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Dear Sir Howard,

LAANC response to Airports Commission Appraisal Framework Consultation

Thank you for the opportunity to respond to this consultation, our detailed technical response to the questions is attached at Appendix 1 to this letter. These comments are submitted on behalf of the Local Authorities' Aircraft Noise Council concerned with the environmental impact of Heathrow. Heathrow is located in the most densely populated part of the UK. More people are overflown than at any airport in Europe. This sets an extremely high bar for any proposals that would expand activity or change the way the airport operates.

We can only repeat what we have said at previous stages of the process: if the Commission had, in its initial work, properly taken account of the community impacts of expansion at this location, it would surely have concluded that a further runway was untenable and that therefore this option should be excluded from the short-list.

Instead, the Interim Report has short listed two main options for Heathrow which have the biggest impacts in terms of noise, air quality and community demolition. Our concern is that the Commission seems too ready to sacrifice benefits for the community in exchange for gains for the industry.

The appraisal framework for Phase 2 must ensure that community impacts are firmly embedded in the decision-making process. This is particularly important as the Commission's final recommendations will form the basis of a future National Policy Statement.

We welcome the inclusion of the Community and Quality of Life modules within the Appraisal Framework, but would urge consideration of two further modules - one on Health and one on Mitigation. The first would ensure all the newly emerging evidence on health

impacts was properly considered, while the latter would include the full costs of providing appropriate levels of mitigation and compensation for the impacted communities. These modules should have the same weight and scrutiny as other topics within the Appraisal Framework and ensure that all community impacts are robustly addressed.

It is our strongly-held view that Heathrow is already unsustainable in terms of its impact on noise, air quality and traffic congestion. The prospect of expansion can only intensify those impacts. If the Commission is able to accept this as the starting point for its assessment it will provide reassurance to all the communities whose lives are affected by airport operations that their concerns will be properly addressed.

With regard to this, the starting point for any assessment must be a defined base case for each of the short-listed options. For Heathrow this would imply:

- A two-runway airport operating at current capacity with existing surface access provision and noise and air quality impacts.
- A two-runway airport operating at current capacity with appropriate surface access provision and noise and air quality impacts including the Commission's Phase 1 recommendations.
- A future case three-runway airport operating at increased capacity with appropriate surface access provision and noise and air quality impacts.
- A future case two-runway airport without the proposed capacity.

The last assessment point is particularly important as it would demonstrate what environmental benefits could be gained by the community through future technological improvements, these are the potential gains that would be lost through proposals to expand.

It is essential for public confidence that the framework's different objectives are properly and fairly balanced. The consultation document alludes to an element of "trade off" (paragraphs 2.5, 3.3 and 5.27) yet there is no accompanying methodology to demonstrate how the Commission will weight this in its final appraisal and recommendation.

Nowhere is our concern over this issue of trade off more evident than in the Commission's readiness to sanction a near-doubling in the numbers of night flights which will bring cost savings to airlines and passengers and sleep disruption to residents. The CAA report on the most recent trials of additional early morning arrivals could find no evidence of operational benefit. Yet still the Commission seems prepared to trade sleep for financial gain.

Yours sincerely,



Director

Appendix 1

LAANC response to Airports Commission Appraisal Framework Consultation

February 2014

Question 1

Are the objectives stated in Table 3.1 suitable for assessing the short-listed options? If not please explain why not, and suggest any alterations you feel would make them more suitable.

To be effective the objectives in all modules need to be accompanied by appropriate metrics, targets and accountabilities to allow for determination as to whether the objectives have been met. We would like to see a further round of consultation on this aspect.

The Framework alludes to an element of trade off between objectives. (para 2.5, 3.3, 5.27). The purpose of the Business Case (para 5.10) is described as providing "*an integrated assessment of the overall case for a proposal taking into account strategic, economic, environmental and other factors*". The elements which will comprise the Business Case are, however, described as Strategic case, Economic case, Commercial Case, Financial case, Management case (para 5.16). It is unclear how environmental factors will be incorporated into the process.

The Commission needs to publish its methodology as to how it will weight different topic areas and objectives. The methodology should detail how the outputs, including the weightings, will be used in the final appraisal, and hence, how they will inform the decision making process.

We welcome and support the appraisal module entitled People and the inclusion of the objectives within this in regard to Quality of Life and Community.

In regards to additions to specific objectives, we have the following comments to make which we believe would help to make the process more robust:

Strategic fit

There should be an additional objective:

- To include the indirect effects each option will have on other airports in the South East.

Surface access

The objectives should be re-worded to include:

- To maximise the numbers of passengers arriving at the airport on public transport;
- To maximise the numbers of staff arriving at the airport on public transport;

- To actively promote and set targets for the use of green modes of transport;
- To enable access to the airport from a wide catchment area by sustainable modes of transport.

Noise

The objective should be re-worded to be consistent with the Aviation Policy Framework:

- To limit and reduce the number of people impacted by noise arising from airport operations including air noise and ground noise.

Air Quality

The Commission has shortlisted two options which involve expansion in an area already identified by the UK Government as an air quality hotspot and is in non-compliance with European legislation set to protect human health. The area is not expected to be compliant until at least 2020, even under current operating conditions. The Commission will need to be able to demonstrate that reductions in emissions have been achieved to a low enough level to allow for all the extra emissions sources which would accompany expansion whilst ensuring the area remains compliant with the legislation. To ensure this there should be an additional objective to reflect the importance of complying with European legislation:

- To achieve compliance with, and remain compliant with, the EU limit values set for air quality.

Water and flood risk

The objectives should be reworded to include:

- To protect the quality of surface and ground waters;
- To ensure the provision of a water management plan which encompasses comprehensive flood risk management measures, along with an overall objective to achieve a water neutral target in terms of water usage.

Operational Viability

For the avoidance of doubt, each objective in this category should ensure the inclusion of the statement

- whilst ensuring any resulting environmental dis-benefits are fully mitigated

Question 2

Are there any other objectives that the Commission should consider, and if so what are they?

Inclusion of a specific health module

Whilst some of the aspects of health are briefly addressed in different topic areas, we believe it is appropriate that health impacts are given the same weight and scrutiny as other topics within the Appraisal Framework and all aspects drawn together in a separate module. To leave the assessment of health impacts to when a final decision is taken is too late. This aspect must form a part of the selection making process.

In addition to the effects of issues such as noise, air quality, the increasing or decreasing economic activity etc, there should be an inclusion of the increased societal risk from catastrophic incidents such as plane crashes from the proposals to increase aircraft movements over communities, an aspect which is missing from the Framework yet should form an important part of any option comparison exercise.

Inclusion of a specific mitigation module

Whilst some of the aspects of mitigation are briefly addressed in different topic areas, we believe it is appropriate that mitigation measures are given the same weight and scrutiny as other topics within the Appraisal Framework and all aspects drawn together in a separate module.

For the avoidance of doubt this should include, but not be limited to, the following topics:

- Full costs of providing appropriate levels of surface access provision to ensure environmental impacts, such as noise, air quality, congestion, adverse impacts on other road and public transport users, are appropriately addressed;
- Full costs of compensation for amenity loss, for habitat loss, heritage and conservation loss;
- Full costs of compensating residential and community buildings including provision of adequate noise mitigation, costs, where relevant, of removal and rebuild of sensitive receptors such as schools and fully addressing issues caused by severance;
- Full costs to communities for loss of property, cost of relocation, rebuilding communities in alternative locations, compensation in regards to blight.

The mitigation packages under scrutiny should be subject to sensitivity tests in relation to their scope and geographical coverage. The benefits of more generous packages should be considered as sensitivities within the deliverability topic area.

Question 3

Will the appraisal modules described in Appendix A be sufficient to analyse the short-listed options against the stated objectives? If not please explain why not, and provide examples of evidence to support your answer.

Overall

We believe there is a fundamental flaw in the Commission's approach to the adoption of a "do minimum" scenario from which further assessments will be made. This do minimum scenario is referred to as incorporating all short-term recommendations made by the Commission in Phase 1 (para 5.18), may have additional scenarios constructed (para 5.19) and in terms of surface access appraisal the do minimum includes all the short and medium term recommendations (Surface Access, para 4.16).

We believe the starting point for any assessment must be a defined base case which is the short listed proposal sites with current permitted operations. The suggested do minimum scenarios are not base cases, they are forecasts, and hence, will include assumptions which have not been subjected to any public consultation. This will introduce unnecessary uncertainties into the process from the start. This is discussed with an example in the Noise section below.

As the Phase 1 recommendations have not yet been subjected to public consultation and adoption by Government they should be treated as a sensitivity test. The same applies to schemes in the surface access module such as, HS2 which currently doesn't have Parliamentary approval, and the southern rail access scheme for which is there no current commitment or funding. Again these can be assessed as sensitivities, they cannot form part of the base case.

The assumptions the Commission will use and the way in which they are used should be transparent and publicly available. The methodology regarding the assessment of any cumulative effects should also be transparent and publicly available. It is important that any environmental benefits and dis-benefits are properly accounted for in the assessment process.

As an example, one of the Phase 1 recommendations, in relation to the implementation of the policy to end the Cranford Agreement as soon as possible, has recently been the subject of a planning application with an accompanying Environmental Statement. This one change in operation will result in substantial increases in noise from take-off roll and leads to air quality exceedences for the first time at nearby residential locations to the north-west of the airport. The newly over-flown areas to the north east, including a number of schools, will be subject to very high levels of increased noise. These aspects must be subject to a detailed environmental assessment prior to any recommendation for implementation.

Each topic area should be assessed as:

- Each proposal location with current permissions;
- Each proposal location with agreed Phase 1 recommendations;
- Each proposal location without additional capacity, opening year or 2030;
- Each proposal location with additional capacity, opening year or 2030.

In regards to the environmental assessments, this is an important step as it will then provide an assessment of the potential community gains should expansion not occur.

Please see below for additional comments in individual topic areas.

Strategic Fit

Following the information published in the Interim Report it is unclear how the Commission is intending to decide whether it is necessary to increase hub capacity or point-to-point capacity. There is no clarity in the consultation document as to whether the Appraisal Framework will form a part of that decision making process or whether there will be a further consultation on how the Commission will take this forward. We would ask for any methodology for this decision making process to be made public.

Surface Access

We have concerns in regards to para 4.4 over comments that ambitions on mode share need to be balanced against the objectives set out in cost and affordability. At Heathrow where the surrounding roads and public transport networks are already congested and crowded and air quality is already poor, it is essential that mode share targets are set at a level designed to achieve real reductions in access to the airport by car.

Surface access transport models have inherent weaknesses and the input assumptions used may need to be robustly challenged. As the outputs will inform the assessment of other topics such as environment the Commission needs to publish how it intends to ensure there is a suitable level of scrutiny applied to the model inputs and outputs and assumptions used.

Noise

LAANC and the 2M group of local authorities have already submitted evidence regarding the onset of community annoyance in the form of our report "Understanding UK Community Annoyance with Aircraft Noise, ANASE Update Study", Flindell et al, September 2013'. We reiterate the summary findings of this research which is that the onset of community annoyance from aircraft is now significantly lower than current government policy acknowledges. Our 2013 submission to the commission on ANASE responds to the criticisms previously made and finds that the 2007 study is to be preferred to the 1982 non peer reviewed ANIS study, that has formed the basis for government air noise policy ever since. The Heathrow Terminal 5 Inspector voiced concerns in his report on the T5 Inquiry regarding the reliance on the 57dBLeq 16 hour average mode contour as the sole arbiter of onset of community annoyance. His concerns included the possibility that that Leq index around Heathrow had become uncalibrated (if it ever had been) due to the increased numbers of movements at the airport since the time of the ANIS study.

It is of course a matter of record that, before the Terminal 5 decision was announced, the previous government chose to respond to the concerns voiced by many objectors to the T5

application in respect of noise and commissioned a new social study on aircraft noise. In announcing a new study the then Secretary of State said in a press release (8th May 2001)

'My Department is to carry out a major study to reassess attitudes to aircraft noise. This new study underlines the Government's commitment to underpin our policy on aircraft noise by substantial research that commands the widest possible confidence.

Our current understanding of the relationship between annoyance and aircraft noise over 24 hours is based primarily on research that was carried out in the 1980s, in particular the Aircraft Noise Index Study published in 1985. That was based on the largest survey yet carried out of public attitudes to aircraft noise and eventually led the Government of the day to adopt the Leq (equivalent continuous noise) index for daytime noise contours.

The conclusions have been broadly confirmed by other studies here and abroad, and we have no reason to doubt their validity. But in the light of our commitment to develop a new air transport policy, of changes to traffic patterns since then, and the general reduction in noise levels of individual aircraft, it is now timely to commission a fresh study.'

That study was the ANASE study. The results of ANASE clearly challenge findings of the earlier ANIS work, importantly one of the key findings being that the structuring of the ANIS social survey questions may well have resulted in an underestimation of the importance played by numbers of movements in the overall assessment of annoyance.

We therefore urge you at this time to adopt the broad findings of the ANASE study namely that annoyance now starts at levels of around 50dB LAeq 16 hr average mode.

Even with a framework that accepts that annoyance now starts at a much lower level than acknowledged by current government policy, we urge the Commission to accept that "Period" metrics fail to indicate the true annoyance impact of individual aircraft, as they get 'lost' in the averaging. Especially annoying around Heathrow are those flights which break the designated periods of respite. We are of the view that as well as the traditional (relevant) period metrics, additional metrics are required for assessing the effects of expansion which better indicate the effect of increasing annoyance with the increasing frequency of noisy movements. We have some suggestions for consideration. Whilst we appreciate that some of them either duplicate or clash, there is a point in including each of them. They each highlight some important aspect. The point is that the sensitivities of each one should be recognised and assessed, by one means or another.

For the short and medium term as well as for the 2030 and beyond scenarios we believe:

- The noise assessment must specifically include an assessment of ground noise from airport operations as well as air noise;
- There must be flexibility in the choice of noise metrics to ensure suitability in regard to assessing the actual impacts on people, for example, the use of short term metrics such as worse half hour assessments in relation to the impact on schools;

- There should be publication of, and use of, “SEL” noise footprints, to assess noise from individual flights at night. The existing 90SEL assessment level is set too high. A 70SEL footprint would enable levels of about 45dB LAmax to be assessed for bedrooms;
- There should be an assessment of the scheme against WHO external night noise criteria i.e. 60 dB LAmax and against the target of 40 dB Lnight, outside;
- There should be an assessment against 6.5hour, for a night time period metric, worst mode, to show any increases from the proposed early morning ‘smoothing’ plan at Heathrow.

These assessments must include:

- Base case - airport operating under current permissions. For the Heathrow options, the baseline noise assessment and contours as presented in the background documentation to the Interim Report must be revised and redefined so as to show the current 480,000 atms 16 hr day and night periods and night quota period, that currently pertains. The use of 16 hr “smoothing” data for calculation of the baseline scenario has the effect of immediately shrinking both contour areas and numbers of people affected which gives a misleading and inaccurate picture of the current impact. Any use of period metrics should be based on a worst mode assessment as average mode contours mask the true impact of increasing frequency
- Do minimum - forecast case including Phase 1 recommendations;
- Each proposal location without additional capacity, opening year or 2030;
- Each proposal location with additional capacity, opening year or 2030.
- The assessments should also acknowledge the essential benefits of alternation which have been denied for so long to the communities to the west of Heathrow" before "prior to any recommendation for implementation

This will allow for an assessment of the potential gains for communities, should no expansion occur.

The ANASE study found that the frequency of movements or “N” issue is not adequately covered by the existing Leq based metric. It is therefore plain that a better metric of some description should be evolved and consulted on prior to the final selection of the winning contender, for a new runway.

The original UK “NNI contours” were based upon an algorithm that gave more weight to the numbers element in the annoyance equation. Although we are not proposing that the NNI index is resurrected without modification, there is a need for a metric which is sensitive to increases in movements in a way that LAeq has been found to be wanting.

We believe that whilst the N70 and N60 grouped metrics may have some merit we are concerned that these too may not be adequate for purpose, they have never been validated for use in the UK. In any event we believe that for the N based contours to be of use they should start at N55.

Whichever option for expansion recommended communities will either experience more noise, new noise or longer periods of noise. Each of these noise sources can be a stress,

especially if the periods of respite are eroded or completely disappear. It is therefore essential that the appraisal criteria selected and used should home in on the sensitivities of the communities to be affected, and then carefully select between them. It is essential that the assessments, including all the assumptions used behind the noise modelling processes, are robust and open to public scrutiny. The process should be backed up by a full and extensive social survey, based specifically on Heathrow which should be commissioned without further delay.

Air Quality

An extensive piece of work in regard to modelling air quality at airports was undertaken entitled Project for the Sustainable Development of Heathrow. An air quality model was prescribed along with details of the baseline emissions inventory and other key inputs. Unless there is an agreed process with agreed input and output assumptions it is not clear how different short listed options, which may use different approaches, can be compared. Noting that a prescribed model is being used to assess aircraft noise, we believe it would helpful if the Commission prescribed the model for use and the key inputs and assumptions to avoid unnecessary uncertainties. This material must be open to public scrutiny.

A range of sensitivity tests on key assumptions such as emissions for future road vehicles, future aircraft technologies, the delivery of surface access provision not currently funded, should all be included to ensure there is a precautionary principle built into the modelling process. As an example "reasonable adjustments to account for future improvements" (para 6.15) leaves the definition to the proposers. This is unacceptable unless the definition of reasonable has been agreed by appropriate experts.

Appropriate account needs to be taken of the specific locational circumstances of the short listed options. As an example, the roads around Heathrow are already at, or near, capacity and there is currently non-compliance of the air quality standard in this area. In these specific circumstances screening out roads as suggested in para 6.19 will not be appropriate.

The "as minimum" as referred to in para 6.7 is incomplete. As stated above in regards to the use of a proper base case, for the Heathrow short-listed options, the present permitted operations must be used as a base case, and, from this assessment made of:

- Base case - airport operating under current permissions;
- Do minimum - forecast case including Phase 1 recommendations;
- Each proposal location without additional capacity, opening year or 2030;
- Each proposal location with additional capacity, opening year or 2030.

This will allow an assessment of what improvements could be gained should expansion not occur.

The inclusion of ultra fine particulate matter is considered a necessity given the serious health implications.

Quality of Life

The suggested Health Module and Mitigation Module will be a useful input into the analysis of this topic.

Community

The suggested Health Module and Mitigation module will be a useful input into the analysis of this topic.

Cost and Commercial Viability

The suggested Health and Mitigation module will be a useful input into this topic.

Delivery

The suggested Health and Mitigation modules will be a useful input into this topic.

Question 4

Will the appraisal modules described in Appendix A be sufficient to construct business cases and sustainability assessments to enable the Commission to make recommendations and the Government to act on these? If not please explain why not, and provide examples or evidence to support your answer.

As there are no distinct outputs defined for the objectives in the appraisal modules it is not clear how the proposers will be measured in terms of their detailed schemes. There needs to be clarity on how the Commission will use the results from the outputs of each of the appraisal modules and what weights will be attached in terms of any "trade off " issues to allow the Commission to make a recommendation. Until our concerns are addressed we are not able to confirm that the appraisal modules will be sufficient for the purpose as outlined in the question.

Question 5

Are the five components of the updated scheme design set out in Appendix B suitable for understanding schemes' potential performance against the stated objectives? If not, please suggest any modifications that you think would make them more suitable.

There needs to be clear metrics and targets for each objective. Without these it is unclear how the proposers will know whether they have achieved, or to what degree they have achieved, the objective.

We would ask that the Commission provides further clarity in regard to the reference to assess the "scalability and adaptability of their schemes" (Appendix B, para 7). If this is to

include options such as the introduction of mixed mode, the development of an additional runway eg at Heathrow with a fourth runway, then this needs to be subjected to the same level of Appraisal Framework assessment and presented alongside the current shortlisted scheme. Until our concerns are addressed we are not able to confirm that the components are suitable for the purpose as outlined in the question.

Question 6

Is the level of detail in the components for the updated scheme design set out in Appendix B appropriate given the likelihood that some schemes may not progress to full stages of development? Please provide examples or evidence to support your answer.

We have not responded to this question.