacts

The IA considers some of the wider impacts of the proposal on innovation, competition, equalities, justice and trade.

The IA discusses the impact from Options 1-3 on innovation, stating that expanding JNUS could reduce innovation by creating a greater barrier to entry for new entrant airlines, but also increase innovation as airlines face less risk of losing rights to slots, meaning they might be more inclined to invest in developing new innovations. In addition, changing the NER may also enable smaller airlines who hold five or six slots at an airport to leverage economies-of-scale. The Department also confirms that implementing both options simultaneously is not expected to change their (potentially opposing) impacts on innovation, partly due to the fact that many of the costs and benefits of Option 1 only apply in the case of a pandemic or health crisis.

The IA notes that the proposal could have potential impacts on trade, providing some discussion on how reducing ghost flights in Option 1 will impact the transport and trade of freight. The Department notes that these impacts are likely to be limited. However, as Heathrow alone handles £200+ billion of cargo annually, the IA would benefit from some further discussion of this impact. For instance, the IA should include any trade data to indicate the amount of freight that is carried on a passenger aircraft (and may be transported via cargo flights in response to implementation of the policy) to fully explain this potential impact.

The Department has also provided a detailed assessment of the competition impacts from the proposal and summarised the overarching competition effects from the proposal. The IA could have also benefitted from discussing the wider impact of airline consolidations on the proposal, which have been increasing since the Covid-19 pandemic. Regulatory approval of merger deals (such as the recent Lufthansa/ITA merger) are likely to require slot (and route) divestment and the IA could have discussed how this relates to the proposed regulations on slot reform.

The IA has also summarised the impact of the proposal on the labour market, and the distributional impacts of the policy, concluding these will be minimal. As the impacts are only expected to occur at London airports, there are not expected to be

any regional impacts. However, the IA could benefit from discussing how the proposal might impact the competitiveness of these airports in relation to each other. Equally, although the IA concludes that the proposal will not impact a huge difference for households with different incomes, the IA could discuss any positive benefits for consumers, such as improved passenger experience and satisfaction.

The IA discusses the potential impacts of the proposal on upstream and downstream businesses in the SaMBA but could expand on this discussion in the wider impacts section, considering the overall impact of the options on businesses other than airlines and airports, such as ground handling companies baggage handling services and aircraft cleaning services.

Monitoring and evaluation plan

The IA commits to completing a post-implementation review of the legislation in five years' time. The IA states that for Option 1, the policy may only be reviewed if a relevant pandemic or health crisis occurs (in which case the level of resourcing for the PIR would be high) and that the level of evidence and resourcing for Option 2 will be low due to its small impacts on business. However, the IA should consider resourcing a low impact PIR for Option 1 in five years' time regardless of whether a health crisis has occurred. This could evaluate the success of the policy in terms of airlines' response to the introduction of the policy and could assess their planning and familiarisation in response to the proposal.

The Department states that it will use impact and economic evaluation techniques in their review and has done well to set out the metrics that could be used to evaluate the success of the policy, potential key research questions for the review and possible data sources. It appears that the review will rely heavily on ACL data, and the IA could expand on how it expects to retrieve this and examples of the expected datasets and possible timelines. The IA states that the review will determine the extent to which changes in these measures could be attributed to the policy change, but could expand on how it plans to do this. The Department could also expand on its planned stakeholder engagement, perhaps providing examples of the questions it plans to ask airlines, airports, the slot coordinator, the CMA, and the CAA amongst others.