Section 2: Feedback received to Design Principles stakeholder review

RSP | Manston Airport

Manston Airport Airspace Design and Procedures

Design Principle Stakeholder Review

Table of Contents

1. Airspace Design and Procedures

1.1 Introduction

RiverOak Strategic Partners Limited (RSP) would like to thank all stakeholders who have engaged with the Airspace Design and Procedures process so far and for the feedback provided by various representative bodies. This has helped us to derive a comprehensive list of potential Design Principles that reflect the statements made during focus group events and from questionnaires received.

This document has been prepared to share the list of Design Principles developed during recent engagement activities. We now need your help to provide further comments on the list to help us understand which Design Principles are most important to your organisations.

1.2 Background

RSP is proposing to redevelop and reopen Manston Airport as a successful hub for international air freight which also offers passenger travel, executive travel and aircraft engineering services. The airport would be comprehensively rebuilt and upgraded, including the provision of extensive cargo aircraft stands. The proposed development is subject to a Development Consent Order (DCO) application submitted by RSP to the government Planning Inspectorate (PINS) in July 2019.

In addition to the DCO, RSP will need to submit an application to the CAA to establish the procedures required to enable safe and efficient operations to and from the airport in accordance with the Civil Aviation Publication (CAP) 1616 – *Airspace Design: Guidance on the regulatory process for changing airspace design including community engagement requirements*.

The guidance in CAP 1616 sets out the framework for the 7 stages of the process and the activities that must be undertaken, including engagement and consultation requirements. We have now completed the initial phase of our engagement (part of Stage 1, CAP 1616) to establish our Design Principles for the introduction of Instrument Flight Procedures (IFP) at Manston Airport.

The process to gain approval for procedures is separate to the DCO process. We are only concerned with the Design Principles that will inform the design of the procedures as part of the CAP 1616 process.

[1] CAA Civil Aviation Publication (CAP) 1711

1.3 Development Methodology

All airspace changes within the UK must follow the regulatory process described in CAP 1616. The process was developed to ensure a high degree of transparency and adequate levels of two-way engagement with all relevant stakeholders, including local communities. The early stage of the process involves the development of Design Principles and the activities shown below have helped us to determine the initial list of potential Design Principles detailed later in Section 2:

- Design Principles Questionnaire – Aviation Stakeholders
- Design Principles Questionnaire – Non-Aviation Stakeholders
- Focus Groups

In early October, questionnaires were distributed to specialist aviation and technical groups, local authorities, parishes and politicians representing their organisations and communities, to seek their feedback on a number of topics related to airspace design. In addition, three focus groups were held in November where aviation and non-aviation stakeholders were offered the opportunity to discuss the proposed introduction of procedures.

The questionnaire responses have been analysed and along with the comments and discussion recorded during the focus groups, have helped us to develop a list of potential Design Principles which will serve as a qualitative framework against which the different design options that we produce, will be evaluated. It is therefore important that your views have been accurately captured.

1.4 Highest Priority Design Principles

Any changes to airspace arrangements must maintain high standards of safety. This is the main priority of the CAA in accordance with its statutory duties set out in Section 70(1) of the Transport Act 2000. Therefore, the overriding Design Principle against which the design options will be developed will be as follows:

- **SAFETY**

  Procedures must be designed to meet acceptable levels of flight safety

  The CAA's Airspace Modernisation Strategy (AMS) and the Masterplan that NERL has been commissioned (jointly by the Department for Transport and the CAA) to produce will affect any airspace and procedures that Manston Airport will be proposing to introduce. It is important that the impact of the AMS and the Masterplan work on this airspace change is included. Any design work will also take into account the change in vertical reference caused by the transition altitude, particularly with interactions with other airports. Therefore, subject to the overriding Design Principle of Safety, the highest priority Design Principle for this airspace change will be as follows:

- **HARMONISATION**

  Design options must accord with the CAA's published Airspace Modernisation Strategy (CAP 1711) and any current or future plans associated with it.

1.5 Stakeholder Review Requirements

Section 2 - Review of Design Principles

Please take a look at the potential Design Principles listed in Table 1 below. For each of the Design Principles listed, we would like you to state whether or not you agree that the statement constitutes a Design Principle. If you do not agree, please provide detail in the comment box provided.

In addition, we would like you to rank the Design Principles according to your organisation's priorities. Please rank the Design Principles from 1 (Highest priority) to 6 (Lowest priority). If you feel any of the Design Principles are not applicable to your organisation, please mark it as '0'. Please add any amplifying comments you wish to include, also in the comments box.

Please note that this list, and your subsequent prioritisation, does not include the highest priority Design Principles (SAFETY and HARMONISATION) that have been described in paragraph 1.4 above.

Please complete Table 2 to provide any additional comments that you feel have not been considered, or suggest any additional Design Principles you feel ought to be considered by RSP for Manston Airport.

Section 3 – Potential Design Principles Not Taken Forward

Table 3 articulates some other potential Design Principles that have not been included in the list of Design Principles under consideration. Please make any comments relating to this list in the space provided in Table 3.

Design Principles are used to help us identify design options at the next stage in the CAP 1616 process. By prioritising Design Principles now, we will be able to develop design options that best meet the Principles identified as the highest priorities while also maximising other potential benefits.

1.6 How to Respond

Please save the file that includes your responses as a Microsoft word document and attach to an email to the following address: manstonairspace@communityrelations.co.uk

In addition to the word file, we will accept scanned, hand-written responses as long as they are legible, or email responses that clearly identify the Design Principle or question to which your response relates.

It is important that email responses clearly show your name, representative organisation and contact details; this will allow us to cross-refer your response to the emails we send out.

We will also accept legible postal responses to Free Post 1616 by the deadline date below:

Please respond by mid-day Friday 17th January 2020.

[1] A single coordinated UK airspace design and implementation masterplan for airspace changes up to 2040.

[2] NERL – NATS En-Route Ltd - the sole provider of civilian en-route air traffic control over the UK.

1.7 Next Steps

The CAP 1616 process relates to gaining approval for airspace and procedures only for Manston Airport.

Completion of Stage 1 – Design Principles

The responses you now provide will help us to refine the Design Principles before we submit them to the CAA for its review and approval. This is known as the CAA's DEFINE Gateway and marks the completion of Stage 1 of the CAP 1616 airspace change process for Manston Airport.

Stage 2 – Design Options

Once the Design Principles are approved by the CAA, we will then progress to Stage 2 of the CAP 1616 process, where we will commence detailed airspace and procedure design work to develop design options.
Further engagement activities will take place during this stage to seek your views on the design options before they are submitted to the CAA for their appraisal. This is known as the CAA's DEVELOP and ASSESS Gateway currently planned for mid-2020.

Engagement during Stage 1 and 2 is for representatives of specialist aviation and local authority bodies who represent their local organisations and communities.

Stage 3 – Consultation on Design Options

We will be consulting widely with residents, businesses, communities, the public and other stakeholders at Stage 3 (Consult) later in 2020 or early 2021 when detailed design options have been developed.

RSP will ensure any feedback given during Stages 1 and 2 will be collated and included in a consultation report alongside feedback at Stage 3. The consultation report will be part of RSP's airspace change and procedures proposal submitted to the CAA for approval.

Documentation relating to the CAP 1616 process is published on the CAA's portal.

2. Review of Design Principles

2.1 Your Responses

Please complete

Table and **Error! Reference source not found.** below in line with the guidance provided in Section **Error! Reference source not found.**. Please use as much space as you require, the size of the response box will expand as you type your response.

Please complete the following:

Representative Organisation:
FORDWICH TOWN COUNCIL

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	YES	3
Comments: A balance must be struck between the control of noise and emissions.			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	YES	1
Comments: As previously commented, a variety of SID and STAR (STAR supplemented by radar vectoring) preferred: to disperse both noise and emissions.			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Yes	1
Comments: Nil further.			
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	Yes	1

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Comments: As previously commented, a variety of SID and STAR (STAR supplemented by radar vectoring) preferred: to disperse both noise and emissions.			
Designs should minimise the impact on other airspace users in the local area.	The airspace and procedure design should aim to address the needs of all air traffic operating in the local area. New routes must take into account General Aviation (Sports & Recreation) operations at local airfields and avoid any unnecessary impact. Access to airspace should be ensured, especially for military fixed wing and rotary aircraft to meet defence operational and training requirements.	Yes	1
Comments: The expansion of Regulated Airspace should be minimised in the UK generally, to avoid creating choke points between areas of Regulated Airspace and to permit necessary freedom of movement for GA and recreational aviation. The latter is suffering particularly from the sale of small airfields for, particularly, residential development. The aviation use of small airfields, such as Maypole, must be protected. It is appreciated that plans for the redevelopment of Manston include GA; it would be good to see the return of the thriving flying club that was evicted by the previous Manston owners, and for the helicopter training school at Manston to be able to continue its activities.			
Designs should where possible, make provision for multiple routes that can be used to spread the noise burden more equitably.	Airspace design should make provision for multiple arrival and departure routes to spread the burden of over-flight more equitably between communities.		
Comments: As previously commented, a variety of SID and STAR (STAR supplemented by radar vectoring) preferred: to disperse both noise and emissions.			

Table 2 – Additional Comments

If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
Comments: Nil further.
Are there other Design Principles not included in the list that you feel should be considered as candidates for the final shortlist? If so, please provide your comments.
Comments: Nil further.

3 Potential Design Principles Not Taken Forward

3.1 Potential Design Principles

Error! Reference source not found. below articulates some potential Design Principles that have also been developed as a result of the feedback received from questionnaires and the focus group meetings. However, these have not been included in the list of Design Principles shown in

Table above for your review for the reasons indicated. If you wish to make any comments relating to this list, please do so in the space provided. Please use as much space as you require, the size of the response box will expand as you type your response.

Table 2 – Potential Design Principles Not Taken Forward

Potential Design Principle	Reasons for not Including
Routes should, where possible, be designed to be PANS-OPS compliant	The new routes will be designed, where possible, so that they comply with the internationally agreed criteria set down in the International Civil Aviation Organisation (ICAO) document PANS-OPS 8168 Volume 2 – *Construction of Visual and Instrument Flight Procedures*. Any deviation from the criteria set down in PANS-OPS would require Manston Airport to produce a robust safety case to justify why the designs are not compliant, before they can be approved by the CAA. Manston Airport considers that this is a safety-related principle and as such, will be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Routes should be chosen to minimise the flight distance over land and maximise distance over the sea to reduce the impact of noise and emissions	Consideration of the impact of noise and emissions has already been included as Design Principles. Manston Airport is required to produce a comprehensive list of route designs at Stage 2 of the CAP 1616 process and this list will include options that minimise the time spent overland by designing tracks that route over the sea as much as possible. As a result, this is considered to be a design option, rather than a Design Principle, and will be considered at the next step of the process.
Comments:	
There should be no overflying of Ramsgate	Given the location of Manston Airport in relation to the town of Ramsgate, it would not be possible to design procedures to the east of the airport that completely avoids any overflight of the town. However, designs will seek to minimise the impact of noise and emissions over the town in line with the Design Principles above. Manston Airport is also planning to introduce operational procedures (a noise preferential runway system) to minimise the impact on Ramsgate.
Comments:	
Any new airspace should be the minimum volume necessary	At this stage, Manston Airport is not planning on introducing any new airspace other than an Aerodrome Traffic Zone (ATZ). Notwithstanding this, the provision of regulated airspace to protect traffic operating at Manston Airport is a potential design option, rather than a Design Principle. Any requirement to introduce additional Controlled Airspace (CAS) would be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Consider the Flexible Use of Airspace	Any revised airspace structure should be adaptable to minimise the impact on other airspace users. Manston Airport assesses that this could be considered as a potential design option relating to the type of CAS required to protect traffic operating at Manston Airport. As previously stated, this will be considered under the Design Principle SAFETY.
Comments:	
Any new airspace should facilitate fair access to all airspace users.	Any regulatory change or airspace amendment should continue to allow fair access to the airspace for all aviation users. Manston Airport is not currently planning on introducing any regulated airspace to protect traffic operating from the airport, but should this be required, consideration of fair access will be considered under the Design Principle that seeks to minimise the impact on other airspace users.
Comments:	

RSP | Manston Airport

Manston Airport Airspace Design and Procedures

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1. Airspace Design and Procedures

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Documentation relating to the CAP 1616 process is published on the CAA's portal.

2. Review of Design Principles

2.1 Your Responses

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Please use as much space as you require, the size of the response box will expand as you type your response.

Please complete the following:

Representative Organisation:
Herne and Broomfield Parish Council

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	Yes	2
Comments: **Although emissions need to be considered noise impact can have a massive effect on residents quality of life**			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	Yes	1
Comments: We need to ensure pollution is as low as possible			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Yes	1
Comments: Totally agree with this			
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	Yes	1

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Comments: Agree			
Designs should minimise the impact on other airspace users in the local area.	The airspace and procedure design should aim to address the needs of all air traffic operating in the local area. New routes must take into account General Aviation (Sports & Recreation) operations at local airfields and avoid any unnecessary impact. Access to airspace should be ensured, especially for military fixed wing and rotary aircraft to meet defence operational and training requirements.	Yes	2
Comments:			
Designs should where possible, make provision for multiple routes that can be used to spread the noise burden more equitably.	Airspace design should make provision for multiple arrival and departure routes to spread the burden of over-flight more equitably between communities.	Yes	2
Comments: Should avoid continual noise nuisance in one area if possible			

Table 2 – Additional Comments

If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
Comments:
Are there other Design Principles not included in the list that you feel should be considered as candidates for the final shortlist? If so, please provide your comments.
Comments:

3 Potential Design Principles Not Taken Forward

3.1 Potential Design Principles

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The questionnaire responses have been analysed and along with the comments and discussion recorded during the focus groups, have helped us to develop a list of potential Design Principles which will serve as a qualitative framework against which the different design options that we produce, will be evaluated. It is therefore important that your views have been accurately captured.

1.4 Highest Priority Design Principles

Any changes to airspace arrangements must maintain high standards of safety. This is the main priority of the CAA in accordance with its statutory duties set out in Section 70(1) of the Transport Act 2000. Therefore, the overriding Design Principle against which the design options will be developed will be as follows:

- **SAFETY**

  Procedures must be designed to meet acceptable levels of flight safety

  The CAA's Airspace Modernisation Strategy (AMS) and the Masterplan that NERL has been commissioned (jointly by the Department for Transport and the CAA) to produce will affect any airspace and procedures that Manston Airport will be proposing to introduce. It is important that the impact of the AMS and the Masterplan work on this airspace change is included. Any design work will also take into account the change in vertical reference caused by the transition altitude, particularly with interactions with other airports. Therefore, subject to the overriding Design Principle of Safety, the highest priority Design Principle for this airspace change will be as follows:

- **HARMONISATION**

  Design options must accord with the CAA's published Airspace Modernisation Strategy (CAP 1711) and any current or future plans associated with it.

1.5 Stakeholder Review Requirements

Section 2 - Review of Design Principles

Please take a look at the potential Design Principles listed in Table 1 below. For each of the Design Principles listed, we would like you to state whether or not you agree that the statement constitutes a Design Principle. If you do not agree, please provide detail in the comment box provided.

In addition, we would like you to rank the Design Principles according to your organisation's priorities. Please rank the Design Principles from 1 (Highest priority) to 6 (Lowest priority). If you feel any of the Design Principles are not applicable to your organisation, please mark it as '0'. Please add any amplifying comments you wish to include, also in the comments box.

Please note that this list, and your subsequent prioritisation, does not include the highest priority Design Principles (SAFETY and HARMONISATION) that have been described in paragraph 1.4 above.

Please complete Table 2 to provide any additional comments that you feel have not been considered, or suggest any additional Design Principles you feel ought to be considered by RSP for Manston Airport.

Section 3 – Potential Design Principles Not Taken Forward

Table 3 articulates some other potential Design Principles that have not been included in the list of Design Principles under consideration. Please make any comments relating to this list in the space provided in Table 3.

Design Principles are used to help us identify design options at the next stage in the CAP 1616 process. By prioritising Design Principles now, we will be able to develop design options that best meet the Principles identified as the highest priorities while also maximising other potential benefits.

1.6 How to Respond

Please save the file that includes your responses as a Microsoft word document and attach to an email to the following address: manstonairspace@communityrelations.co.uk

In addition to the word file, we will accept scanned, hand-written responses as long as they are legible, or email responses that clearly identify the Design Principle or question to which your response relates.

It is important that email responses clearly show your name, representative organisation and contact details; this will allow us to cross-refer your response to the emails we send out.

We will also accept legible postal responses to Free Post 1616 by the deadline date below:

Please respond by mid-day Friday 17th January 2020.

[1] A single coordinated UK airspace design and implementation masterplan for airspace changes up to 2040.

[2] NERL – NATS En-Route Ltd - the sole provider of civilian en-route air traffic control over the UK.

1.7 Next Steps

The CAP 1616 process relates to gaining approval for airspace and procedures only for Manston Airport.

Completion of Stage 1 – Design Principles

The responses you now provide will help us to refine the Design Principles before we submit them to the CAA for its review and approval. This is known as the CAA's DEFINE Gateway and marks the completion of Stage 1 of the CAP 1616 airspace change process for Manston Airport.

Stage 2 – Design Options

Once the Design Principles are approved by the CAA, we will then progress to Stage 2 of the CAP 1616 process, where we will commence detailed airspace and procedure design work to develop design options.
Further engagement activities will take place during this stage to seek your views on the design options before they are submitted to the CAA for their appraisal. This is known as the CAA's DEVELOP and ASSESS Gateway currently planned for mid-2020.

Engagement during Stage 1 and 2 is for representatives of specialist aviation and local authority bodies who represent their local organisations and communities.

Stage 3 – Consultation on Design Options

We will be consulting widely with residents, businesses, communities, the public and other stakeholders at Stage 3 (Consult) later in 2020 or early 2021 when detailed design options have been developed.

RSP will ensure any feedback given during Stages 1 and 2 will be collated and included in a consultation report alongside feedback at Stage 3. The consultation report will be part of RSP's airspace change and procedures proposal submitted to the CAA for approval.

Documentation relating to the CAP 1616 process is published on the CAA's portal.

2. Review of Design Principles

2.1 Your Responses

Please complete

Table and **Error! Reference source not found.** below in line with the guidance provided in Section **Error! Reference source not found.**. Please use as much space as you require, the size of the response box will expand as you type your response.

Please complete the following:

Representative Organisation:
Kent County Council

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	Yes	1
Comments: Noise continues to be our main consideration in regard to the impacts of aviation on local communities. The Government's altitude-based priorities states that overflight of more densely populated areas should be avoided below 7,000 feet, but be balanced with emissions between 4,000 and 7,000 feet (all above mean sea level). At heights above 7,000 feet, it is unlikely for aircraft noise to severely impact the majority of people, but research has shown that individuals are becoming more sensitive to aviation noise and this sensitivity can result in disturbance, stress and ultimately negative health outcomes. Furthermore, while aviation noise may not be a statutory nuisance, that does not mean it does not cause substantial distress. It is proven that noise that disrupts sleep is the most damaging to health. Therefore, we would fully encourage restrictions on night noise.			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	Yes	4
Comments: We recognise that emissions and the ability of the UK to meet air quality standards and reduce carbon emissions are clearly very important concerns but current Government policy would favour noise reduction in the areas closer to the airport. However, subject to community viewpoints, there may be a balance to be struck where multiple routes could provide predictable respite and reduce the extent of any increased emissions due to 'bypassing' communities. KCC recognises the potential improvements to the noise and air quality environment by the design of more fuel-efficient routes, faster climbs, quieter descents, and accurate navigation around populated areas; however, in some areas communities will not benefit. The South East is an area where the demand for more flights is being focused on a densely populated region. This will make it nearly impossible that routes will be found that sufficiently avoid creating negative impacts for communities on the ground even with aircraft with the most enhanced capabilities, therefore airspace design should make provision for multiple routes that offer respite for affected communities.			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Yes	2

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Comments: Increased overflight of designated landscapes will disrupt the tranquillity from which many people benefit, such as National Parks and AONBs. Satellite-based routes can be much more precisely flown, but this can lead to a concentration of noise. KCC is aware that this has been well-received at airports in more rural locations where routes that affect very few people can be successfully flown. However, in the South East there is a conflict between population centres and the tranquillity of our rural and protected landscapes, such as National Parks and Areas of Outstanding Natural Beauty, where ambient noise levels are low and therefore aircraft noise is more noticeable than in urban areas. It is vital that a consensus is sought on these new/modernised routes, as well as Equalities Impact Assessments carried out when at the Operations Appraisal stage. Mitigation and compensation cannot counteract the inability of residents to sleep, the reduction in educational attainment of children, or the wider negative health impacts of noise.			
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	No	0
Comments: Airspace design should enable aircraft operators to optimise the capability of their fleets to improve environmental performance. However, future growth means that despite the benefits, an increase in future aviation movements caused by growth will lead to some communities still being negatively affected. Whilst we would support designing routes which remove the need for holding stacks, the location of Manston Airport allows for precision routes to be designed to follow the coast as far as is possible to avoid flying over settlements; and as much as possible limit over-flight of protected landscape areas. KCC would prioritise designing routes to follow the coast as far as possible as the highest priority noise mitigation option as this would also help to achieve the remaining design principles.			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Designs should minimise the impact on other airspace users in the local area.	The airspace and procedure design should aim to address the needs of all air traffic operating in the local area. New routes must take into account General Aviation (Sports & Recreation) operations at local airfields and avoid any unnecessary impact. Access to airspace should be ensured, especially for military fixed wing and rotary aircraft to meet defence operational and training requirements.	Yes	5
Comments: Kent and the South East is an area which is heavily overflown by aircraft from a number of airports, including Gatwick, Heathrow, and London City Airport. It is imperative that RiverOak consult with other airports and airspace users throughout the airspace change process to ensure deconfliction of routes and consider the prevalence of overflight on communities by flights from neighbouring airports. It is imperative the cumulative impact of aviation on local communities is considered.			
Designs should where possible, make provision for multiple routes that can be used to spread the noise burden more equitably.	Airspace design should make provision for multiple arrival and departure routes to spread the burden of over-flight more equitably between communities.	Yes	3
Comments: It has long been KCC's view that concentration of flight paths results in an untenable situation where certain settlements are intensively overflown compared to when overflight was shared through natural variation in choices made by pilots. Performance Based Navigation (PBN) allows precise routes to be chosen and flown and we believe that this technology could be better utilised to mimic the range of routes flown before its introduction. It is our policy that the use of multiple arrival and departure routes should be specified to provide predictable rotating respite and spread the burden of over-flight more equitably between communities.			

Table 2 – Additional Comments

If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
Comments: KCC has continually recommended the use of Nx contours (rather than the usually-used Leq contours) when showing the noise impact of overflight because they better represent the number of noise events an overflown community will experience at a given volume rather than an average noise level for the day or night across a whole season. Given the potentially profound changes to overflown and currently not overflown communities, it is imperative that these alternative metrics are used by airspace change promoters to ensure that communities are fully aware of the implications. KCC also recognises the additional impacts of night flights, especially in relation to the negative health implications of interrupted sleep. As a result, we would fully support a ban on night flights.
Are there other Design Principles not included in the list that you feel should be considered as candidates for the final shortlist? If so, please provide your comments.
Comments:

3 Potential Design Principles Not Taken Forward

3.1 Potential Design Principles

Error! Reference source not found. below articulates some potential Design Principles that have also been developed as a result of the feedback received from questionnaires and the focus group meetings. However, these have not been included in the list of Design Principles shown in

Table above for your review for the reasons indicated. If you wish to make any comments relating to this list, please do so in the space provided. Please use as much space as you require, the size of the response box will expand as you type your response.

Table 2 – Potential Design Principles Not Taken Forward

Potential Design Principle	Reasons for not Including
Routes should, where possible, be designed to be PANS-OPS compliant	The new routes will be designed, where possible, so that they comply with the internationally agreed criteria set down in the International Civil Aviation Organisation (ICAO) document PANS-OPS 8168 Volume 2 – *Construction of Visual and Instrument Flight Procedures*. Any deviation from the criteria set down in PANS-OPS would require Manston Airport to produce a robust safety case to justify why the designs are not compliant, before they can be approved by the CAA. Manston Airport considers that this is a safety-related principle and as such, will be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Routes should be chosen to minimise the flight distance over land and maximise distance over the sea to reduce the impact of noise and emissions	Consideration of the impact of noise and emissions has already been included as Design Principles. Manston Airport is required to produce a comprehensive list of route designs at Stage 2 of the CAP 1616 process and this list will include options that minimise the time spent overland by designing tracks that route over the sea as much as possible. As a result, this is considered to be a design option, rather than a Design Principle, and will be considered at the next step of the process.
Comments: We would very much welcome the consideration of options to minimise the time spent overland and design routes over the sea as much as possible.	
There should be no overflying of Ramsgate	Given the location of Manston Airport in relation to the town of Ramsgate, it would not be possible to design procedures to the east of the airport that completely avoids any overflight of the town. However, designs will seek to minimise the impact of noise and emissions over the town in line with the Design Principles above. Manston Airport is also planning to introduce operational procedures (a noise preferential runway system) to minimise the impact on Ramsgate.
Comments:	
Any new airspace should be the minimum volume necessary	At this stage, Manston Airport is not planning on introducing any new airspace other than an Aerodrome Traffic Zone (ATZ). Notwithstanding this, the provision of regulated airspace to protect traffic operating at Manston Airport is a potential design option, rather than a Design Principle. Any requirement to introduce additional Controlled Airspace (CAS) would be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Consider the Flexible Use of Airspace	Any revised airspace structure should be adaptable to minimise the impact on other airspace users. Manston Airport assesses that this could be considered as a potential design option relating to the type of CAS required to protect traffic operating at Manston Airport. As previously stated, this will be considered under the Design Principle SAFETY.
Comments:	
Any new airspace should facilitate fair access to all airspace users.	Any regulatory change or airspace amendment should continue to allow fair access to the airspace for all aviation users. Manston Airport is not currently planning on introducing any regulated airspace to protect traffic operating from the airport, but should this be required, consideration of fair access will be considered under the Design Principle that seeks to minimise the impact on other airspace users.
Comments:	

RSP | Manston Airport

Manston Airport Airspace Design and Procedures

Design Principle Stakeholder Review

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1. Airspace Design and Procedures

1.1 Introduction

RiverOak Strategic Partners Limited (RSP) would like to thank all stakeholders who have engaged with the Airspace Design and Procedures process so far and for the feedback provided by various representative bodies. This has helped us to derive a comprehensive list of potential Design Principles that reflect the statements made during focus group events and from questionnaires received.

This document has been prepared to share the list of Design Principles developed during recent engagement activities. We now need your help to provide further comments on the list to help us understand which Design Principles are most important to your organisations.

1.2 Background

RSP is proposing to redevelop and reopen Manston Airport as a successful hub for international air freight which also offers passenger travel, executive travel and aircraft engineering services. The airport would be comprehensively rebuilt and upgraded, including the provision of extensive cargo aircraft stands. The proposed development is subject to a Development Consent Order (DCO) application submitted by RSP to the government Planning Inspectorate (PINS) in July 2019.

In addition to the DCO, RSP will need to submit an application to the CAA to establish the procedures required to enable safe and efficient operations to and from the airport in accordance with the Civil Aviation Publication (CAP) 1616 – *Airspace Design: Guidance on the regulatory process for changing airspace design including community engagement requirements*.

The guidance in CAP 1616 sets out the framework for the 7 stages of the process and the activities that must be undertaken, including engagement and consultation requirements. We have now completed the initial phase of our engagement (part of Stage 1, CAP 1616) to establish our Design Principles for the introduction of Instrument Flight Procedures (IFP) at Manston Airport.

The process to gain approval for procedures is separate to the DCO process. We are only concerned with the Design Principles that will inform the design of the procedures as part of the CAP 1616 process.

[1] CAA Civil Aviation Publication (CAP) 1711

1.3 Development Methodology

All airspace changes within the UK must follow the regulatory process described in CAP 1616. The process was developed to ensure a high degree of transparency and adequate levels of two-way engagement with all relevant stakeholders, including local communities. The early stage of the process involves the development of Design Principles and the activities shown below have helped us to determine the initial list of potential Design Principles detailed later in Section 2:

- Design Principles Questionnaire – Aviation Stakeholders
- Design Principles Questionnaire – Non-Aviation Stakeholders
- Focus Groups

In early October, questionnaires were distributed to specialist aviation and technical groups, local authorities, parishes and politicians representing their organisations and communities, to seek their feedback on a number of topics related to airspace design. In addition, three focus groups were held in November where aviation and non-aviation stakeholders were offered the opportunity to discuss the proposed introduction of procedures.

The questionnaire responses have been analysed and along with the comments and discussion recorded during the focus groups, have helped us to develop a list of potential Design Principles which will serve as a qualitative framework against which the different design options that we produce, will be evaluated. It is therefore important that your views have been accurately captured.

1.4 Highest Priority Design Principles

Any changes to airspace arrangements must maintain high standards of safety. This is the main priority of the CAA in accordance with its statutory duties set out in Section 70(1) of the Transport Act 2000. Therefore, the overriding Design Principle against which the design options will be developed will be as follows:

- **SAFETY**

  Procedures must be designed to meet acceptable levels of flight safety

  The CAA's Airspace Modernisation Strategy (AMS) and the Masterplan that NERL has been commissioned (jointly by the Department for Transport and the CAA) to produce will affect any airspace and procedures that Manston Airport will be proposing to introduce. It is important that the impact of the AMS and the Masterplan work on this airspace change is included. Any design work will also take into account the change in vertical reference caused by the transition altitude, particularly with interactions with other airports. Therefore, subject to the overriding Design Principle of Safety, the highest priority Design Principle for this airspace change will be as follows:

- **HARMONISATION**

  Design options must accord with the CAA's published Airspace Modernisation Strategy (CAP 1711) and any current or future plans associated with it.

1.5 Stakeholder Review Requirements

Section 2 - Review of Design Principles

Please take a look at the potential Design Principles listed in Table 1 below. For each of the Design Principles listed, we would like you to state whether or not you agree that the statement constitutes a Design Principle. If you do not agree, please provide detail in the comment box provided.

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Please complete Table 2 to provide any additional comments that you feel have not been considered, or suggest any additional Design Principles you feel ought to be considered by RSP for Manston Airport.

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Design Principles are used to help us identify design options at the next stage in the CAP 1616 process. By prioritising Design Principles now, we will be able to develop design options that best meet the Principles identified as the highest priorities while also maximising other potential benefits.

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1.7 Next Steps

The CAP 1616 process relates to gaining approval for airspace and procedures only for Manston Airport.

Completion of Stage 1 – Design Principles

The responses you now provide will help us to refine the Design Principles before we submit them to the CAA for its review and approval. This is known as the CAA's DEFINE Gateway and marks the completion of Stage 1 of the CAP 1616 airspace change process for Manston Airport.

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Once the Design Principles are approved by the CAA, we will then progress to Stage 2 of the CAP 1616 process, where we will commence detailed airspace and procedure design work to develop design options.
Further engagement activities will take place during this stage to seek your views on the design options before they are submitted to the CAA for their appraisal. This is known as the CAA's DEVELOP and ASSESS Gateway currently planned for mid-2020.

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We will be consulting widely with residents, businesses, communities, the public and other stakeholders at Stage 3 (Consult) later in 2020 or early 2021 when detailed design options have been developed.

RSP will ensure any feedback given during Stages 1 and 2 will be collated and included in a consultation report alongside feedback at Stage 3. The consultation report will be part of RSP's airspace change and procedures proposal submitted to the CAA for approval.

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2. Review of Design Principles

2.1 Your Responses

Please complete

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Please complete the following:

Representative Organisation:
Kent Downs AONB Unit ([redacted])

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	Yes	3
Comments:			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	Yes	2
Comments:			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Yes	1
Comments: We would comment that rural areas are typically subject to much quieter background noise than existing urban areas, where the presence of overflying aircraft will be more apparent than in areas where the existing ambient noise levels are higher. This needs to be taken into account when balancing the identified competing areas that are sensitive to noise.			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	Yes	4
Comments:			
Designs should minimise the impact on other airspace users in the local area.	The airspace and procedure design should aim to address the needs of all air traffic operating in the local area. New routes must take into account General Aviation (Sports & Recreation) operations at local airfields and avoid any unnecessary impact. Access to airspace should be ensured, especially for military fixed wing and rotary aircraft to meet defence operational and training requirements.	Yes	0
Comments:			
Designs should where possible, make provision for multiple routes that can be used to spread the noise burden more equitably.	Airspace design should make provision for multiple arrival and departure routes to spread the burden of over-flight more equitably between communities.	Yes	0

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Comments:			

Table 2 – Additional Comments

If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
Comments:
Are there other Design Principles not included in the list that you feel should be considered as candidates for the final shortlist? If so, please provide your comments.
Comments:

3 Potential Design Principles Not Taken Forward

3.1 Potential Design Principles

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Table above for your review for the reasons indicated. If you wish to make any comments relating to this list, please do so in the space provided. Please use as much space as you require, the size of the response box will expand as you type your response.

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Comments:	
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Comments:	
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Comments:	

Potential Design Principle	Reasons for not Including
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Comments:	
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Comments:	

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Manston Airport Airspace Design and Procedures

Design Principle Stakeholder Review

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In addition to the DCO, RSP will need to submit an application to the CAA to establish the procedures required to enable safe and efficient operations to and from the airport in accordance with the Civil Aviation Publication (CAP) 1616 – *Airspace Design: Guidance on the regulatory process for changing airspace design including community engagement requirements*.

The guidance in CAP 1616 sets out the framework for the 7 stages of the process and the activities that must be undertaken, including engagement and consultation requirements. We have now completed the initial phase of our engagement (part of Stage 1, CAP 1616) to establish our Design Principles for the introduction of Instrument Flight Procedures (IFP) at Manston Airport.

The process to gain approval for procedures is separate to the DCO process. We are only concerned with the Design Principles that will inform the design of the procedures as part of the CAP 1616 process.

[1] CAA Civil Aviation Publication (CAP) 1711

1.3 Development Methodology

All airspace changes within the UK must follow the regulatory process described in CAP 1616. The process was developed to ensure a high degree of transparency and adequate levels of two-way engagement with all relevant stakeholders, including local communities. The early stage of the process involves the development of Design Principles and the activities shown below have helped us to determine the initial list of potential Design Principles detailed later in Section 2:

- Design Principles Questionnaire – Aviation Stakeholders
- Design Principles Questionnaire – Non-Aviation Stakeholders
- Focus Groups

In early October, questionnaires were distributed to specialist aviation and technical groups, local authorities, parishes and politicians representing their organisations and communities, to seek their feedback on a number of topics related to airspace design. In addition, three focus groups were held in November where aviation and non-aviation stakeholders were offered the opportunity to discuss the proposed introduction of procedures.

The questionnaire responses have been analysed and along with the comments and discussion recorded during the focus groups, have helped us to develop a list of potential Design Principles which will serve as a qualitative framework against which the different design options that we produce, will be evaluated. It is therefore important that your views have been accurately captured.

1.4 Highest Priority Design Principles

Any changes to airspace arrangements must maintain high standards of safety. This is the main priority of the CAA in accordance with its statutory duties set out in Section 70(1) of the Transport Act 2000. Therefore, the overriding Design Principle against which the design options will be developed will be as follows:

- **SAFETY**

  Procedures must be designed to meet acceptable levels of flight safety

  The CAA's Airspace Modernisation Strategy (AMS) and the Masterplan that NERL has been commissioned (jointly by the Department for Transport and the CAA) to produce will affect any airspace and procedures that Manston Airport will be proposing to introduce. It is important that the impact of the AMS and the Masterplan work on this airspace change is included. Any design work will also take into account the change in vertical reference caused by the transition altitude, particularly with interactions with other airports. Therefore, subject to the overriding Design Principle of Safety, the highest priority Design Principle for this airspace change will be as follows:

- **HARMONISATION**

  Design options must accord with the CAA's published Airspace Modernisation Strategy (CAP 1711) and any current or future plans associated with it.

1.5 Stakeholder Review Requirements

Section 2 - Review of Design Principles

Please take a look at the potential Design Principles listed in Table 1 below. For each of the Design Principles listed, we would like you to state whether or not you agree that the statement constitutes a Design Principle. If you do not agree, please provide detail in the comment box provided.

In addition, we would like you to rank the Design Principles according to your organisation's priorities. Please rank the Design Principles from 1 (Highest priority) to 6 (Lowest priority). If you feel any of the Design Principles are not applicable to your organisation, please mark it as '0'. Please add any amplifying comments you wish to include, also in the comments box.

Please note that this list, and your subsequent prioritisation, does not include the highest priority Design Principles (SAFETY and HARMONISATION) that have been described in paragraph 1.4 above.

Please complete Table 2 to provide any additional comments that you feel have not been considered, or suggest any additional Design Principles you feel ought to be considered by RSP for Manston Airport.

Section 3 – Potential Design Principles Not Taken Forward

Table 3 articulates some other potential Design Principles that have not been included in the list of Design Principles under consideration. Please make any comments relating to this list in the space provided in Table 3.

Design Principles are used to help us identify design options at the next stage in the CAP 1616 process. By prioritising Design Principles now, we will be able to develop design options that best meet the Principles identified as the highest priorities while also maximising other potential benefits.

1.6 How to Respond

Please save the file that includes your responses as a Microsoft word document and attach to an email to the following address: manstonairspace@communityrelations.co.uk

In addition to the word file, we will accept scanned, hand-written responses as long as they are legible, or email responses that clearly identify the Design Principle or question to which your response relates.

It is important that email responses clearly show your name, representative organisation and contact details; this will allow us to cross-refer your response to the emails we send out.

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Please respond by mid-day Friday 17th January 2020.

[1] A single coordinated UK airspace design and implementation masterplan for airspace changes up to 2040.

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1.7 Next Steps

The CAP 1616 process relates to gaining approval for airspace and procedures only for Manston Airport.

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The responses you now provide will help us to refine the Design Principles before we submit them to the CAA for its review and approval. This is known as the CAA's DEFINE Gateway and marks the completion of Stage 1 of the CAP 1616 airspace change process for Manston Airport.

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Engagement during Stage 1 and 2 is for representatives of specialist aviation and local authority bodies who represent their local organisations and communities.

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Documentation relating to the CAP 1616 process is published on the CAA's portal.

2. Review of Design Principles

2.1 Your Responses

Please complete

Table and **Error! Reference source not found.** below in line with the guidance provided in Section **Error! Reference source not found.**. Please use as much space as you require, the size of the response box will expand as you type your response.

Please complete the following:

Representative Organisation:
Kent Gliding Club, Challock (EGKE)

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	Y	2
Comments:			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	Y	3
Comments:			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Y	4
Comments: Especially Universities in Canterbury and of course the Cathedral.			
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	Y	5

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Comments:			
Designs should minimise the impact on other airspace users in the local area.	The airspace and procedure design should aim to address the needs of all air traffic operating in the local area. New routes must take into account General Aviation (Sports & Recreation) operations at local airfields and avoid any unnecessary impact. Access to airspace should be ensured, especially for military fixed wing and rotary aircraft to meet defence operational and training requirements.	Y	1
Comments: Although your proposal is currently for reintroduction of 2.5 NM ATZ at Manston, we would like to see this principle explicitly reference that the UK airspace default classification is G and that the alternative use Class E airspace be explored at any future date if use of class D or introduction of TMZs or RMZs are considered.			
Designs should where possible, make provision for multiple routes that can be used to spread the noise burden more equitably.	Airspace design should make provision for multiple arrival and departure routes to spread the burden of over-flight more equitably between communities.	Unsure	
Comments: We would like to see no departure/arrival routes taking traffic over EGKE below 5500 AMSL or within 5 NM radius.			

Table 2 – Additional Comments

If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
Comments:
Are there other Design Principles not included in the list that you feel should be considered as candidates for the final shortlist? If so, please provide your comments.
Comments:

3 Potential Design Principles Not Taken Forward

3.1 Potential Design Principles

Error! Reference source not found. below articulates some potential Design Principles that have also been developed as a result of the feedback received from questionnaires and the focus group meetings. However, these have not been included in the list of Design Principles shown in

Table above for your review for the reasons indicated. If you wish to make any comments relating to this list, please do so in the space provided. Please use as much space as you require, the size of the response box will expand as you type your response.

Table 2 – Potential Design Principles Not Taken Forward

Potential Design Principle	Reasons for not Including
Routes should, where possible, be designed to be PANS-OPS compliant	The new routes will be designed, where possible, so that they comply with the internationally agreed criteria set down in the International Civil Aviation Organisation (ICAO) document PANS-OPS 8168 Volume 2 – *Construction of Visual and Instrument Flight Procedures*. Any deviation from the criteria set down in PANS-OPS would require Manston Airport to produce a robust safety case to justify why the designs are not compliant, before they can be approved by the CAA. Manston Airport considers that this is a safety-related principle and as such, will be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Routes should be chosen to minimise the flight distance over land and maximise distance over the sea to reduce the impact of noise and emissions	Consideration of the impact of noise and emissions has already been included as Design Principles. Manston Airport is required to produce a comprehensive list of route designs at Stage 2 of the CAP 1616 process and this list will include options that minimise the time spent overland by designing tracks that route over the sea as much as possible. As a result, this is considered to be a design option, rather than a Design Principle, and will be considered at the next step of the process.
Comments:	
There should be no overflying of Ramsgate	Given the location of Manston Airport in relation to the town of Ramsgate, it would not be possible to design procedures to the east of the airport that completely avoids any overflight of the town. However, designs will seek to minimise the impact of noise and emissions over the town in line with the Design Principles above. Manston Airport is also planning to introduce operational procedures (a noise preferential runway system) to minimise the impact on Ramsgate.
Comments:	
Any new airspace should be the minimum volume necessary	At this stage, Manston Airport is not planning on introducing any new airspace other than an Aerodrome Traffic Zone (ATZ). Notwithstanding this, the provision of regulated airspace to protect traffic operating at Manston Airport is a potential design option, rather than a Design Principle. Any requirement to introduce additional Controlled Airspace (CAS) would be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Consider the Flexible Use of Airspace	Any revised airspace structure should be adaptable to minimise the impact on other airspace users. Manston Airport assesses that this could be considered as a potential design option relating to the type of CAS required to protect traffic operating at Manston Airport. As previously stated, this will be considered under the Design Principle SAFETY.
Comments:	
Any new airspace should facilitate fair access to all airspace users.	Any regulatory change or airspace amendment should continue to allow fair access to the airspace for all aviation users. Manston Airport is not currently planning on introducing any regulated airspace to protect traffic operating from the airport, but should this be required, consideration of fair access will be considered under the Design Principle that seeks to minimise the impact on other airspace users.
Comments:	

RSP | Manston Airport

Manston Airport Airspace Design and Procedures

Design Principle Stakeholder Review

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1. Airspace Design and Procedures

1.1 Introduction

RiverOak Strategic Partners Limited (RSP) would like to thank all stakeholders who have engaged with the Airspace Design and Procedures process so far and for the feedback provided by various representative bodies. This has helped us to derive a comprehensive list of potential Design Principles that reflect the statements made during focus group events and from questionnaires received.

This document has been prepared to share the list of Design Principles developed during recent engagement activities. We now need your help to provide further comments on the list to help us understand which Design Principles are most important to your organisations.

1.2 Background

RSP is proposing to redevelop and reopen Manston Airport as a successful hub for international air freight which also offers passenger travel, executive travel and aircraft engineering services. The airport would be comprehensively rebuilt and upgraded, including the provision of extensive cargo aircraft stands. The proposed development is subject to a Development Consent Order (DCO) application submitted by RSP to the government Planning Inspectorate (PINS) in July 2019.

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2. Review of Design Principles

2.1 Your Responses

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Please complete the following:

Representative Organisation:
Minster Parish Council

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	Yes	1
Comments:			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	Yes	2
Comments:			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Yes	2
Comments:			
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	Yes	3

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
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Comments:			
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If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
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RSP | Manston Airport

Manston Airport Airspace Design and Procedures

Design Principle Stakeholder Review

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- **SAFETY**
  Procedures must be designed to meet acceptable levels of flight safety

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- **HARMONISATION**
  Design options must accord with the CAA's published Airspace Modernisation Strategy (CAP 1711) and any current or future plans associated with it.

1.5 Stakeholder Review Requirements

Section 2 - Review of Design Principles

Please take a look at the potential Design Principles listed in Table 1 below. For each of the Design Principles listed, we would like you to state whether or not you agree that the statement constitutes a Design Principle. If you do not agree, please provide detail in the comment box provided.

In addition, we would like you to rank the Design Principles according to your organisation's priorities. Please rank the Design Principles from 1 (Highest priority) to 6 (Lowest priority). If you feel any of the Design Principles are not applicable to your organisation, please mark it as '0'. Please add any amplifying comments you wish to include, also in the comments box.

Please note that this list, and your subsequent prioritisation, does not include the highest priority Design Principles (SAFETY and HARMONISATION) that have been described in paragraph 1.4 above.

Please complete Table 2 to provide any additional comments that you feel have not been considered, or suggest any additional Design Principles you feel ought to be considered by RSP for Manston Airport.

Section 3 – Potential Design Principles Not Taken Forward

Table 3 articulates some other potential Design Principles that have not been included in the list of Design Principles under consideration. Please make any comments relating to this list in the space provided in Table 3.

Design Principles are used to help us identify design options at the next stage in the CAP 1616 process. By prioritising Design Principles now, we will be able to develop design options that best meet the Principles identified as the highest priorities while also maximising other potential benefits.

1.6 How to Respond

Please save the file that includes your responses as a Microsoft word document and attach to an email to the following address: manstonairspace@communityrelations.co.uk

In addition to the word file, we will accept scanned, hand-written responses as long as they are legible, or email responses that clearly identify the Design Principle or question to which your response relates.

It is important that email responses clearly show your name, representative organisation and contact details; this will allow us to cross-refer your response to the emails we send out.

We will also accept legible postal responses to Free Post 1616 by the deadline date below:

Please respond by mid-day Friday 17th January 2020.

[1] A single coordinated UK airspace design and implementation masterplan for airspace changes up to 2040.

[2] NERL – NATS En-Route Ltd - the sole provider of civilian en-route air traffic control over the UK

1.7 Next Steps

The CAP 1616 process relates to gaining approval for airspace and procedures only for Manston Airport.

Completion of Stage 1 – Design Principles

The responses you now provide will help us to refine the Design Principles before we submit them to the CAA for its review and approval. This is known as the CAA's DEFINE Gateway and marks the completion of Stage 1 of the CAP 1616 airspace change process for Manston Airport.

Stage 2 – Design Options

Once the Design Principles are approved by the CAA, we will then progress to Stage 2 of the CAP 1616 process, where we will commence detailed airspace and procedure design work to develop design options.
Further engagement activities will take place during this stage to seek your views on the design options before they are submitted to the CAA for their appraisal. This is known as the CAA's DEVELOP and ASSESS Gateway currently planned for mid-2020.

Engagement during Stage 1 and 2 is for representatives of specialist aviation and local authority bodies who represent their local organisations and communities.

Stage 3 – Consultation on Design Options

We will be consulting widely with residents, businesses, communities, the public and other stakeholders at Stage 3 (Consult) later in 2020 or early 2021 when detailed design options have been developed.

RSP will ensure any feedback given during Stages 1 and 2 will be collated and included in a consultation report alongside feedback at Stage 3. The consultation report will be part of RSP's airspace change and procedures proposal submitted to the CAA for approval.

Documentation relating to the CAP 1616 process is published on the CAA's portal.

2. Review of Design Principles

2.1 Your Responses

Please complete

Table and **Error! Reference source not found.** below in line with the guidance provided in Section **Error! Reference source not found.**.
Please use as much space as you require, the size of the response box will expand as you type your response.

Please complete the following:

Representative Organisation:
NATS En-Route Ltd (NERL)

Table 1 – Design Principles Review and Prioritisation

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed to minimise the impact of noise below 7,000 ft.	One of the Government's key environmental objectives is to limit and, where possible, reduce the number of people in the UK significantly affected by adverse impacts from aircraft noise. Current government policy states that below 7,000 ft., the noise impact of aviation on those on the ground takes greater precedence than the management of aircraft emissions.	Y	
Comments: **NERL understand that this is an important issue for local communities and has no other comment to make on the content or priority of the principle**			

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Procedures should be designed that minimise aircraft emissions to reduce air pollution.	Improving environmental performance by reducing emissions is an outcome that the CAA's AMS is expected to deliver. More direct routes and the use of continuous climbs and descents are some of the measures that can be employed to reduce fuel burn, therefore reducing emissions per flight.	Y	
Comments: **NERL recognise the commitment to the aims of the AMS and look forward to working with RSP in developing the airspace and connecting with the wider network**			
Where practicable, designs should seek to minimise the impact of noise on particularly sensitive areas.	The new routes should be designed to protect, as much as practicable, areas that are sensitive to noise. These may include sites of care or education, tranquil or rural areas that are used by the public for recreational purposes and cultural or historical assets. Avoiding overflight of all of these locations in every case would be impractical but we will endeavour to achieve this where possible.	Y	
Comments: **NERL believe that the noise considerations are covered in other DP's.**			
Procedures should be designed, where possible, to minimise the number of track miles flown.	In order to minimise emissions and to optimise operational efficiencies, designs should where possible, minimise the number of track miles flown.	N	

Design Principle	Rationale	Do you agree this is a Design Principle? (Yes or No)	How would you rank this Design Principle as a priority? (1 = Highest to 6 = Lowest or 0)
Comments: **The final design will be the best fit of the competing requirements from all stakeholders. As such NERL do not believe this should be a design principle.**			
Designs should minimise the impact on other airspace users in the local area.	The airspace and procedure design should aim to address the needs of all air traffic operating in the local area. New routes must take into account General Aviation (Sports & Recreation) operations at local airfields and avoid any unnecessary impact. Access to airspace should be ensured, especially for military fixed wing and rotary aircraft to meet defence operational and training requirements.	Y	
Comments: **NERL agree with the comment in the rationale regarding the need to avoid unnecessary impact. All impacts to stakeholders will need to be considered and managed throughout the design process.**			
Designs should where possible, make provision for multiple routes that can be used to spread the noise burden more equitably.	Airspace design should make provision for multiple arrival and departure routes to spread the burden of over-flight more equitably between communities.	N	
Comments: **NERL believe that the noise considerations are covered in other DP's.**			

Table 2 – Additional Comments

If there are any other areas of concern that you feel have not been considered, please provide additional comments below.
Comments:
Are there other Design Principles not included in the list that you feel should be considered as candidates for the final shortlist? If so, please provide your comments.
Comments: NERL would like to see a design principle that covers the use of performance based navigation and regulatory adherence through the process.

3 Potential Design Principles Not Taken Forward

3.1 Potential Design Principles

Error! Reference source not found. below articulates some potential Design Principles that have also been developed as a result of the feedback received from questionnaires and the focus group meetings. However, these have not been included in the list of Design Principles shown in

Table above for your review for the reasons indicated. If you wish to make any comments relating to this list, please do so in the space provided. Please use as much space as you require, the size of the response box will expand as you type your response.

Table 2 – Potential Design Principles Not Taken Forward

Potential Design Principle	Reasons for not Including
Routes should, where possible, be designed to be PANS-OPS compliant	The new routes will be designed, where possible, so that they comply with the internationally agreed criteria set down in the International Civil Aviation Organisation (ICAO) document PANS-OPS 8168 Volume 2 – *Construction of Visual and Instrument Flight Procedures*. Any deviation from the criteria set down in PANS-OPS would require Manston Airport to produce a robust safety case to justify why the designs are not compliant, before they can be approved by the CAA. Manston Airport considers that this is a safety-related principle and as such, will be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Routes should be chosen to minimise the flight distance over land and maximise distance over the sea to reduce the impact of noise and emissions	Consideration of the impact of noise and emissions has already been included as Design Principles. Manston Airport is required to produce a comprehensive list of route designs at Stage 2 of the CAP 1616 process and this list will include options that minimise the time spent overland by designing tracks that route over the sea as much as possible. As a result, this is considered to be a design option, rather than a Design Principle, and will be considered at the next step of the process.
Comments:	
There should be no overflying of Ramsgate	Given the location of Manston Airport in relation to the town of Ramsgate, it would not be possible to design procedures to the east of the airport that completely avoids any overflight of the town. However, designs will seek to minimise the impact of noise and emissions over the town in line with the Design Principles above. Manston Airport is also planning to introduce operational procedures (a noise preferential runway system) to minimise the impact on Ramsgate.
Comments:	
Any new airspace should be the minimum volume necessary	At this stage, Manston Airport is not planning on introducing any new airspace other than an Aerodrome Traffic Zone (ATZ). Notwithstanding this, the provision of regulated airspace to protect traffic operating at Manston Airport is a potential design option, rather than a Design Principle. Any requirement to introduce additional Controlled Airspace (CAS) would be considered under the Design Principle SAFETY.
Comments:	

Potential Design Principle	Reasons for not Including
Consider the Flexible Use of Airspace	Any revised airspace structure should be adaptable to minimise the impact on other airspace users. Manston Airport assesses that this could be considered as a potential design option relating to the type of CAS required to protect traffic operating at Manston Airport. As previously stated, this will be considered under the Design Principle SAFETY.
Comments:	
Any new airspace should facilitate fair access to all airspace users.	Any regulatory change or airspace amendment should continue to allow fair access to the airspace for all aviation users. Manston Airport is not currently planning on introducing any regulated airspace to protect traffic operating from the airport, but should this be required, consideration of fair access will be considered under the Design Principle that seeks to minimise the impact on other airspace users.
Comments: NERL believe that this should remain as a design principle in order to allow for the use of CAS if necessary.	

Organisation: NATS Part 2

RiverOak Strategic Partners Limited
[redacted]

NATS
[redacted]

17th January 2019

Dear Sir/Madam,

Manston Airport Airspace Design Principles Engagement

Thank you for allowing NATS the opportunity to respond to your Design Principles Review in support of your airspace change proposal. NATS look forward to working together with RiverOak Strategic Partners & Manston Airport throughout the CAP 1616 process, and the wider programme of airspace modernisation, in order to make the change suitable for all stakeholders. We have enjoyed a positive, collaborative start to the process and look forward to continuing in that vein.

Our response to the review is attached, and we understand that the responses from all stakeholders will be used to derive the final set of design principles.

We look forward to continuing to work together, along with the other stakeholders in your process, in the wider programme of work that this airspace change is part of. Should you have any comments or questions then please do not hesitate in contacting me.

Kind regards

[redacted]