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Stansted Airport: Future Airspace Research – Phase 2

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Report structure:



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Background, sample and method

Background, aims and objectives

- As part of Government proposals to modernise the way UK airspace is managed, London Stansted Airport (Stansted) will
 soon be undertaking an extensive process of engagement and consultation with stakeholders and local communities. Over
 the course of the next few years Stansted will bring together NATS, the CAA and other airports to shape the airspace design
 on which it will formally consult (likely in 2020). Before this, it will be important to speak to individuals, organisations and
 groups that have an interest in the airspace around STN to provide feedback on principles that will be used to redesign the
 airspace, as part of the overall programme.
- The research will seek to capture feedback from a range of interested parties to ensure that Stansted has a clear understanding of the views of all its major stakeholder groups, and that the design principles that emerge are properly understood and fit for purpose. This will set the foundations of the future airspace work.
- The key aims and objectives of the research are to:
 - Ensure that Stansted have complied fully with the requirements of the CAAs CAP1616 process regarding engagement in Stage 1B.
 - Ensure that Stansted has a strong understanding of the views of its stakeholder groups, to inform the subsequent stages of design and development.
 - Ensure that the design principles that emerge are properly understood, are consistent with the statement of need, support operational requirements, and allow Stansted to continue to grow safely and efficiently.
 - And, ensure that the design principles that emerge are checked and validated with stakeholders from the focus groups with a proper understanding of the associated impacts.



Sample and method

• YouGov conducted 3 x 2 hour online focus groups with the general public, and stakeholders identified by Stansted. The groups took place in May 2020 and were conducted online in light of the COVID-19 restrictions on face-to-face meetings. The stakeholder group specification is outlined below:

Group 1 - General Public

- 12 x respondents from areas surrounding Stansted
- Mix of age, gender and social grade, and those impacted / not impacted by noise

Group 2 - Business / National Orgs / Community Groups / Special Interest

- 13 x respondents
- A mix of representatives from each stakeholder group

Group 3 - Aviation and Elected Reps

- 8 x respondents
- A mix of representatives from both stakeholder groups



Draft Design principles review

Eleven draft Design principles were shown to stakeholders

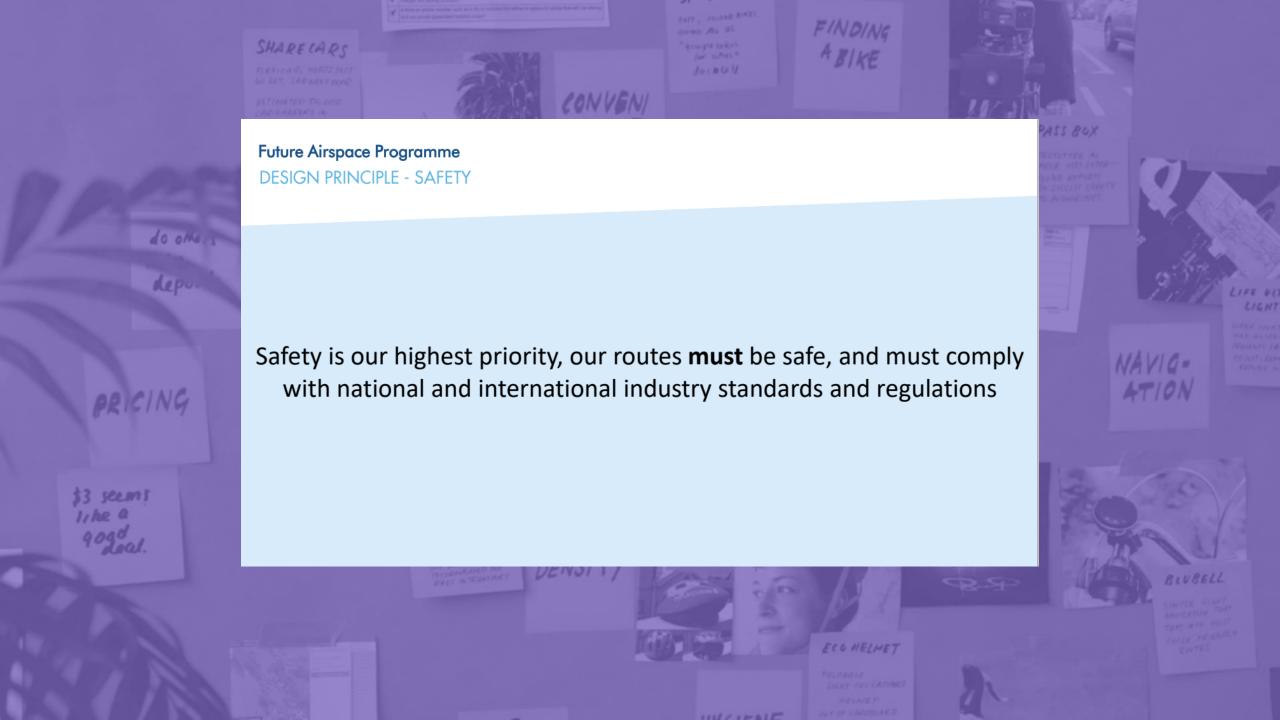
PASS BOX Future Airspace Programme **Future Airspace Programme** Future Airspace Programme Future Airspace Programme DESIGN PRINCIPLE - CHANGE **DESIGN PRINCIPLE - SAFETY** Any changes must be consistent with CAA's strategy for Airspace Safety is our highest priority, our routes **must** be safe, and must comply Modernisation and the FASI-S programme, taking into account the The airspace design **must** provide for the utilisation of aircraft Where we choose routes that fly over new areas there will have to be a with national and international industry standards and regulations needs of other change sponsors and airspace users. movements permitted by planning permissions and within statutory clear benefit in doing so. limits in force at the airport. Future Airspace Programme Future Airspace Programme Future Airspace Programme **Future Airspace Programme** DESIGN PRINCIPLE - NOISE DESIGN PRINCIPLE - NOISE **DESIGN PRINCIPLE - NOISE** Where practical, our route designs should avoid, or minimise effects Where practical, the use of multiple routes and/or other forms of In order to address the effects of aircraft noise, each route should seek upon, noise sensitive receptors. These may include, designated sites and Routes should be designed using the latest widely available navigation respite, such as different time periods and balanced runway mode when technology and facilitate continuous climb and descent to both runways. to minimise the number of people overflown. landscapes (such as SSSI and AONB), cultural or historic assets and sites operationally viable, will be considered. providing care. **Future Airspace Programme** Future Airspace Programme Future Airspace Programme DESIGN PRINCIPLE - BALANCE DESIGN PRINCIPLE - EFFICIENCY **DESIGN PRINCIPLE - ALTERNATIVES**

Our designs will consider both noise and emissions as well as other factors, and seek to strike the best balance. In so doing we will take account of the Government's altitude-based priorities, which emphasise minimising noise below 7,000 feet.

We will seek to minimise the amount of controlled airspace that we require, and our future route designs should ensure an efficient and systemised operation at Stansted, minimising interactions with other airports and maintaining priority access for Emergency Services.

Where the adoption of modern navigation standards and/or flying techniques mean that some aircraft cannot fly the new routes, we will seek to minimise environmental impacts from those aircraft.

WILL I PAIR



Design principle S is seen as an essential consideration, but some feel it could be even clearer

Overall, this is seen as an important principle

- Across groups, this principle is seen as a logical inclusion
- Respondents see safety as paramount, both for those in the air and on the ground, so it is reassuring to see this noted

The implications of this are broadly understood

- The benefits are clear safety and security for passengers, aviation stakeholders and communities on the ground
- However, designing safe routes could take time and be costly they want assurance that safety will not be compromised in light of these factors
- Aviation stakeholders say routes will ultimately involve a degree of risk, so comprehensive risk assessment is needed – feedback from airspace users operating within and outside of CAS is important

However, some would like the principle to be more explicit

- National and international safety standards may differ, so when applying this principle, specification is needed
- There is also clarity needed around how this would be assessed independence is important here.

Draft Design Principle – Safety

"Safety is our highest priority, our routes must be safe, and must comply with national and international industry standards and regulations."



This principle makes sense, and stakeholders are reassured to see it included

Is this a logical addition / does it make sense?

- There is a unanimous agreement across stakeholder groups that safety is paramount and it is clear that this should be the first priority of redesigning airspace.
- This reflects conversations had before, where safety was a key consideration.

Draft Design Principle – Safety

"Safety is our highest priority, our routes must be safe, and must comply with national and international industry standards and regulations."



Design principle S is clear, but there are questions around the finer details

Clarification / extra information

- Many want reassurance that the safety of the routes will be properly – and independently assessed.
- Some say that safety here should explicitly account for safety in terms of air quality and pollution, too.
- Some call for the most stringent standards to be adhered to, and an aviation respondent questions whether EASA regulations may need to be considered, too.

- Language works well, and is clear.
- For a minority of aviation stakeholders –
 inclusion of 'GA' here as airspace users is key.
- Some wish to see language around standards made more explicit – which national and international standards will be applied?



"100% agree, safety of everyone involved should be paramount and come above cost cutting etc." –

General Public

SHARECARS

"A safe route is not necessarily the most fuel efficient or least polluting or noisy (may not take in to account long-term safety of nearby communities)." – National Organisation

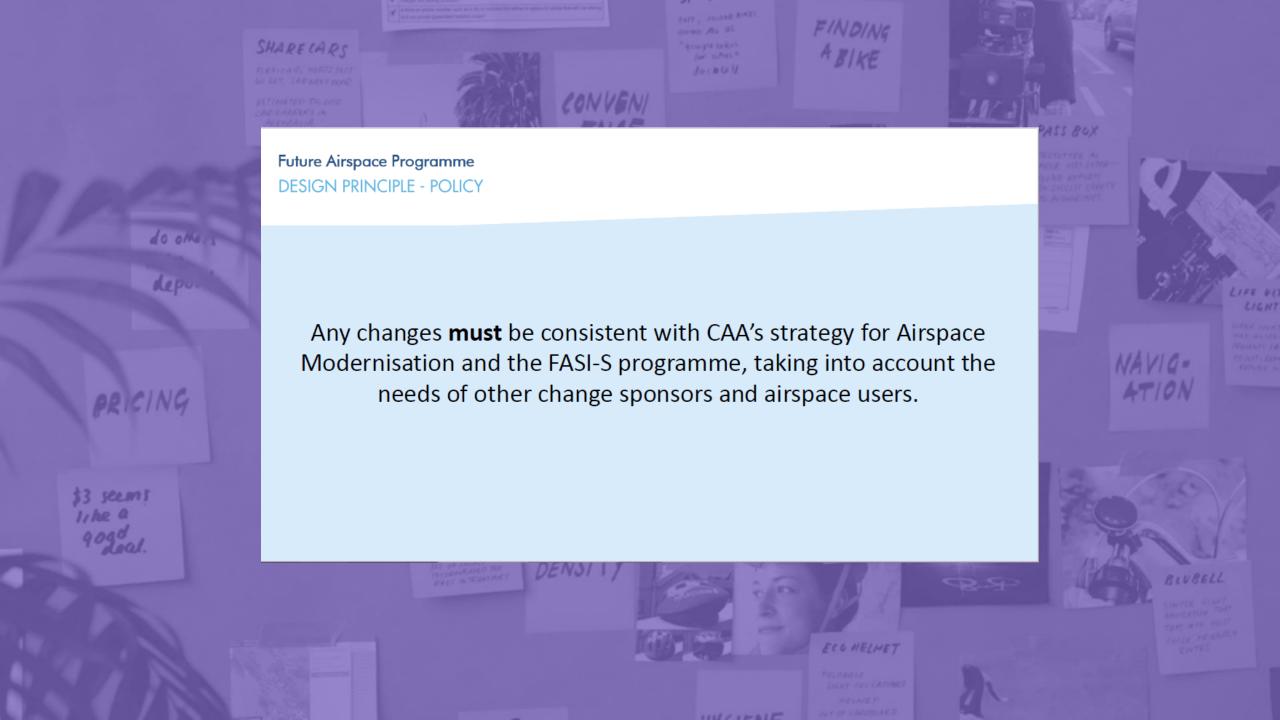
"As a generalised principle you can't really argue against that! However...what would be the finer detail of such an assessment." – Elected Rep

"I would say "must EXCEED" national and international industry standards" – General Public "As with anything, there is minimum compliance, there is best practice and there is exceeding standards. Minimum compliance to safety standards may be the most cost effective but is it necessarily the best route?" – Community Stakeholder

"It looks good but how will it now blend in with EASA regulations as we leave the EU? Also it might be good to say that we comply with national and international standards but always adopt the more stringent or safer?." – Aviation Stakeholder

"Makes sense, would it be independently assessed? Or self assessment?" – General Public

"Yes, absolutely. Safety should always be the most important consideration." – Community Stakeholder "One of the challenges seem to be balancing the relatively risks. Safe doesn't mean risk free and it is important the risks are balanced in consultation with the wider GA and general community" – Aviation Stakeholder



Design principle P makes sense on the surface, but the challenge will be compromise within the aviation community

All agree that this is a key principle to include

- Stakeholders agree that there is a need to align with CAA strategy
- Input from, and collaboration between, different airspace users and change sponsors will be key in ensuring new airspace can be properly utilised

The implications of this are broadly understood

- In theory, this would result in efficiency of airspace
- However, there is a challenge here in ensuring that the views of different aviation stakeholders and change sponsors are accounted for and properly balanced
- Many say that a level of compromise is inevitable but will it be a case of those greater in size / capital have the loudest voice?

However, ask for clarification on key points

 There are calls for more transparency here – the language is felt to be too technical for laymen and needs further explanation – what is the CAA's strategy? And who are the 'change sponsors'?

Draft Design Principle – Policy

"Any changes must be consistent with CAA's strategy for Airspace Modernisation and the FASI-S programme, taking into account the needs of other change sponsors and airspace users."



Across groups, stakeholders agree that this principle should be included

Is this a logical addition / does it make sense?

- All recognise that, if airspace is to be made efficient and fit for purpose in a lasting way, collaboration will be essential.
- Many take it as a given that neighbouring airports will work together to redesign airspace, but are clear that compromise will be necessary.

Draft Design Principle – Policy

"Any changes must be consistent with CAA's strategy for Airspace Modernisation and the FASI-S programme, taking into account the needs of other change sponsors and airspace users."



Some call for more transparency here, and that means an explanation of the more technical terms

Clarification / extra information

- While the principle overall is understood, many are unclear about which airspace users and change sponsors will have a say.
- Many are clear that putting this into practice will require a degree of compromise, and want to know how the views of different parties will be weighted.

- There are calls for language to be honed:
- 'Change sponsors' should be defined for transparency.
- 'FASI-S' is understood with additional information given, but clarification is important for this principle to be accessible.
- Some are unsure what the CAA's strategy is without clarification, it is difficult to make an informed judgement.



"Seems like it might not be possible to design paths that suit all, what compromises would need to be made and by who?.. Do certain sponsors/airspace users take priority?" — General Public

SHARECARS

"Can see the logic, but "other change sponsors" needs to be defined, to understand what the vested interests are." – Community Stakeholder "All change sponsors and airspace users, in theory, will have the most efficient airspace for all. However, the airspace is still limited - the challenge is there will be need to be trade-offs between change sponsors and airspace users." – Aviation Stakeholder

"I can understand why it has been shortlisted, not sure how easy it will be to ensure it happens fairly." – General Public "It recognises that Stansted operates within a wider system. The issue will be when a proposal that seems best for the Stansted area is counter to other interests." – Special Interest

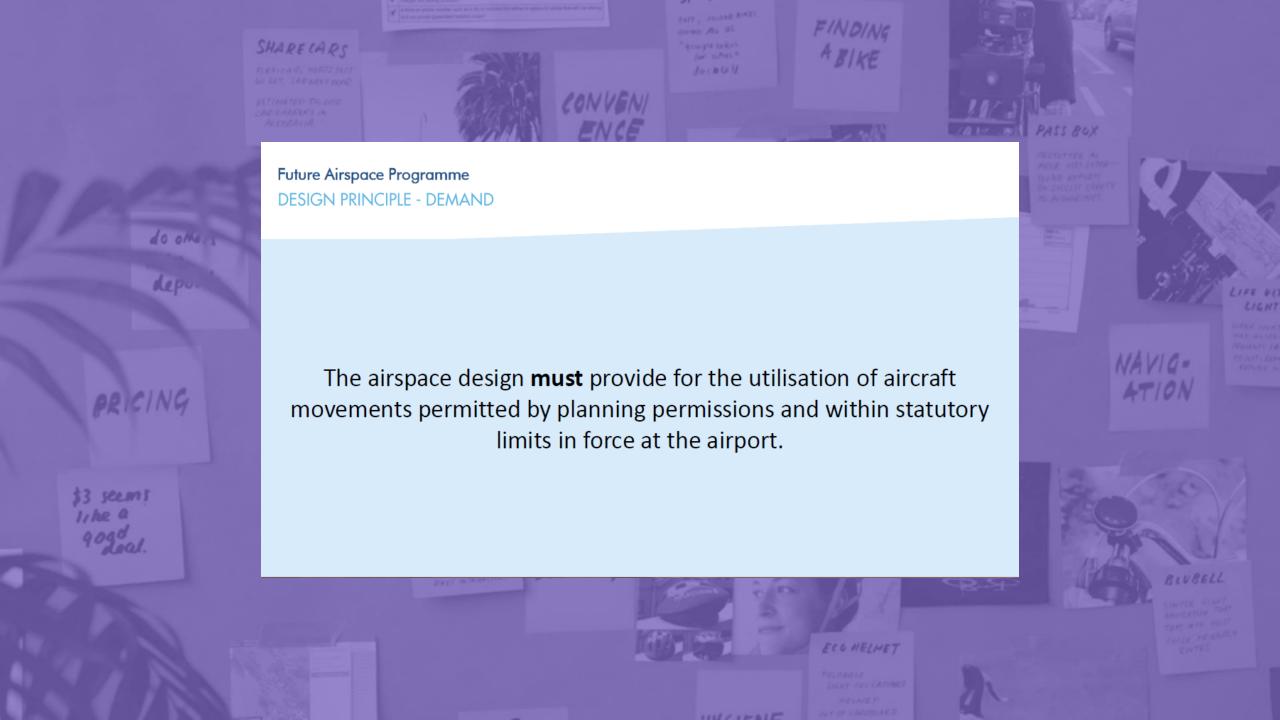
"Someone is going to have to set priorities - not all airspace users are equal!." – Aviation Stakeholder

"Yes, I think it is important for them to be consistent and work together so that the end result actually works and is beneficial." – General Public

\$3 seems

"A very wordy statement and unless you understand the current strategy and the needs expressed by change sponsors / airspace users." – Community Stakeholder

"Collaboration make total sense – but a challenge of many different views and needs." – Elected Rep



Stakeholders agree that the airport must operate within statutory limits and permissions – however, some note that these are changeable

Stakeholders can see the rationale for this principle

- Operating within statutory limits is seen as a must
- While some say it should be a given, others are reassured to see this included as an explicit principle

The implications of this aren't clear

- Some are clear that this principle allows Stansted to meet demand, within legal limits, however one respondent questions how this will be enforced
- A minority comment that communities may still be concerned about whether this allows for an increase in flights overhead, or expansion to a second runway

There are questions around the content

- Many note that demand is changeable
- Some say the principle seems to offer flexibility, but many find reference to 'planning permissions' too vague – further clarification is needed

Draft Design Principle – Demand

"The airspace design must provide for the utilisation of aircraft movements permitted by planning permissions and within statutory limits in force at the airport."



For many this design principle is a given – but the information on the finer details are needed for clarity

Is this a logical addition / does it make sense?

- There is agreement that this is a logical principle going against planning permissions and statutory limits is not a legitimate option.
- Many see the need for Stansted to meet demand within these limits, but question what this actually means in practice would there be updates to planning permissions, or is this referring to current permissions only?

Draft Design Principle – Demand

"The airspace design must provide for the utilisation of aircraft movements permitted by planning permissions and within statutory limits in force at the airport."



Stakeholders want clarification around which planning permissions and limits this principle refers to

Clarification / extra information

- There are calls for this principle to be clearer about meeting *future* demand.
- Many say that planning permissions are changeable, and want to understand whether this principle refers to current permissions only, or whether it allows a degree of flexibility to change.

- The language here is understood, but more detail is needed to make this into an applicable principle:
- Does the principle mean 'current permissions' only? – flexibility is assumed, however clarity is needed here, especially for those less familiar with aviation and planning.



"I think it something that should be considered otherwise well be doing this all again within a couple of years." – General Public

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"This is surely a given statement, enshrined by local/national legislation" – Business Stakeholder "I think that's reasonable. The FAS would need to be capable of absorbing growth safely and efficiently but controls at a local level should be through the planning system" – Aviation Stakeholder

"I don't have a problem with the statement per se, but having is listed as the 'principle' seems fairly ridiculous. It's nowhere near clear or precise enough to be able to be a principle." — General Public "It seems to allow for flexibility in its wording, i.e. that it must consider the pp and statutory limits under any circumstances. If it specifies 'current' conditions then if those change there's a risk that future ones may be overlooked." – National Organisation

"This DP is about demand therefore requirements and demand can change."

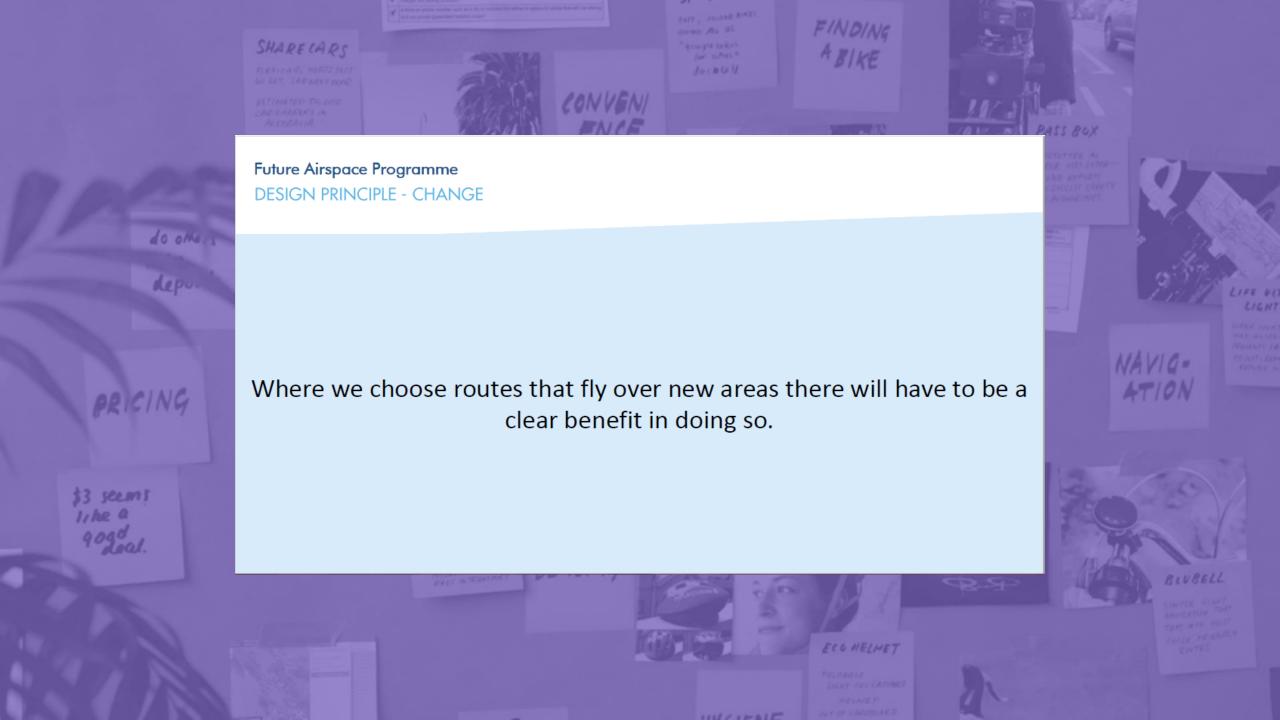
– Elected Rep

"Again a very vague and ambiguous statement." – General Public

13 seems

"Agree that its has been included in the short list and will be a relevant statement throughout the entire process." – Community Stakeholder

"We know how planning conditioning can be flouted and not easy to enforce." – Elected Rep



Design principle C needs further clarification – transparency will be key in communicating change to communities

Stakeholders see where this principle comes from

- Respondents agree that, in theory, routes must be designed in a way that allows for greater efficiency, while reducing noise and environmental impact
- Many also comment that, if new areas are to be overflown, transparency and communication of the reasons behind this will be key

But putting this into practice will be a challenge

- Across groups, it is clear that 'benefit' is subjective, and the principle currently leaves this open to interpretation
- As it stands, the principle appears to seek to please everyone, and respondents are clear that this will not be possible

Many want further clarification

- Across groups, stakeholders call for clarity on what constitutes a benefit
- They also call for greater transparency on which measures will be used to weigh up potential costs alongside the benefits
- A minority also question whether cost-benefit outcomes will be open to challenge

Draft Design Principle – Change

"Where we choose routes that fly over new areas there will have to be a clear benefit in doing so."



Design principle C clearly links back to previous discussions, but could go further in outlining what this will mean when applied

Is this a logical addition / does it make sense?

- On the surface, this principle accounts for the concerns of populations and areas that may be newly overflown, and respondents agree that it will be vital to communicate to communities why changes have been made.
- However, many feel this principle is not yet clear enough to fulfil this need.

Draft Design Principle – Change

"Where we choose routes that fly over new areas there will have to be a clear benefit in doing so."



Clear definitions are required to make this principle more useful and applicable

Clarification / extra information

- Stakeholders across groups say that the principle as it stands is open to interpretation, and too vague when it comes to the 'benefits' mentioned
- Some would like to see these benefits outlined, to give transparency, and say that objective cost-benefit measures should be put in place to ensure that decisions can be clearly communicated.

- The language here is clear, however there is a need for further definition:
- There's scope to define 'benefit', which some say would equal a more transparent principle
- The term impact could also be included as it is clear to many that, while some may benefit, others may experience negative change.



"Think there needs to be some clear way of 'measuring' the benefits. Has to be objective." – General Public

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"Who would be weighing the "clear benefit" and what criteria would be used to make the final decision?" – Business Stakeholder "Massive challenges as this will be pleasing to communities that will see less overflying and a massive upset to those that have not been overflown before." – Elected Rep

"Tricky one. Quite subjective to the individual. Who/what is benefiting? One person may prioritise the local economy above all else. Their neighbour may be most concerned about the environment."

— General Public

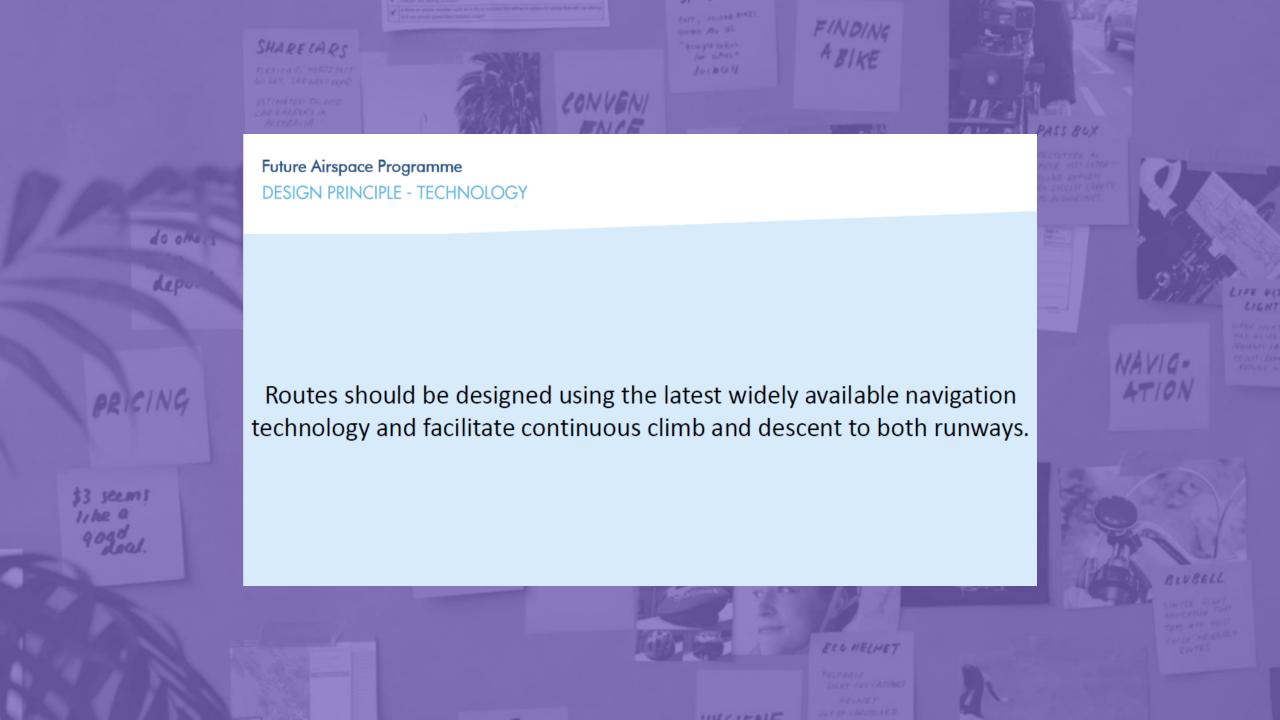
"it is an important one, but to avoid scepticism, giving some idea of the process and people involved in identifying the benefits that outweigh disadvantages would be well worth including at the end." – National Organisation "Agree it's too general and subjective. Could we not say something along the lines of transparently weighing up the relative benefits in consultation with stakeholders. Not those words but delivering a clear benefit to everyone is undeliverable." – Aviation Stakeholder

"I agree with this principle mostly. I think there definitely needs to be a benefit somewhere and would be a waste of time to change it just to satisfy the idea of a change. Benefit is left open to interpretation." – General Public

13 seems

"Long term stability of routes is a key factor in land use planning....There is currently no guidance for weighting the conflicting factors and what balance or trade-offs are available." – Special Interest

"The DP mentions benefit but not impact... i.e. will it only focus on the positive of any design or will it consider the negative aspects too. It's unclear." – Aviation Stakeholder



Respondents agree with this principle – using the latest technology where possible could have many benefits

The principle is understood and agreed with

- Respondents agree that using the latest technology where possible will be key in terms of producing efficiency, noise and environmental benefits
- Many see this as a logical step and support new routes accounting for new navigational capabilities
- Benefits to GA traffic were also mentioned by one respondent reaching higher altitudes faster will leave clearer airspace at lower levels

Some question what the impact would be on other airspace users

- A minority comment that some older aircraft could be impacted negatively, and caution that this impact should be minimised where possible
- There was also mention that this must fit with designs created by other FASI-S stakeholders

Further clarification could be useful when it comes to consultation

- Referring to 'both runways' here could be unclear to those unfamiliar with aviation – when it comes to public consultation, this could pose a challenge
- A minority also mention that 'continuous climb and descent' could be clarified
- Some also question whether new routes will be designed to accommodate newer technology as it develops.

Draft Design Principle – Technology

"Routes should be designed using the latest widely available navigation technology and facilitate continuous climb and descent to both runways."



Stakeholders agree with the logic here, and agree this principle is important to include

Is this a logical addition / does it make sense?

- Across groups, use of the newest technology possible is supported.
- Respondents see the potential for benefits to be seen here and many comment that this should be a given.
- The key consideration here is the degree to which other airspace users are impacted – however, some say that impact should be absorbed by the airlines themselves.

Draft Design Principle – Technology

"Routes should be designed using the latest widely available navigation technology and facilitate continuous climb and descent to both runways."



The principle is clear, but care should be taken to ensure terminology is clear

Clarification / extra information

- Generally, respondents are supportive of this principle and little clarification is needed
- While a majority of stakeholders are in support, a minority comment that the extent to which other airspace users (FASI-S and older aircraft) are considered could be spelled out further.

- Language generally works well in this principle
- However, some caution around the use of 'both runways': this could be misinterpreted as meaning Stansted will use two runways, which could cause friction with local communities
- Defining 'continuous climb and descent' could also clarify the benefits here.



"Only issue I see is for airlines running older planes. But that is their problem, not ours." – General Public

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"Both runways? Not obvious to laypeople." – Business Stakeholder

"From a GA perspective the principle seems sound. Use on continuous climb and descent may result in commercial aircraft reaching cruising altitudes more quickly and therefore limit the impact at lower levels." – Aviation Stakeholder

"There is a benefit in less noise pollution and fuel burn." – General Public "Change will naturally have to take into consideration the latest and ongoing technology or its not worth considering."

— Community

"I agree with the design principle, as long as it doesn't negatively impact the designs of other change sponsors in FASI-S. I also think that an altitude should be defined, so it should facilitate continuous climb and descent to and from 7,000ft for example." – Aviation Stakeholder

"Makes sense to use what is available, but needs to keep up to date with new technology even if this means that older aircraft are unable to use the airspace."

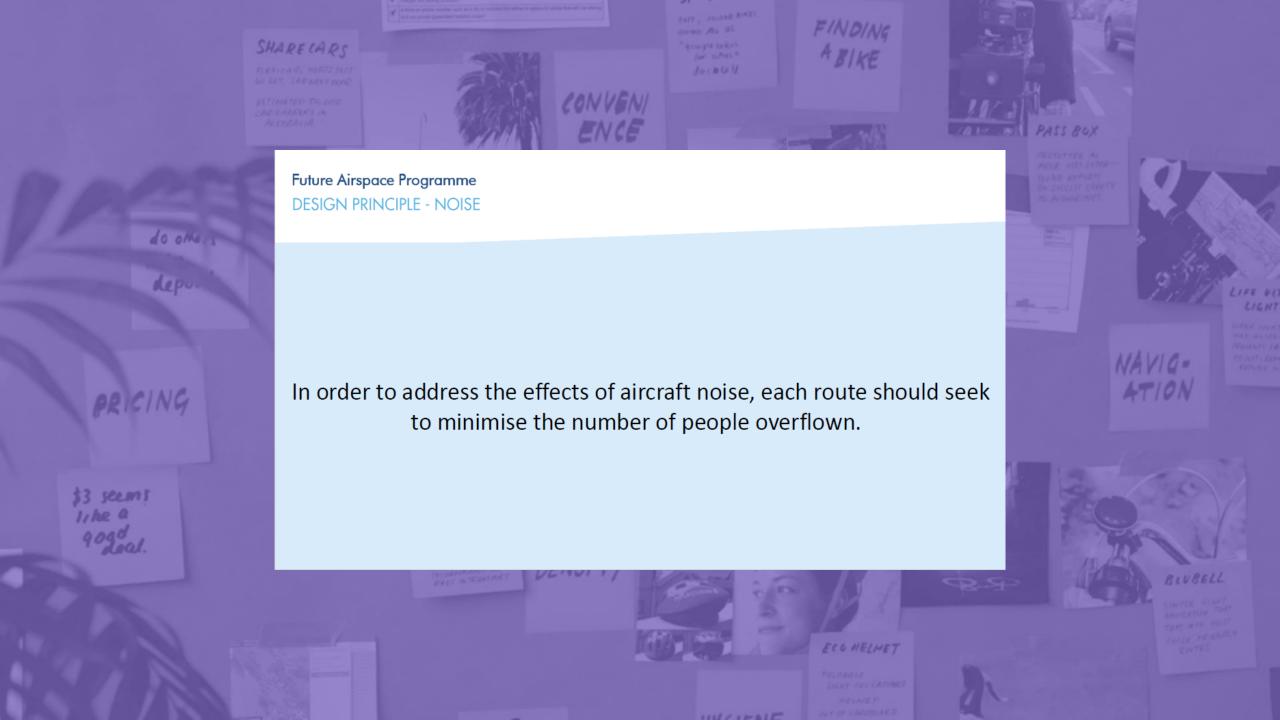
— General Public

\$3 seems

"The latest technology is satnav known as PBN and it has the benefits of aircraft to consistently and accurately follow flight paths and at the same time tailor routes to reduce environmental harms."

— Special Interest

"Keeping technology up to date, a very fast paced world" – Elected Rep



While design principle N1 shows consideration for communities, some question the logistics of this

This principle links back to previous discussions

 Stakeholders understand that noise impacts can be challenging to communities that are overflown – therefore this is a valid principle to include

But there are some questions around the logistics

- The area being overflown must be considered overflying smaller, rural communities would impact fewer people than overflying towns, but the noise impacts may be much more noticeable
- Some (esp. elected / aviation) comment on future developments in the area, which will need to be factored into route planning
- Others (aviation) note that even if Stansted avoids communities, they may still be overflown by aircraft from other airports

There are some calls for clarification

- There are some questions about the impacts of this approach (i.e. the number of people overflown may be at the detriment of environmental impacts etc.)
- For general public, in particular, 'seek to minimise' could be clarified, as it's open to interpretation as it stands.

Draft Design Principle – Noise 1

"In order to address the effects of aircraft noise, each route should seek to minimise the number of people overflown."



Stakeholders can understand the inclusion of this principle, given earlier discussions around minimising community impacts

Is this a logical addition / does it make sense?

- All can agree that this will be key for communities on the ground: noise is disruptive and should be minimised wherever possible.
- However, stakeholders recognise that noise impacts will vary depending on size of community, population density etc.
- While they want to see a reduction in the numbers of people flown over, they don't want this to lead to increased flight times, or more smaller communities being overflown as a result.

Draft Design Principle – Noise 1

"In order to address the effects of aircraft noise, each route should seek to minimise the number of people overflown."



While stakeholders can see the logic behind this principle, more detail would provide further reassurance

Clarification / extra information

- Those in the previous focus groups suggest that this ultimately depends on the area being over flown – the ambient noise, population density, height of overflying etc. – so this would need to be known to judge the principle more fully.
- There are also some comments about futureproofing here too, making it clear that routes will take into account future developments.

- Language broadly works well, with just minor calls for improvement:
- Using 'seek to minimise' seems non-committal
 to some substituting 'seek' with 'must' would
 indicate that this is more than a goal.



"What came first the flight route of the development! Lots of development planned in Essex over the next 30 years." – Elected rep

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"I take 'seek to minimise' as an indication that it may not be their number 1 priority." – General Public "The words "should seek" imply a goal only of course...! Replace "should seek" with must if you want to be certain the goal is achieved!" – Special Interest

"It's good in principle but ignores the noise levels at which people are overflown. Being overflown 20 miles from the airport is very different to 5 miles. How is the calculation to be done." – Special Interest

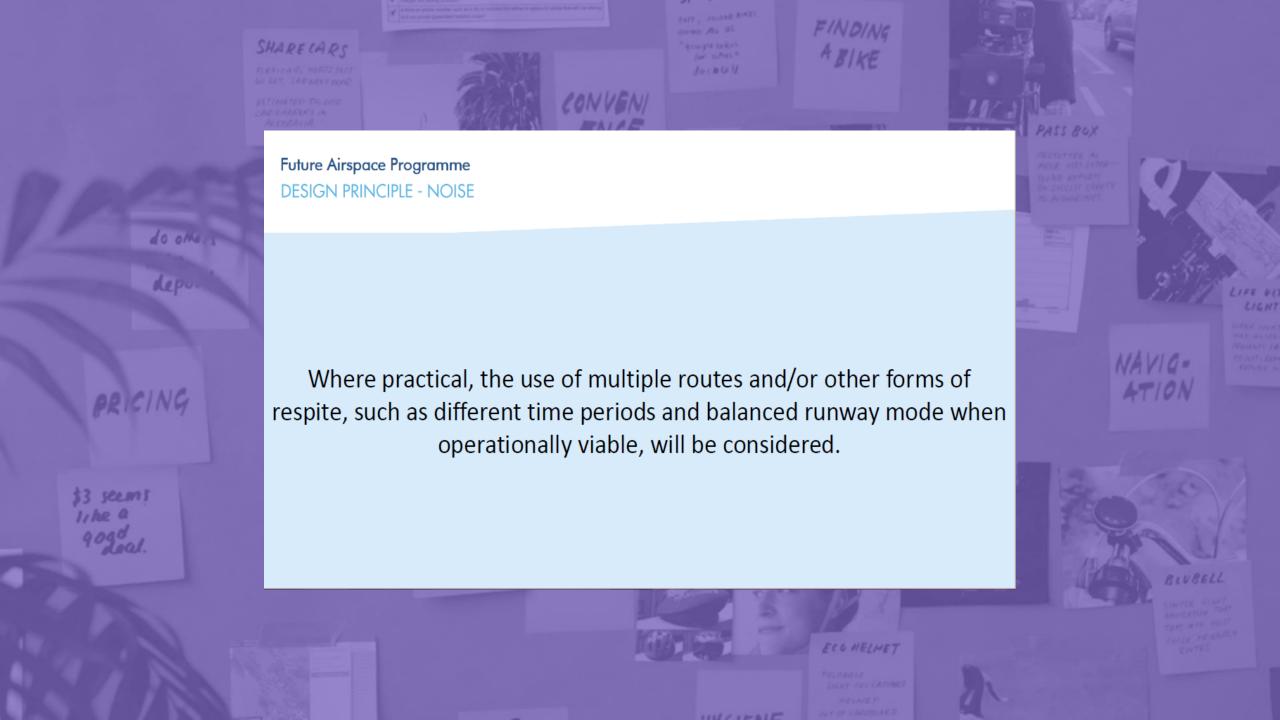
"There are plenty of issues mixed in with this, environmental, cost, noise etc.." – General Public "Yes makes sense but as has been demonstrated in this discussion numbers alone do not tell the full story." – Elected rep

"I think in certain circumstances id disagree if its at the cost of environment – longer flight times etc. it would be ineffective its something the flight paths currently try and do but its not necessarily the most economical." – General Public

\$3 seems

"I think a challenge is that Stansted will need to be aware of other change sponsors during the design process, as by avoiding a certain population, this may mean they are still overflown by other airports." – Aviation stakeholder

"This is a difficult one. In theory, absolutely, but if it means extending a flight by 10 minutes and therefore hugely increasing the pollution it is a harder call to make." – General Public



Across stakeholder groups, there is broad support for principle N2, as respite is considered to be important

All agree that noise is a key challenge that should be addressed

- Many have sympathy for local communities affected by noise
- This principle seeks to reduce impact on local communities by using multiple routes and respite – both key elements discussed in stage 1 of the research
- However, individuals do question whether this will bring inefficiencies into the system, with emissions targets potentially comprised with new routes

But it's a complex principle, with lots of variables involved

- While there's positivity at the different ways of providing respite, many feel that it would be quite complicated to roll out in reality (e.g. offer multiple routes, flights at different day parts etc.)
- However, the use of 'will be considered' provides reassurance that practical flexibility will be applied (esp. business, special interest, national orgs)

Further clarification on key points would be welcomed

- There are calls for some phrases including 'where practical', 'operationally viable' and 'balanced runway mode' to be clarified
- Some think that the language could be stronger, to be more committal.

Draft Design Principle – Noise 2

"Where practical, the use of multiple routes and/or other forms of respite, such as different time periods and balanced runway mode when operationally viable, will be considered."



This principle is a logical inclusion – reducing impact on overflown communities is important

Is this a logical addition / does it make sense?

- Across groups, all agree that this is a valid principle to include in the shortlist
- Stakeholders recognise the impact of noise on communities, and think that this principle could help to reduce continual impact on these areas
- Respite was discussed in depth in previous sessions, and it remains an important consideration for many – using multiple routes and other forms of respite will be key.

Draft Design Principle – Noise 2

"Where practical, the use of multiple routes and/or other forms of respite, such as different time periods and balanced runway mode when operationally viable, will be considered."



There are calls for minor clarifications to content and language to hone this principle further

Clarification / extra information

- While they understand why 'where practical' has been included (to give flexibility to the principle), they want to know what this refers to - i.e. what is operationally practical vs. practical in terms of emissions targets etc
- Some also question who is responsible for deciding what is practical, so additional content on this would be welcomed.

- Language could be clarified at key points:
- It's not clear what 'where practical' means in this context
- Some want to know when it would be
 'operationally viable' to put measures in place
- 'Balanced runway mode' is not understood as it stands, so a definition would be welcomed.



"From the point of view of living in a community that is overflown quite extensively it is good to have respite and know that after a couple of days of lots of overflying there will be a few more days with very little." – Elected rep

SHARECARS

"I agree using multiple routes would be fairer to all on the ground, it wouldn't be so intense if you only had half the amount of aircraft flying in the skies above your home." – General Public

"I'm not entirely sure what balanced runway mode is so that might need to be clarified. I agree with the principle though." – Community

"maybe some clarity on what operationally viable means and is there a scoring system for this, or is it just wind related?" – General Public "Where practical" is essential wording in this design principle. If it is possible, it should be done, but not if it involves doubling the size of Stansted's controlled airspace." – Aviation stakeholder

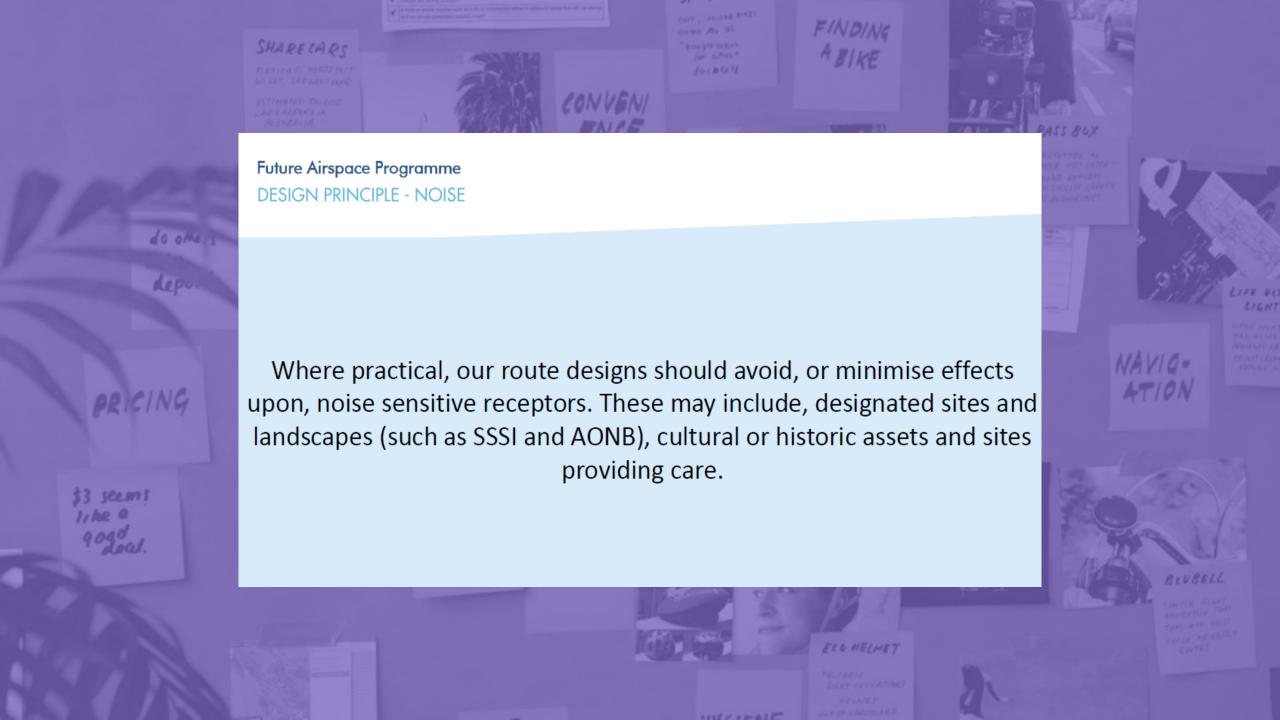
"Just allows the airport to do what they want as long as they can in some way claim it's not operationally viable to do it the other way." – General Public

"Is this "Design" or "Operation". I can see why it has been included but Its a bit vague and conditional." "— Aviation stakeholder

13 seems

"May again be open to interpretation as to when would be operationally viable and the fact that it would be 'considered'." – General Public

""...Will be considered" gave a degree of practical flexibility" – Special Interest



Stakeholders can understand the logic behind the inclusion of design principle N3, but they do question the practicality of this

They can understand the rationale for this principle

- Many feel that this should be a core principle: sensitive areas be they sites
 of care or of natural importance should be factored into the process
- This principle indicates that Stansted airport is showing consideration to the surrounding area and displaying social responsibility while doing so

But while good in theory, they question the practicality of it

- Stakeholders welcome the fact that Stansted have included this principle, as it seeks to limit the impact on surrounding areas, and on specific groups
- However, some question how this will play out in reality is it feasible to factor in all sensitive sites into future plans, or will it get too complicated?
- Some feel that it is too simplistic, as it does not reference other ways to minimise impact (e.g. flying over sensitive sites at certain times of day)

Some areas for clarification emerge

 Stakeholders struggle with some of the acronyms (SSSI and AONB), so these should be defined, for clarity

Draft Design Principle – Noise 3

"Where practical, our route designs should avoid, or minimise effects upon, noise sensitive receptors.

These may include, designated sites and landscapes (such as SSSI and AONB), cultural or historic assets and sites providing care."



The inclusion of this principle makes sense, and reflects discussions on the topic in earlier groups

Is this a logical addition / does it make sense?

- Stakeholders are positive about the inclusion of this principle, and can see the rationale for this
- It places social responsibility front and centre, which is welcomed by many
- However, they do recognise that this is quite a challenging task, and can see the practical challenges involved in assessing the areas that should / should not be avoided: 'where practical' is a useful (and necessary) qualifier here.

Draft Design Principle – Noise 3

"Where practical, our route designs should avoid, or minimise effects upon, noise sensitive receptors.

These may include, designated sites and landscapes (such as SSSI and AONB), cultural or historic assets and sites providing care."



There is scope to define acronyms and shape language in some areas to aid understanding

Clarification / extra information

- Individuals make the assumption that sites are not currently overflown, and that this principle supports the status quo, so this needs to be clarified
- Many comment on the operational complexity of this principle, and some (elected / aviation) say that other methods (e.g. flying over sensitive areas at certain times of day) could also play a role; this could be referenced in the principle.

- There are calls to clarify language:
- Acronyms SSSI and AONB aren't known by all, so these should be clearly defined
- Some also ask what 'noise sensitive
 receptors' means, so this should be clarified.



"It would simply not be possible to avoid EVERY site of interest, historical building etc., but certainly hospitals/care homes etc. should not be flown over if possible." – General Public

SHARECARS

"Acronyms should be avoided. I agree with the principle though, it's important to take these 'sites' into consideration." – Community

"It's nice that social responsibility is a consideration." – General Public

"Makes sense. Presumably these sites are already not overflown "where practical" and so it simply safeguards the status quo?" – Aviation stakeholder

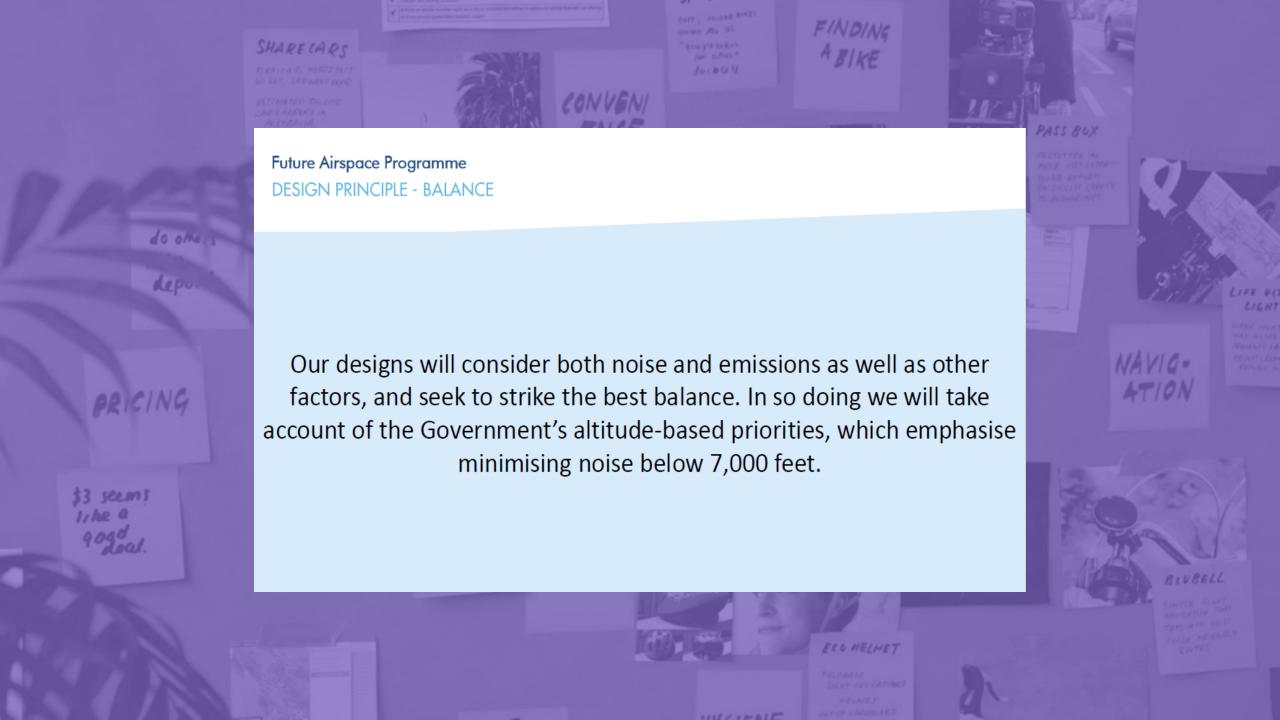
"There are certainly challenges involved in deciding who/what is more 'worthy' of avoiding." – General Public "I am not sure they need to be avoided completely, it might be that the effects can be minimised, for example only overflying them at night to avoid densely populated areas at night?" – Aviation stakeholder

"Good in theory. In practice to avoid towns and villages and these environmental sites won't leave much space for flight paths." – Community

\$3 seems

"I think sites providing care need to be considered on an ad hoc basis. some people in them won't be bothered... but some people with learning problems or PTSD may find themselves getting adversely affected..." – General Public

"SSSIs can include habitats of rare species that do not thrive with disturbance. This also applies to places of learning, where noise is a great disruptor" – Elected rep



Given the importance of noise and emissions to stakeholders in the earlier research, principle B is positively received

Stakeholders understand the inclusion of this principle

- Noise and emissions are key topics for stakeholders, and played a strong role in earlier conversations
- Noise is seen to be a particular challenge at lower altitudes particularly for quieter, more rural areas – but they recognise that emissions also plays a role and the two need to be addressed in balance

However, there are some questions about the specifics

- Some question how a balance will be struck between the two noise is a challenge but emissions are an issue too – how will this be executed?
- Others (business, special interest, national orgs) ask what 'other factors' will be considered here – would this be number of aircraft and background noise, or other factors?

There are calls for content to be strengthened

Language is considered to be vague in some areas (e.g. 'best balance' and 'seek to), and could be firmed up / strengthened.

Draft Design Principle - Balance

"Our designs will consider both noise and emissions as well as other factors, and seek to strike the best balance. In so doing we will take account of the Government's altitude-based priorities, which emphasise minimising noise below 7,000 feet."



Stakeholders can understand the rationale for inclusion, and recognise that it reflects earlier conversations on the topic

Is this a logical addition / does it make sense?

- All stakeholders understand the rationale for including the principle, given the importance of both noise and emissions in the focus groups
- Striking a balance between noise and emissions will be important for surrounding communities
- Aviation reps make the point that the government-based altitude principles should be included, given that the FASI programme is a Government sponsored scheme.

Draft Design Principle - Balance

"Our designs will consider both noise and emissions as well as other factors, and seek to strike the best balance. In so doing we will take account of the Government's altitude-based priorities, which emphasise minimising noise below 7,000 feet."



The language / content broadly works well, but there is scope to strengthen language in places

Clarification / extra information

- There are some questions about the reference to 'other factors' which is felt to be vague and open to interpretation at present
- Individuals (aviation) ask for clarification on the principle, as it's not clear whether the principle will 'seek to strike the best balance' or 'prioritise noise over other factors' in the current execution.

- There are calls for some terms to be defined:
- Many ask what 'best balance' means in this context, so it should be clarified
- There are calls for 'seek to' to be strengthened, to show greater commitment to the principle
- 'Other factors' is also felt to be vague, and again, could be strengthened



"Sound enough but a statement of the obvious. It would be surprising if the Governments altitude based priorities were not to be taken account of given the FAS is Govt driven." – Aviation stakeholder

SHARECARS

"Compromise is key, but you can't meet all the factors all the time unfortunately." – General Public

"Other factors' is very vague... some clarification is needed there.." – Community

"I live in a community where planes are regularly flying under 7,000 feet and it is a lot more noticeable than the higher flying aircraft so I can see the reasoning regarding noise" – Elected rep "There is always going to be people you upset. Anyone who currently doesn't have a route through their area would be upset about the potential of having one however outlining a clear balance is key." – General Public

"It's unclear whether is DP will "seek to strike the best balance" or will prioritise noise over other factors." – Aviation stakeholder

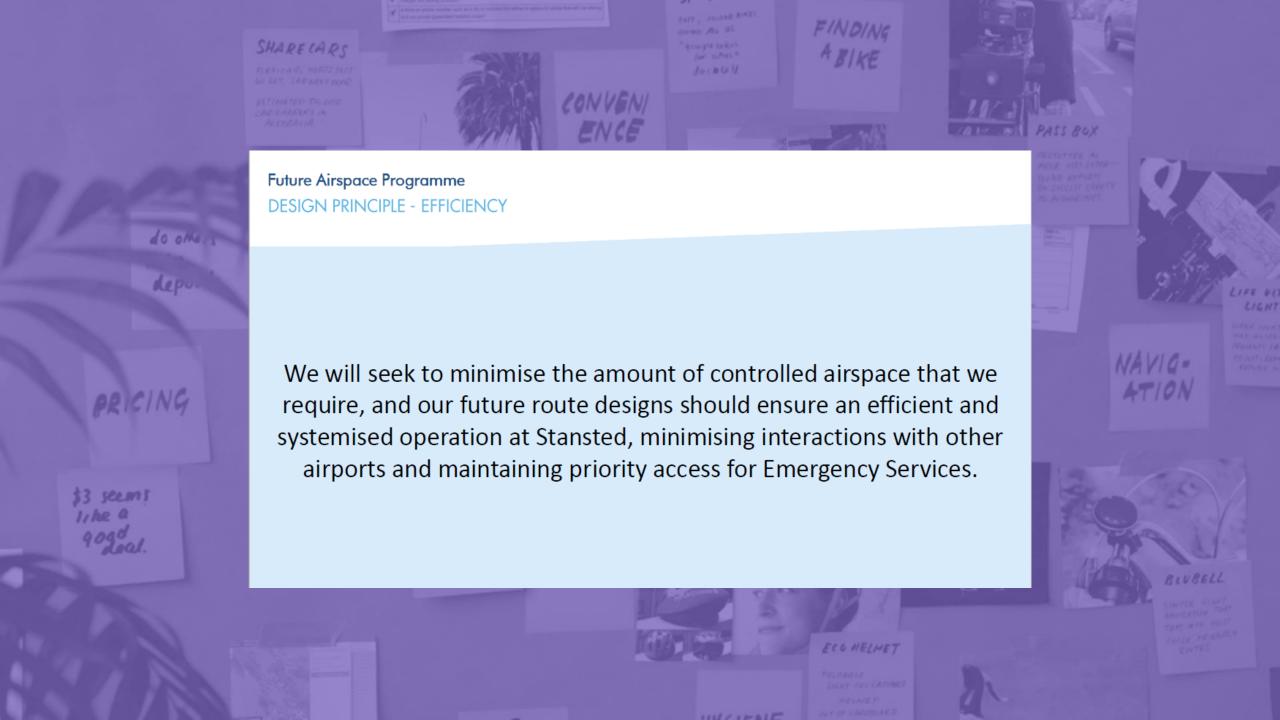
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"I think the challenge here will be reaching something that somebody will be happy with, rather than leaving everybody unhappy." – General Public

\$3 seems

"Not a very strong statement and not real commitment. consideration and balance are very open to interpretation and ambiguity." – Community

"Definitely [include], provided that what the 'best balance' is made clear and transparentt." – General Public



Stakeholders agree that efficiency will be central to airspace modernisation, and can therefore see the value in principle E

This principle is an important inclusion for most

- Focusing on efficiency will be a key part of airspace modernisation, so designing routes that are efficient / promote efficient operations will be key
- Emergency aircraft were seen to take greatest precedence in earlier conversations, so their prioritisation is well received

The implications are generally understood

- Those that understand the impact of releasing controlled airspace can see the benefits of this (i.e. allowing other users to use it if needed)
- General public respondents expect a more efficient airspace to have a positive affect on emissions

There is opportunity to explain more technical elements

• Explaining what controlled airspace is, and how any change might impact operations at Stansted, would aid comprehension.

Draft Design Principle - Efficiency

"We will seek to minimise
the amount of controlled
airspace that we require,
and our future route
designs should ensure an
efficient and systemised
operation at Stansted,
minimising interactions with
other airports and
maintaining priority access
for Emergency Services."



This is seen as a logical addition to the design principles – efficiency should be at the core of future change

Is this a logical addition / does it make sense?

- Stakeholders understand the need to focus on efficiency of process, and can understand the inclusion of this principle
- The prioritisation of emergency aircraft is well received by all, but particularly general public
- Aviation reps have a clear understanding of the benefits of releasing controlled airspace, and are positive about this (esp. GA aviation).

Draft Design Principle - Efficiency

"We will seek to minimise
the amount of controlled
airspace that we require,
and our future route
designs should ensure an
efficient and systemised
operation at Stansted,
minimising interactions with
other airports and
maintaining priority access
for Emergency Services."



Most feel that language and content is clear, but the reference to controlled airspace could be honed slightly

Clarification / extra information

- Some ask for further details around the reduction to controlled airspace – how much are Stansted looking to reduce it by and what impact would this have in real terms?
- There are questions from some aviation reps about the reference to 'increased CAS' in the supporting copy – they want reassurance that any change here would be justified.

- Language broadly works well, though there are calls for small changes:
- 'Controlled airspace' is not always understood by those outside of the aviation industry, and should be clarified
- Many ask what 'efficient and systemised operations' mean, so this should be explained.



"All round yes. reducing the airspace you need seems sensible.... unless it impacts efficiency or safety." – General Public

SHARECARS

"Minimising interaction with other airports does suggest a proposed reduction of joined up working." – Community

"Again, should go without saying that emergency services will have priority" – General Public

"It's fine. But I would not want to see a good design turned down because it would need more airspace" – Special Interest

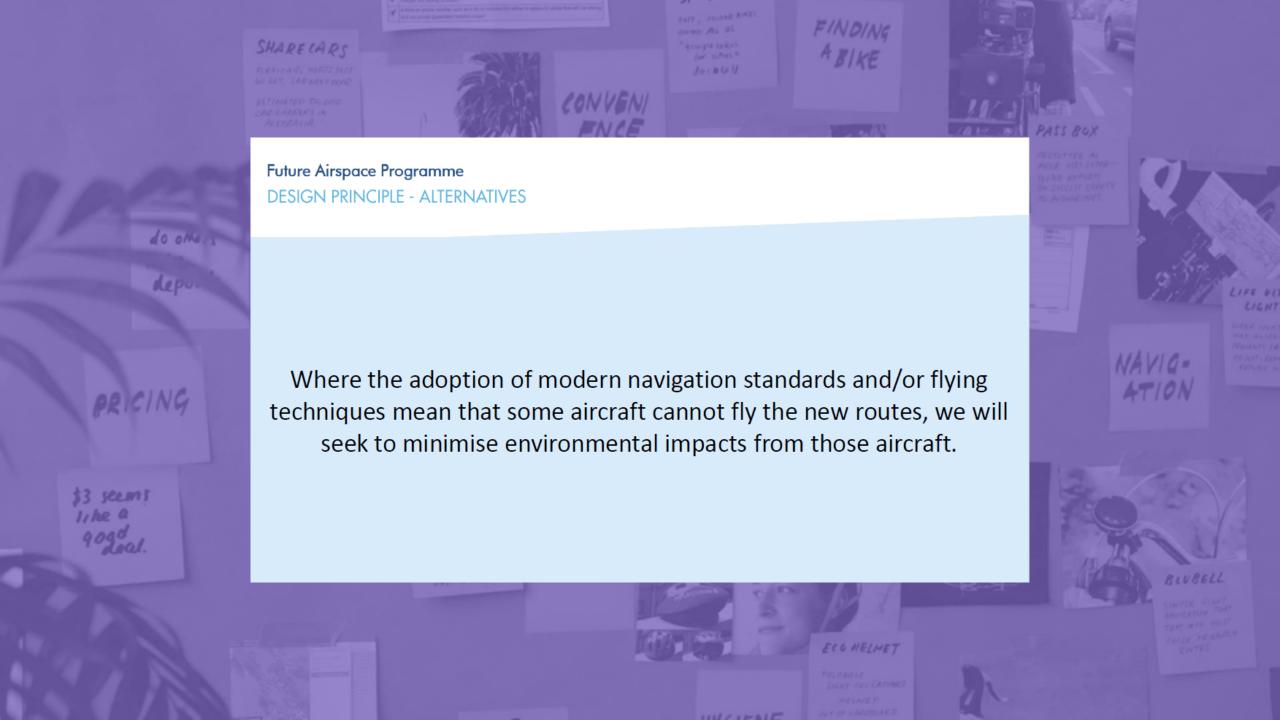
"Could possibly expand on what an 'efficient and systemised operation at Stansted' means." – General Public "There is no relativity to the amount of controlled airspace that is currently used by Stansted. Are they planning on doubling it?" – Community

"Our expectation would be that this is justified and also recognises that in the UK class G (Open Airspace) is the default position." – Aviation stakeholder

\$3 seems

"Can we assume "efficient and systematised operation" is a synonym for automated?" – General Public

"Yes I can see the logical and I think it is important it remains within the list." – Aviation stakeholder



Stakeholders recognise the need to reduce the environmental impacts of older aircraft, and welcome design principle A

The rationale for this design principle is clear

- Efficiency is understood to be a key element of any future redesign, to ensure the best use of airspace
- Many expect older aircraft to be phased out in future, and see this as a way to start that process and reduce environmental impacts
- Many agree that this principle reflects earlier conversations

There are some questions about logistics

- Many want to know that 'minimise environmental impacts' means in this context – and information on who will oversee / monitor / assess this would be welcomed
- Others (elected / aviation) ask about the logistics of the phase out, i.e. whether specific routes / procedures will be created for older aircraft, and how this will impact airspace redesign

There's opportunity to clarify some elements

 Aviation stakeholders ask for change sponsors from FASI-S to be referenced in this design principle, i.e.: to minimise impacts 'whilst ensuring network efficiency for all change sponsors involved in FASI-S'.

Draft Design Principle – Alternatives

"Where the adoption of modern navigation standards and/or flying techniques mean that some aircraft cannot fly the new routes, we will seek to minimise environmental impacts from those aircraft."



New technology is expected to be key in airspace redesign, so they can understand the inclusion of this principle

Is this a logical addition / does it make sense?

- Across groups, there's agreement that efficiency should be central to change, and expect technology and efficiency to go hand-in-hand
- Stakeholders recall discussions on technology in the earlier sessions, and can understand how this principle came to be included
- However, there are some questions about the logistics here, and they'd be looking for more tangible details at consultation phase.

Draft Design Principle – Alternatives

"Where the adoption of modern navigation standards and/or flying techniques mean that some aircraft cannot fly the new routes, we will seek to minimise environmental impacts from those aircraft."



There are requests for additional information, and for stronger language in places, to enhance cut through

Clarification / extra information

- Some ask for more details on older aircraft (e.g. proportion of the fleet made up by older craft), and elected reps / aviation call for specifics on the logistics of the phase out process
- Others, esp. general public, ask for details on what measures will be put in place to reduce the environmental impacts of older aircraft
- Many also want to know what environmental impacts STN will seek to minimise.

- Language broadly works well, but could be strengthened in places:
- For many, 'seek to minimise' is too weak / noncommittal, and could be strengthened
- 'FASI-S airports' is understood with additional information, but there's scope to define this in the principle itself.



"This seems sensible. Most airlines will be moving towards more modern more efficient aircraft anyway (due to running costs and increased capacity), so the issue is likely to be a minor one." – Community

SHARECARS

"If they are old and dated and not using latest navigation standards, why are they still flying?" – General Public

"Very vague on how you would minimise that environmental impact if, in fact it was possible or viable." – Community

"How will those aircraft be handled...
will there be specific routes or
procedures to cater for them? how
does this affect the airspace design
(inc. requirement for CAS) as well as
the environmental aspect?" –
Aviation

"Challenges would be faced if a large number of the planes that currently use Stansted do not comply." – General Public "I think this is a fair design principle, but I think it should altered towards the end to be that 'minimise environmental impacts whilst ensuring network efficiency for all change sponsors involved in FASI-S" – Aviation

"I think if your going to keep older flight paths for older craft that cant accommodate it's a bit pointless creating new ones." – General Public

13 seems

"Efficiency has to be the priority." – Community "[They] need a phased out plan, but make it clear old, inefficient aircraft have a sell by date" – General Public

Final thoughts

Final thoughts

- 1 Stakeholders can understand the inclusion of the design principles, and can see how their earlier conversations have shaped these.
- While there is broad support for the design principles, they do, however, recognise that some of these are very complex and may be more difficult to execute than others.
- There's positivity at the inclusion of noise and emissions related principles, given the focus on these topics in the earlier stage of research; safety and regulatory principles are also considered essential.
- 4 Language and content generally work well, but there is scope to clarify this in places (e.g. with definitions) to aid comprehension; defining technical terms will be key.
- There are calls for additional contextual information in some design principles, particularly those that focus on more technical elements, to ensure that they're accessible and understood.



Friday 29th May

Stansted Airport: Future Airspace Research – Phase 2

Melanie Nicholls – Director, Head of Qualitative Research Natasha Ward – Senior Research Executive, Qualitative Research

