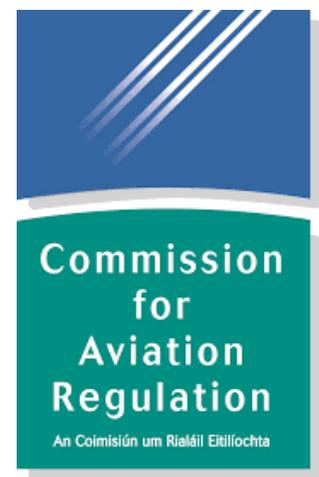




Financeability of the Third Interim Review of the 2019 Determination

Commission for Aviation Regulation

19th of July 2022



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1 Executive Summary

Centrus Advisors Limited (“Centrus”) have been engaged by the Commission for Aviation Regulation (“CAR”) to advise on the financeability of the proposed regulatory settlement in the “Third Interim Review of the 2019 Determination on Airport Charges at Dublin Airport for the period 2023 to 2026.”

CAR is tasked with setting a maximum level of revenue that Dublin Airport may collect in airport charges levied on users via a regulatory price determination. CAR utilise a building block approach which involves deriving the price cap from a series of inputs and results in a required forecasted revenue amount, which is then divided by the forecasted number of future passengers, and results in this per passenger “price cap”.

Centrus have been engaged to assess the financeability of the outcome from the building block approach. In our financeability assessment we considered the regulated entity only (referred to as “Dublin Airport” throughout this report), rather the daa plc which is the group entity that has a credit rating. The steps undertaken included the following:

- We have obtained information regarding the price determination process including CAR’s pricing set model and outputs under various scenarios;
- Reviewed the regulated entity accounts for Dublin Airport and financial statements for the related entities within the group (together “daa plc”), alongside Dublin Airport’s forecasts;
- Assessed the ratings methodologies and credit rating reports from Standard & Poor’s (“S&P”), and other ratings agencies;
- Considered the impact of events which have taken place since the 2019 price determination and their subsequent effects on same, such as the covid-19 pandemic, the global energy crisis, and other major macro events;
- Requested CAR to test their pricing model to assess the likely impact of various adverse outcomes on the forecasted financials and key financial ratios; &
- Examined market data regarding new debt issuance and pricing levels for relevant traded bonds along with consideration of funding conditions in other debt products e.g. private placements.

Our conclusions can be summarised as follows:

- Standard and Poor’s do not provide a credit rating for the regulated entity. But, by considering the components of its ratings methodology for Business Risk Profile (“BRP”), it is reasonable that the regulated entity’s BRP may be assessed as “Strong”. Furthermore, analysis of the forecasted profitability based on the financial ratios produced by CAR’s pricing model may illustrate that profitability would not decline to a level that would likely lead to a downgrade of this assessment, as long as the regulatory regime itself remains stable.
- Administering the cash flow / leverage analysis that S&P apply in determining their assessment of Financial Risk Profile (“FRP”), we conclude that an indicative

assessment of Dublin Airport's FRP would not likely deviate from the current published assessment of "Intermediate" for daa plc.

- Based on our assessment that Dublin Airport's indicative BRP and FRP may likely be interpreted as in line with that of daa plc's published assessments, it is reasonable to conclude that funders may also assess the Anchor rating of the regulated entity as consistent with that of daa plc i.e. 'bbb+'.
- It is also likely many of Dublin Airport's funders would also give consideration to the government support uplift which could place its overall credit rating in the 'A-' category. These are rating levels which could be considered to support continued access to debt markets over the pricing period.
- In order to understand debt funders' likely requirements for the appropriate credit rating and financial thresholds for the regulated entity over the price determination period, we also undertook a level of market analysis. Having considered same, we conclude that based on current market conditions, a minimum of a BBB+ credit rating may likely be required to provide reasonable level of comfort in accessing debt markets. Similarly, given the aviation industry's recovery path, we would anticipate financial ratios consistent with FFO / Net Debt in the mid-teens and Net Debt / EBITDA of less than 6.0x is likely to be sufficient to access debt markets on the assumptions that debt funders' requirements for ratios return to pre-pandemic levels.
- In addition, CAR is setting a price cap for a 4-year period, and we note that market conditions remain subject to change. Therefore, there is a risk that funder appetite at these levels may not persist over the full pricing period during which Dublin Airport will need to raise new debt.
- Similar to our advice in our 2019 report, we believe in order to increase confidence that Dublin Airport should be able to raise the full requirement for c.€1bn of new debt to fund a significant programme of capital expenditure forecast over the pricing period, CAR may consider enabling a path to Dublin Airport achieving an FFO / Net Debt above 15%, and a Net Debt / EBITDA of less than 5.0x
- In the later years of the forecast period, this would take account of both company specific adverse scenarios and in a potentially deteriorated debt market, while also moving it closer to the financial ratios of many of the airport operators with government ownership in its peer group.
- Any proposed move from a target FFO / Net Debt from 13% to above 15% and to a Net Debt / EBITDA target move from less than 6.0x to below 5.0x, needs to be carefully balanced to ensure users are not being asked to pay more for financial viability than is required. CAR has a number of levers to enable this path, for example a further increase in accelerated depreciation, consideration of the timing or size of capex, etc.
- Although the price determination will be for the period 2023 to 2026, we note that CAR have a demonstrated history of proactively reacting in times of crisis, and if we were to assume this to be the case in the future, and CAR reacted in a similar manner to the way they have before, financeability could potentially be reassessed.

- Similarly, all else equal, CAR could give consideration to re-evaluating financeability midway through the period to examine if the financial viability adjustment allowed at the start is still required towards the end of the period. If it is not required it could be then removed from the price for the final years. This would provide confidence to debt funders at the outset of the price determination period that the forecast capital expenditure programme will remain financeable if Dublin Airport performs in line with the base case scenario but could also help ensure that passengers do not overpay if the out-turn performance due to factors beyond Dublin Airport's control does not warrant the allowances made. It is important that funders have certainty and hence the removal (to work from a funder perspective) would need to be structured in such a way as to only be removed if ratios were being met and forecast to be met over the period. For example, this could be implemented as a form of reverse trigger which is used following an assessment for delays in capital expenditure which in turn reduces the overall debt requirement over the remaining period.

The downside scenarios and required ratios are estimates based on the various building block inputs for the draft determination which we understand remain subject to change before the final determination. Furthermore, they do take account of other levers within Dublin Airport's control that could be used over the period to enhance financeability.

2 Introduction

Centrus Advisors Limited (“Centrus”) have been engaged by the Commission for Aviation Regulation to assist it in undertaking a financeability assessment of the regulatory settlement for the “Third Interim Review of the 2019 Determination on Airport Charges at Dublin Airport for the period 2023 to 2026 (inclusive)”, in accordance with a consultancy engagement dated 31st of May 2021. As part of this engagement, Centrus have assisted in assessing the financeability of Dublin Airport’s proposed c.€2bn expansion plan based on CAR’s regulatory pricing proposal.

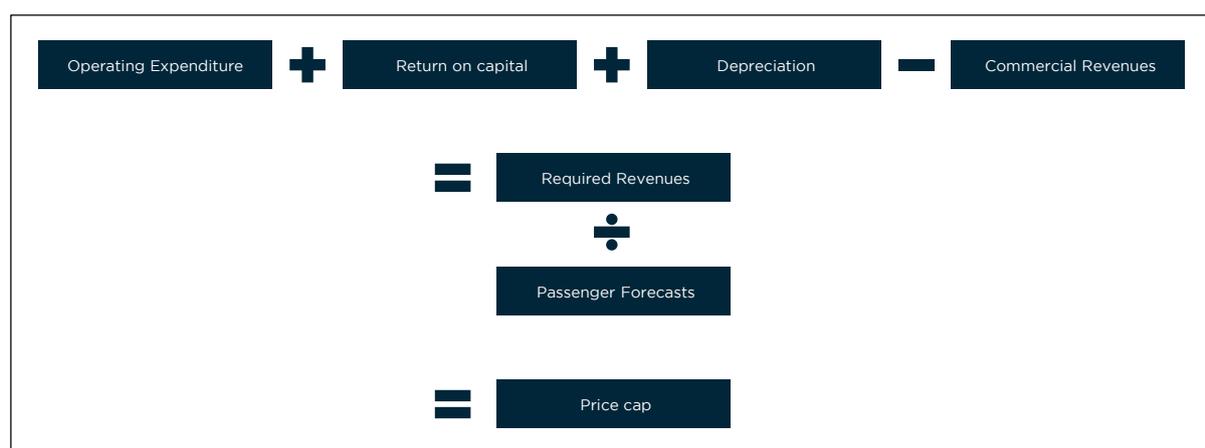
2.1 Background

The Commission for Aviation Regulation (“CAR” / “the Commission”) regulates certain aspects of aviation and travel trade sectors in Ireland. One part of the Commission’s role is the monitoring and setting of the maximum level of revenue that daa can collect from airport charges at Dublin Airport. The commission sets this maximum levy or per passenger “price cap” via a regulatory price determination.

The price determination involves deriving the price cap from a series of inputs known as the regulatory building blocks. This method entails forecasting future operating expenditure, return on capital (cost of capital times the Regulated Asset Base “RAB”), and depreciation. Forecasted commercial revenues, are then calculated, and deducted from the sum of the above inputs, resulting in a required forecasted revenue amount, under the single till methodology.¹

The required revenue is then divided by a forecast of the number of future passengers (which itself is a building block), to derive the airport charge to be levied on passengers as summarised in the below Figure 1.1 below.

Figure 2.1: Summary of the building blocks approach



Source: Commission Paper 1/2022

¹ Single till methodology includes Commercial Revenues in the derivation of the price cap i.e. revenues from retail, car parking and food & beverage at the airport, as well as costs associated with providing these non-aeronautical services.

Financeability assessments are a useful tool which regulators can use to determine whether an efficient company's revenues, profits and cash flows, forecasted using the outputs from the regulatory decision process, would enable that company to access financial markets at reasonable cost. Therefore, when all individual components of their determination are accounted for, CAR uses the financeability assessment as a final check to test whether the regulatory settlement enables the regulated entity to raise debt, and at a reasonable cost.

In the previous determination, set in 2019, for the period 2020-2024, CAR decided to protect against reasonable downside risks by aiming for a Net Debt / EBITDA ratio of less than 5x in all years. This also had the benefit of an FFO / Net Debt ratio remaining in the mid-teens in all years. These ratios were consistent with an S&P rating of at least BBB+ when combined with a "Strong" Business Risk Profile assessment. In order to achieve these metrics, CAR increased the base price cap through adjustments to depreciation.

However, due to the global pandemic, CAR made the decision to carry out two Interim-Reviews of the 2019 Determination. The scope of each review did not include reopening all the underlying assumptions and forecasts to derive new base price caps:

- The first of which took place in 2020, and it sought to address the impact of the pandemic on the regulatory settlements for 2020 and 2021 in a "targeted and proportionate manner".² This review resulted in an effective price cap of €9.94 per passenger for 2020 and €7.50 per passenger for 2021 (see section 2.8 of the CAR issues paper 2022) through removing the following:
 - i. The triggers and adjustments relating to the price caps for 2020 and 2021;
 - ii. Dublin Airport requirement to rebate airport users in respect of overcollection of aeronautical revenues per passenger compared to the original ex-ante price cap in 2020; &
 - iii. All adjustments such as CapEx delivery reprofiling triggers, service quality rebates, and OpEx passthrough mechanism for 2021.

- The second of which took place in 2021 and set to address the impact of the regulatory settlements for 2022.³ This review resulted in a nominal price cap of €8.11 compared to €6.52 had no review occurred (see section 2.10 of CAR 2022 issues paper 2022) through:
 - i. Removing most of the adjustments; &

² CAR, "[Commission Paper 12/2020](#)", 2020

³ CAR, "[Commission Paper 3/2021](#)", 2021

- ii. Reinstating a reduced form version of the quality-of-service adjustment and an inflationary adjustment.

During the second review, CAR also committed to carrying out a full review during 2022, which would reassess the base price caps such that efficient costs and required aeronautical revenues would be realigned from 2023. This has led to the “Third Interim Review of the 2019 Determination on Airport Charges at Dublin Airport for the period 2023 to 2026”, which extends the previous price determination by two years. Subsequently, we have been engaged by the Commission to provide advice on the financeability of the regulatory settlement.

2.2 Overview of approach

The aim of this report is to assess the financeability of the regulatory settlement for the period 2023-2026 (inclusive). We have carried out our review in the following steps:

- ✓ We have obtained information regarding the price determination process including CAR’s building block financial model for the Third Interim Review of the 2019 Determination on Airport Charges at Dublin Airport for the period 2023 to 2026 and outputs under various scenarios;
- ✓ Reviewed the regulated entity’s accounts for Dublin Airport and financial statements for the related entities within the group (together “daa plc”), alongside Dublin Airport’s forecasts;
- ✓ Assessed the ratings methodologies and credit rating reports from S&P and other ratings agencies;
- ✓ Considered the impact of events which have taken place since the 2019 price determination and their subsequent effects on the same, such as the covid-19 pandemic, the global energy crisis, and other major macro events;
- ✓ Requested CAR to test their pricing model to assess the likely impact of various adverse outcomes on the forecast financials and key financial ratios; &
- ✓ Examined market data regarding new debt issuance and pricing levels for relevant traded bonds along with consideration of funding conditions in other debt products e.g. private placements.

2.3 Limitations and Assumptions

In producing this report, Centrus have undertaken a review of the relevant documents, either publicly available or provided to us by CAR and Dublin Airport, describing past, recent, and future developments in relation to our engagement. In producing this report, we are assuming that all information received from CAR and Dublin Airport is reliable, accurate and complete.

Similarly, in assessing the financeability of the regulatory settlement, Centrus utilised the forecasted cashflows provided to us by the Commission. We importantly note that financeability can be affected by the timing of cashflows, including capital inflows vs capital outflows. However, we have assessed the output of the regulatory settlement with the

specific capital spend profile provided by the Commission. We note that any changes in this capital spend profile has the potential to materially affect the ratios and thus the resulting financeability assessment. Please see below for additional information on assumptions:

- The profile of new debt has been set out in the CAR base case model and is based on the funding requirement for the total allowed capital expenditure amount. We note that the timing of funding of capital expenditure is unlikely to follow the forecast set out as we expect that Dublin Airport, through daa plc, will access a range of debt funding markets at the appropriate timings to optimise its funding sources, maturities, and debt price.
- We note that the cost of debt will be a key input in the consideration of the ability to raise sufficient levels of debt in a cost-effective manner but have based our analysis on CAR's draft determination for WACC provided within its pricing model and thus are not providing a separate assessment of same.
- We have not assessed the flexibility of the capital investment plan, and we have taken the forecasted capital spend directly from CAR's financial model.

The credit risk assessment and market analysis is based on the following:

- i. Our experience of fundraising in public sector and infrastructure debt markets;
- ii. Our financial analysis applied to the information made available to us from CAR and Dublin Airport;
- iii. Conversations with stakeholders including the Commission, Dublin Airport, and S&P ratings agency;
- iv. Our review of inputs from market data sources such as Bloomberg, Markit, Reuters, Dealogic, etc. available through subscription services and public information sources.

We have not, nor would it have been appropriate for us to have, undertaken any market soundings in relation to the future funding of either of daa plc or Dublin Airport or discussed current or potential future transactions with any debt investors. Our conclusions have been informed by conversations with Dublin Airport in relation to their interaction with debt funders in the past.

3 Financeability – Key Considerations

Financeability is regarded as an important check within regulatory determinations through which the regulator assesses whether an efficient company’s revenues, profits and cash flows, forecasted using the outputs from the regulatory decision process, would enable that company to access the financial markets at reasonable cost.

3.1 The hypothetical regulated entity

The Commission has agreed that its primary basis for assessing financeability will be a notional approach that focuses on the regulated entity (“Dublin Airport”) i.e., by consideration of Dublin Airport as a standalone entity, separate from the remainder of the daa plc group. This was also the approach CAR had taken in the 2014, and in the 2019 Determination, and is continued in the 2022 interim review.

The regulated entity relating to Dublin Airport is made up of DAA plc (the Company excluding the activities of Cork Airport, Dublin Airport Central and other non-regulated business activities) and four of its subsidiaries as follows:

- DAA Finance plc;
- ASC Airport Services Consolidated Limited;
- DAA Airport Services Limited; &
- DAA Operations Limited.

We agree with the assessment that this is hypothetical, given the regulated entity:

- (i) Does not exist as a separate legal company in its own right;
- (ii) Does not have a credit rating as a separate entity; &
- (iii) Does not raise debt solely for its own use e.g. through a ring-fenced structure.

While our report will provide conclusions on the financeability of the hypothetical regulated entity Dublin Airport, we have supplemented our analysis by also giving consideration to some relevant factors that impact on the financeability of Dublin Airport as part of the daa plc group. The latter is the entity with a credit rating that future funders will be debt financing. We consider this will assist the Commission in understanding how funders would likely assess the regulated entity on a standalone basis, as well as some of the benefits and / or trade-offs from a debt provider’s perspective in providing funding to it within the wider group rather than as a separate, ringfenced entity.

3.2 Capital Structure & Ownership Factors

In line with the Commission’s approach to financeability, we have accounted for the government ownership structure of daa plc. We assumed a simple notional financial structure with gearing driven by CAR’s assumption that given the ownership structure of

Dublin Airport, it is not likely to raise additional equity. As a result, it is reliant on increasing its debt financing alongside use of its own cashflow generation to fund the upcoming capital investment over the price determination period.

It should also be noted that in their base case building block assessment CAR assumed that a 30% dividend pay-out rate would be reinstated in 2024 irrespective of Dublin Airport's funding requirement.

We also note that regulators, rating agencies and long-term funders will consider shareholder decisions that inform a company policy in relation to treasury management, target credit ratings, debt strategy and covenant packages, securitisation structures for borrowing, dividend policy, etc. These can usually be regarded as levers available to the borrower that could determine and /or be used to enhance the credit profile.

We assume that it is at the discretion of the shareholder or company to vary any of the building block factors e.g., operating cost reductions, in order to deliver efficiencies as forecast in the regulatory model and we will not address same within this financeability assessment. The decision on treatment of equity returns and reinvestment of equity in assessing financial ratios is not within the scope of this report.

3.3 Financeability Perspective

There is no defined universal methodology to assessing financeability, and the way in which it is assessed notably differs across regulators. In the process of developing a methodology to assess financeability of the regulatory settlement, Centrus appraised how other regulators tested financeability. We noted, many regulators such as the CRU, the Utility Regulatory in Northern Ireland, Ofgem and Ofwat focus on a defined set of financial ratios to ensure consistency with rating agencies' criteria for threshold ratings at investment grade level over the price determination period under review. The rationale for using the credit rating agency approach and metrics to aid assessment of debt financeability is that this reflects to a large degree how debt investors assess potential investments and whether debt will be repaid in full versus the possibility of a default or non-payment.

Considering the methodologies used by other regulators, the hypothetical regulated entity, and its capital structure, including an assumption that it will not raise additional equity, Centrus designed a financeability assessment around two separate lenses:

- A hypothetical shadow credit rating which is assessed by applying the methodology used by a rating agency, using a mixture of both quantitative and qualitative factors; &
- A potential debt funder to the Dublin Airport taking into account the key requirement of debt funders with respect to debt capacity and ability to pay in various scenarios.

Our approach is consistent with the approach we took in our assessment in 2019. We note that although this report may inform the regulatory decision process with respect to

financeability it does not guarantee financeability. There are many factors which may affect the financeability of the regulated entity outside of the regulatory settlement. Further details of these approaches are outlined in Section 4 – Financeability Testing.

3.4 Key Considerations

As part of Financeability assessment, Centrus have assisted the Commission in determining both a target credit rating and debt investor credit metrics. In the process of informing this decision, Centrus have taken the following Key Considerations into account, as well as other reasonable considerations.

3.4.1 Reasonable Cost

CAR have stated their intention is to enable the regulated entity to fund allowed CapEx at a reasonable cost.⁴ An entity's cost of debt may largely be linked to its credit rating, and entities who possess stronger credit ratings, are likely to be able to access debt at a lower cost. It may also be assumed that the weaker a company's credit rating, the higher their cost of debt. There is a large differential in cost of debt or the credit risk premium, which is charged, when a rating falls from the investment grade group of ratings to sub-investment grade or to speculative ratings (Section 5 – Funding Market Context). This may be increasingly true in times of crisis, where there appears to be an increase in divergence of spreads, as highlighted during covid-19 pandemic, and within the current geopolitical climate. It is therefore common for regulators to target an investment grade credit rating in order to facilitate the efficient financing of projects.

3.4.2 Pandemic impact on previous price determination

During Q1 of 2020, the covid-19 virus started to spread throughout the globe. This was prior to the conclusion of the appeals process for the 2019 price determination. Dublin Airport experienced the largest passenger decline in its history over the period 2020 and 2021 with passenger numbers equating to 22% and 24% relative to the Commission's forecasts for each period, respectively.⁵

The impact of the COVID-19 pandemic on Dublin Airport's financial position has been significant. In 2020, in nominal terms, the regulated entity reported an EBITDA of -€2.1m⁶ and in 2021 it reported an EBITDA partially recovering to +€25.4m.⁷

Table 2.1 highlights the growth in net debt during this period. We note this Figure is similar to the levels forecasted during the 2019 Determination, at approximately €966m for 2022f (€1.1bn forecasted for 2022 during 2019 determination).

⁴ CAR, "[Issues Paper](#)", 2022

⁵ CAR, "[Issues Paper](#)", 2022

⁶ CAR, "[Regulated Accounts 2020](#)", (Loss excluding exceptional item).

⁷ Regulated Accounts 2021

Table 3.1: Overview of Dublin Airport's Net Debt and FFO / Net Debt

	2019	2020	2021	2022f
Closing Net Debt	€575m	€869m	€919m	€966m
FFO / Net Debt	43%	-11%	-2%	13%

f - forecasted nominal rates

Source: CAR Model

We have considered the impact of the pandemic on Dublin Airport's target credit rating. We note that due to the mechanism of targeting particular credit ratings, the pandemic's effect on net debt will be implicitly built into any revised regulatory settlements. Therefore, the future regulatory settlement will take into account the current post pandemic metrics.

3.4.3 Funder Appetite

Another area which informed our analysis, was total allowed CapEx, and its associated debt requirement. Although we did not speak to the market directly on behalf of Dublin Airport, we did analyse general market conditions based on publicly available data (Section 5 - Funding Market Context). We identified both private and publicly operated airports, who could be classified as peers to Dublin Airport (Appendix 2), who were able to issue debt throughout Covid and into 2022. The results of our research showed that the majority of entities which we deemed as peers to Dublin Airport and who successfully issued bonds during the pandemic exhibited investment grade ratings (Section 5 - Funding Market Context). Within this group, we have also seen a general trend for the BBB categorised issuance over recent years and more specifically based on transactions amongst the group of public government owned airports, we have seen that in current market conditions a minimum BBB+ credit rating may be required to provide a reasonable level of comfort in accessing debt markets. Similarly, given the aviation industry's recovery path, we would anticipate that financial ratios consistent with FFO / Net Debt in the mid-teens and Net Debt / EBITDA of less than 6.0x is likely to be sufficient to access debt markets on the assumptions that debt funders requirements for these key credit ratios return to pre-pandemic levels.

3.5 Target Credit Rating

Based on the key considerations presented above, we believe a strong investment grade rating is likely to be more efficient in supporting access to debt markets. Similar to our 2019 report, we still consider a minimum of a BBB+ credit rating sufficient to facilitate access to funding in this current market. However, as noted above, markets are exhibiting volatility, and this is a point in time opinion which may be sensitive to change based on changes in market conditions.

4 Financeability - Testing

Further to our conclusion in the previous section regarding a BBB+ rating, in this section we present the approach we adopted to financeability testing, and the accompanying results. Furthermore, we highlighted the specific credit metrics which can be treated as core and secondary to assist in achieving this credit rating.

4.1 Overview of approach

Centrus analysed the output of the model which CAR developed as part of their regulatory determination. We relied on this model for forecasted cashflows related to the regulated entity. These forecasted cashflows are based on the building block methodology used by CAR (detailed in section 2.1 – Background) and do not include any adjustment for financeability. CAR may update their modelled assumptions to incorporate various factors, including the financeability recommendations made by Centrus before the final draft determination is issued. We would also like to stipulate that the accuracy and validity of the model produced by the Commission has not been authenticated, tested, or audited by Centrus (and was not in scope).

As outlined in the previous section, we have conducted our financeability testing through applying two separate methodologies. We have generally followed the key steps within the methodology for a credit ratings assessment⁸ followed by a credit rating agency for airport operators and broadened out the analysis to a wider funder perspective.

4.2 Credit Rating Methodology

Centrus have applied S&P's common framework and associated methodologies to advise our Financeability assessment. We chose to mirror S&P's approach as it is the current ratings provider to daa plc and therefore has published information relevant to the regulated company being assessed that we refer to throughout our analysis. This has assisted Centrus in determining a hypothetical indicative shadow credit rating for Dublin Airport based on the forecasted output of the regulatory settlement. An overview of the rating methodology and framework are presented below.

4.2.1 S&P Ratings Framework

S&P separate their common framework into several individual components. Each component enhances the credit assessment through adding its own distinct methodology. Similarly, each element has its own output, which is generally reflected by a scale ranging from 1. (Positive) to 6. (Negative). Centrus believe that through following S&P's approach, we have ensured transparency, and independence. We provide an overview of each component below.

⁸ Please note that this is based on the credit rating agencies' published methodologies at the time of preparing this report, which are subject to change at their discretion

1. Business Risk Profile

This component assesses both qualitative and quantitative information to determine an issuer's potential to generate cashflows given the industry, and country in which it operates and its relative competitive position.

2. Financial Risk Profile

This element uses a quantitative approach to assess an issuer's cashflow and leverage, and thus its potential to meet its financial obligations and service its debt with respect to same.

3. Anchor

The anchor is a product of the combined outcome of the Business Risk Profile and Financial Risk Profile assessments, and it acts as an initial rating "anchor".

4. Modifiers

This aspect of the credit assessment analyses 6 additional factors which are not captured in either the Business Risk Profile or the Financial Risk Profiles, ensuring an holistic view to the credit analysis. The modifiers are presented below:

- Diversification / portfolio effect.
- Capital Structure;
- Financial Policy;
- Liquidity;
- Management / Governance; &
- Comparable Analysis.

Each modifier has the capability of raising or lowering the anchor by one notch (or they need not have an effect).

5. Stand Alone Credit Profile ("SACP")

The SACP indicates the creditworthiness of an issuer before accounting for any external support framework and potential extraordinary assistance i.e. government / parent company support.

6. Government related entities ("GRE")

This aspect of the credit rating takes into account the benefit of an external support framework during periods of crisis or financial distress. As Dublin Airport would likely benefit from state intervention during a period of distress, we have applied the specific GRE methodology. This gives consideration to the airport's government ownership structure, which brings both benefits and constraints. This is reflected in the rating agencies' upgrade or downgrade for government support to an entity's standalone credit rating when assessing Government Related Entities ("GRES") in the case of S&P or government related issuers in the case of Moody's. This adjustment factor for

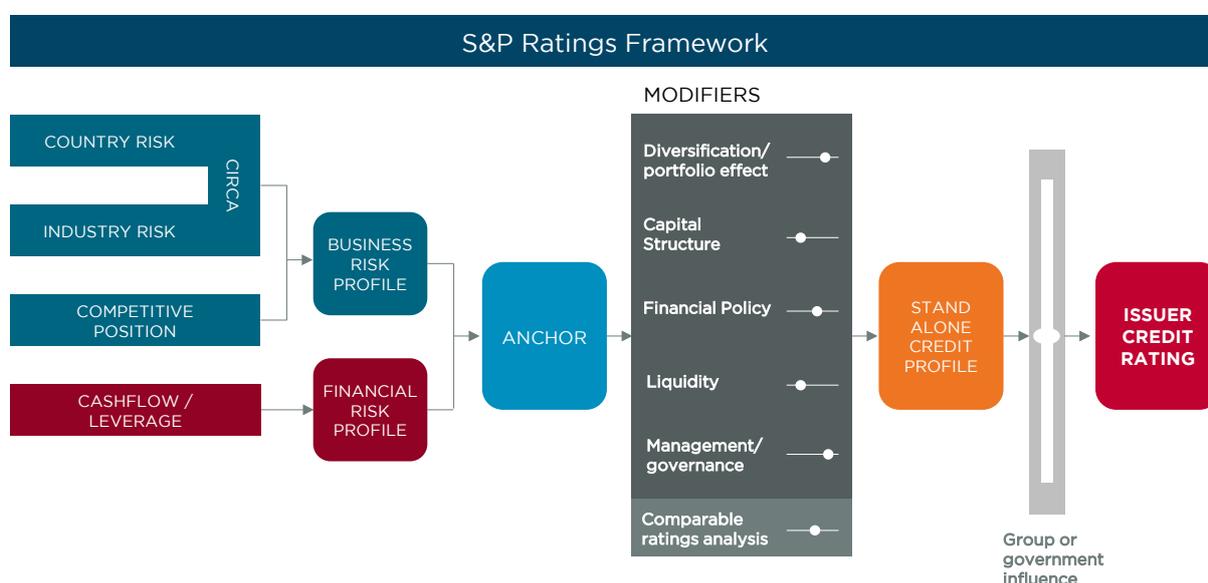
government support reflects the importance of assets such as Dublin Airport to the State, which may be considered a credit mitigant by funders from business risk perspective and could enhance their assessment of an airport’s overall credit risk profile.

7. Issued Credit Rating (“ICR”)

Finally, the ICR reflects the issuer’s creditworthiness after accounting for the external support framework such as that detailed above (6. Government Related Entities - GRE).

The following is an illustration of the approach applied by S&P when rating companies like Dublin Airport which we followed in undertaking our analysis of the credit risk associated with Dublin Airport below:

Figure 4.1: S&P Ratings Framework



Source: S&P Global Ratings

4.2.2 Numeric guidance

It is important to note, when assessing individual components of the common framework which are quantitative in nature, S&P may issue numeric guidance as part of informing its assessment.

In the absence of this published guidance for Airports, similar to the methodology utilised by S&P, we have ranked Dublin Airport against its peers using the average strength of defined profitability metrics for a specified time horizon (For additional information on some of the peers which may have been considered please see Appendix 2).⁹

⁹ Whilst focusing on assessment periods which may be shorter, it should be noted that rating agencies will also make allowances for the impact of the investment cycle and volatility on financial ratios over the short term as noted in their methodology

In considering the key credit metrics, we have assessed trends in financial ratios over forecast periods as well as the absolute level of ratios in each year. This is consistent with the approach of ratings agencies as we exit the global pandemic, whereby ratios falling below the threshold levels in isolated periods do not necessarily cause a rating downgrade and the ability to meet threshold ratios on a weighted average basis is typically what is required. For example, S&P notes in a recent report that they are placing more emphasis on 2023-2024 when assessing cash flow / leverage ratios.¹⁰ This is to account for their belief that 2021 and 2022 do not represent long-term air passenger travel trends, and the fact that airports are essential infrastructure.¹¹

Thresholds for assessing a company's cash flow are less stringent for industries which demonstrate low volatility, when compared to industries with medial or standard volatility. Based on our understanding, S&P generally assesses airports via the low volatility benchmark which is presented in Table 4.1 below (full benchmark is presented in Appendix 1).

Table 4.1: Cash Flow / Leverage Analysis Core Ratios (Low Volatility)

	FFO/debt (%)	Debt/EBITDA (x)
Minimal	35+	less than 2
Modest	23-35	2-3
Intermediate	13-23	3-4
Significant	9-13	4-5
Aggressive	6-9	5-6
Highly leveraged	Less than 6	Greater than 6

Source: S&P Global Ratings

4.2.3 Results

We present the results of our initial assessment of the regulatory settlement as part of the Third interim Review below using the shadow credit rating methodology.

¹⁰ S&P – Ratings Report – Avinor – 04/02/2022

¹¹ S&P – Ratings Report – Avinor – 04/02/2022

4.2.3.1 Business Risk Profile - Strong

S&P currently rate daa plc as having a “Strong” Business Risk Profile. Through this measure, S&P combine a number of qualitative factors, which give a single categorisation that underpins its tolerance levels when assessing the financial ratios described in section 4.2.3.2.

In order to accurately reflect the Business Risk Profile of the regulated entity over the price period, separate to that of daa plc (which S&P’s current rating assessment is applied), we provide an indication of how we believe the following categories which are presented in the Figure 4.2 would likely be used in order to arrive at a Business Risk Profile rating for Dublin Airport.

Figure 4.2: Summary of Business Risk Profile Components



Source: S&P Global Ratings

Corporate Industry & Country Risk Assessment (“CIRCA”) – Low Risk (2)

The country and industry risk factors, between daa plc and the regulated entity are not assumed to differ. Therefore, for the purpose of this assessment, we have applied the current S&P rating for these two categories as below:

- Country Risk - Low Risk
- Industry Risk - Low Risk

Through combining both Low Risk assessments, the overall evaluation for the CIRCA would be deemed Low Risk, which translates to a 2 on the numeric scale as indicated by Table 4.2.

Table 4.2: Corporate Industry and Country Risk Assessment (“CIRCA”)

		Country Risk Assessment					
		1. Very Low Risk	2. Low Risk	3. Intermediate Risk	4. Moderately High Risk	5. High Risk	6. Very High Risk
Industry Risk Assessment	1. Very Low Risk	1	1	1	2	4	5
	2. Low Risk	2	2	2	3	4	5
	3. Intermediate Risk	3	3	3	3	4	5
	4. Moderately High Risk	4	4	4	4	5	6
	5. High Risk	5	5	5	5	5	6
	6. Very High Risk	6	6	6	6	6	6

Source: S&P Global Ratings

Competitive Position: Strong

S&P currently rate daa plc’s competitive position as Strong. Within their analysis of competitive advantage, the rating agency and funders will consider the strength of the regulatory framework, and in the case of Dublin Airport, it is not obvious at this point that there are material differences that would result in a substantial deviation from S&P’s assessment of daa.

Whilst S&P could acknowledge that the final outcome of any regulatory process may be challenging, over a given period, when the regulatory approach is consistently applied, one may not expect its assessment of the regulatory framework to change as a result of same. We note that a predictable regulatory support, consistently applied, is an important requirement of debt funders also.

Furthermore, we note that S&P considers daa plc’s low aeronautical charges as a factor which strengthens its competitive advantage.¹² However, we also recognise that funders and rating agencies would also consider the resulting financial metrics rather than the pricing itself, and how those metrics would impact the business and financial risk.

In order to replicate the assessment of the competitive position and profitability for the purposes of this analysis, a peer group analysis was undertaken using an EBITDA Margin¹³ assessment.

EBITDA margin can be used to assess a company’s operational profitability and efficiency i.e., how well is a company using its operating cash compared to the revenue it generates. It differs from other profitability measures because it does not account for capital intensity

¹² S&P Surveillance Report – daa plc – March 2022

¹³ EBITDA margin is a measure of a company’s operating profit based on its Earnings Before Interest, Tax, Depreciation and Amortisation as a percentage of its revenue

/ the amount of leverage employed by the firm, and allows for comparison of companies across an industry, irrespective of their capital structure.

It is also used to track the progress of a company through time and the stability of a company's business model over cycles. This is not considered as a core ratio by rating agencies for the airport sector but allows for the categorisation of daa plc and Dublin Airport amongst other airports across Europe and globally. It is factored into S&P's assessment of an operator's Business Risk Profile as a final adjustment factor based on the level of profitability and volatility of same over time.

The following analysis of historic EBITDA Margins across the industry illustrates where daa plc has historically sat, on a profitability basis among its peer airports, over the last three years.

Table 4.3: Peer Comparison

EBITDA Margin	2019	2020	2021	Avg
Sydney Airport	81%	63%	54%	66%
Australia Pacific Airports Corporation	74%	67%	49%	63%
Perth Airport	64%	55%	48%	56%
Flughafen Zürich AG	57%	33%	43%	44%
Aena	61%	37%	34%	44%
Heathrow	63%	11%	32%	35%
Avinor AS	39%	25%	33%	32%
Aeroporti di Roma	61%	8%	23%	30%
Aéroports de Paris	41%	9%	29%	26%
Copenhagen Airport	51%	15%	8%	25%
Royal Schiphol Group	41%	-20%	11%	10%
Gatwick	57%	-31%	-14%	4%
daa	34%	-43%	8%	-0.3%
Manchester Airport	41%	42%	-117%	-11%

Source: S&P Capital IQ

Based on the EBITDA Margins outlined above, it may be interpreted that daa plc ranks at the lower end of its peer group in terms of its profitability. However, it should also be noted, although daa's average EBITDA margin was negative for the period 2019 to 2021, S&P still consider their competitive position as "Strong".

If EBITDA Margin analysis is used for the purposes of determining what may be viewed as the indicative Business Risk Profile of the regulated entity, differences in the ratio between Dublin Airport and daa plc due to included / excluded activities would need to be considered.

The EBITDA Margin for the regulated business for 2021 was 12.6% (EBITDA of €25.4m), compared to -1.1% in 2020 (EBITDA of -€2.11m).¹⁴ On a forecast basis, Table 4.4 illustrates the projected EBITDA Margin increases over the life of the regulatory pricing period.

Table 4.4: Dublin Airport Profitability Metrics

	2023f	2024f	2025f	2026f	Avg.
EBITDA	€218m	€260m	€304m	€361m	-
EBITDA Margin	41%	43%	46%	49%	45%*

f - forecasted nominal rates * - weighted average

Source: CAR Model

Based on CAR’s building block model, EBITDA is forecasted to recover to c.€218M in 2023. Similarly, the EBITDA margin grows YoY over the period 2023 to 2026. The growth in EBITDA margin forecasts indicate an ability to control operational expenditure as revenues increase and thus results in greater profitability over time. Moreover, we note that S&P have indicated in their latest surveillance of daa plc, that they would deem daa’s competitive position to weaken if they were unable to maintain a 30% EBITDA margin or experienced higher volatility in cashflow during normal times. Based on Table 4.4., we may interpret that the regulated entity’s forecasted EBITDA margin remains above the threshold levels stated by S&P for a “Strong” Business Risk Profile assessment. Therefore, we believe this would result in a “Strong” business risk assessment, all else being equal. For the purposes of this report, we have also ranked Dublin Airport against its industry peers as presented below.

¹⁴ These calculations are based on the last audited regulated accounts

Table: 4.5: Peer comparison

EBITDA Margin	2017	2018	2019	Avg
Sydney Airport	81%	81%	81%	81%
Australia Pacific Airports Corporation	74%	73%	74%	73%
Perth Airport	66%	67%	64%	66%
Heathrow	63%	63%	63%	63%
Aena	62%	62%	61%	62%
Aeroporti di Roma	59%	61%	61%	60%
Gatwick	56%	56%	57%	56%
Copenhagen Airport	56%	54%	51%	54%
Flughafen Zürich AG	46%	54%	57%	53%
Dublin Airport				45%*
Aéroports de Paris	46%	47%	41%	45%
Manchester Airport	44%	43%	41%	43%
Royal Schiphol Group	39%	38%	41%	40%
daa plc	35%	35%	34%	35%
Avinor AS	28%	36%	39%	34%

* Forecasted average 2023-2026

Source: S&P Capital IQ / CAR Building Block Model

When the base case projected EBITDA Margin levels for Dublin Airport are compared to the peer group historic levels (Pre-covid), it is likely that Dublin Airport, could be viewed as more efficient from a profitability perspective than at the daa plc group level and would rank in the middle of its peer group over the life of the price period (assuming the peer group EBITDA Margin levels return to pre-covid levels).

As the profitability measure of the regulated entity against peers is still in the “Average” category (i.e. between 30-55%) for the profitability assessment of the Business Risk Profile assessment after considering the initial outcome from the CAR building blocks we therefore consider it reasonable, based on the data outlined above, that the Business Risk Profile for the regulated entity would remain comparable over the regulatory price period and all other things being equal could remain in the “Strong” category in the context of an S&P rating. Therefore, we conclude that Dublin Airport’s indicative competitive position could be classified as Strong. When the result of the competitive position is combined with the outcome of the CIRCA assessment, this would result in an overall Business Risk Profile assessment of “Strong” or “2” as presented in the table below.

Table: 4.6: Business Risk Profile

		"CIRCA"					
		1.	2	3	4	5	6
Competitive Risk Assessment	1. Excellent	1	1	1	2	3*	5
	2. Strong	1	2	2	3	4	5
	3. Satisfactory	2	3	3	3	4	6
	4. Fair	3	4	4	4	5	6
	5. Weak	4	5	5	5	5	6
	6. Vulnerable	5	6	6	6	6	6

Source: S&P Capital IQ

Therefore, we consider it appropriate to continue using a Business Risk Profile of "Strong" as the relevant Business Risk Profile assessment based on CAR's pricing model when determining the anchor rating of Dublin Airport at the next stage.

4.2.3.2 Financial Risk Profile - Intermediate

In order to obtain a picture of how the Financial Risk Profile for the regulated entity would be assessed over the regulatory price period, following the approach to financial ratios of S&P, we have analysed the following key credit metrics:

- Free funds from operations (FFO) to net debt
- Net debt to EBITDA

These measures give an indication of the ability of a company to pay off its debt using its net operating income surplus while also illustrating how long this is expected to take based on the company's current leverage. Table 4.6 is intended to summarise the indicative relationship between the anchor credit rating group and the numeric guidance issued by S&P for the cash flow / leverage ratios when combined with a "Strong" Business Risk Profile assessment.

Table 4.7: Summary for Anchor Rating Groups (Based on Strong Business Profile)

Anchor	aa/aa-	a+/a	a-/bbb+	bbb	bb+
*FFO / Net Debt (%)	35+	23-35	13-23	9-13	6-9
Debt / EBITDA (x)	less than 2	2-3	3-4	4-5	5-6

* Core Ratio for Airports

Source: S&P Capital IQ

Table 4.8 presents an overview of some of the key figures from CAR’s building block assessment. As stated in the Section 4.1 - Overview of Approach, all forecasted figures which have been analysed are based on CAR’s building block assessment, prior to any adjustment for financeability. We note that CAR may update their modelled assumptions to include various factors including the output of this report.

Table 4.8: Dublin Airport Key Figures

	2023f	2024f	2025f	Avg.
Closing Net Debt	€1,198m	€1,433m	€1,686m	-
EBITDA	€218m	€260m	€304m	-
Funds from operations	€181m	€221m	€262m	-
FFO / Net debt	15.1%	15.4%	15.5%	15.4%*
Net Debt / EBITDA	5.50x	5.51x	5.55x	5.52x*

f - forecasted nominal rates * - weighted average

Source: CAR Model

Core Ratio: FFO to Net Debt - Intermediate

For infrastructure companies including airports which have significant levels of debt financed assets that generally have very long useful lives, this measure is not meant to gauge whether its annual FFO can cover its debt fully in any given year but rather the entity has the capacity to service debt (both principal and interest) within a prudent timeframe e.g. a ratio of 50% implies debt can be serviced within 2-years. This allows a ranking amongst companies for levels of gearing.

This is a core ratio for S&P for infrastructure related companies including airports, where there are large amounts of cash and debt held on balance. Generally, FFO / Net Debt is considered to provide a more accurate picture than Net Debt / EBITDA of the company’s ability to repay its debt over a period of time based on the free funds available from operations. Similarly, as FFO factors in interest repayments, this makes it more comparable across the spectrum of airport operators, given the large debt balances may lead to material interest payments.

Table 4.9: Core Ratio

	2023f	2024f	2025f	Avg
FFO / Net debt	15.1%	15.4%	15.5%	15.4%
Indicative Rating	Intermediate	Intermediate	Intermediate	Intermediate

Source: CAR Model

The above forecasts clearly illustrate that Dublin Airport’s FFO / Net Debt ratio remains within the guidance for an “Intermediate” assessment of between 13%-23%. However, we note this would be considered as being in the lower range of an “Intermediate” Financial Risk Profile under the S&P ratings methodology guidance.

Furthermore, based on CAR’s pricing model, Dublin Airport’s weighted average FFO to Net Debt is forecasted to be c. 15.3%. When paired with the outcome of the Business Risk Profile, this analysis may indicate an anchor rating group of “a-/bbb+” as Table 4.6 illustrates.

Chart 4.1: Leverage at Dublin Airport



Source: S&P Global Ratings / CAR Model

Chart 4.1 above illustrates that over the regulatory pricing period, the ratio marginally improves YoY. However, the numbers remain tight with very little headroom above the downgrade threshold. If FFO to Net Debt were to fall below 13%, this could result in an “Aggressive” assessment of the Financial Risk Profile, and lead to an anchor rating of “bbb” down from an anchor of “a-/bbb+”.

Secondary Ratio: Net debt to EBITDA - Aggressive

This ratio gives an indication as to how long a company would need to operate at its current level to pay off all its debt and higher ratio outcomes typically indicate that a company is unable to repay its existing debt obligations in the near term. This is commonly used by credit rating agencies including S&P, Fitch, and Moody’s to determine the probability of a company defaulting on its debt for corporate issuers. Given their propensity for funding over shorter tenors than institutional investors, this ratio is also assessed more closely by bank lenders.

As previously stated, generally for infrastructure companies, FFO / Net Debt is considered a more accurate reflection of their ability repay its debt over a period. Therefore, Net debt to EBITDA is often considered as a secondary measure of a company’s leverage e.g., for S&P this may be a secondary consideration whereas it is not included at all within the key ratios focused on by Moody’s in its credit rating assessment for issuers in the airport sector.

Table 4.10: Secondary Ratio

	2023f	2024f	2025f	Avg
Net Debt / EBITDA	5.5x	5.51x	5.55x	5.52x
Indicative Rating	Aggressive	Aggressive	Aggressive	Aggressive

Source: CAR Model

When reviewing the secondary ratio, forecasts illustrate that Net Debt / EBITDA currently falls within the 5x-6x guidance for “Aggressive”. Moreover, we note that this measure is on the mid-way point of this category for the first year. However, the measure worsens YoY over the pricing period as it approaches 5.55x in 2025. The disimprovement in the ratio reflects an increase in Net Debt over the period which is proportionally larger than the increase in EBITDA.

During the 2019 price determination, we noted that this metric would come under pressure during the price period, reflecting the sharp increase in the level of debt as the new passenger capacity was developed through the capital expenditure programme and the “lag effect” of the associated increase in revenues occurring. We also note that this remains true for the output of the current building block assessment, prior to any adjustment for financeability.

The forecasts may also illustrate that this ratio may be under pressure due to the fact daa were “prompted to take on additional debt during the pandemic in order to shore up liquidity in the face of unprecedented operational disruption”.¹⁵ In addition, we note that whilst the regulated entities net debt balances is also forecasted to increase sharply during the period examined (c.€1.2b to c.€1.7b), the increase in EBITDA due to return in passenger numbers is proportionally smaller, resulting in an worsening ratio.

If looking at the forecasted periods in isolation this could result in a “Aggressive” categorisation with a possible move towards a “Highly Leveraged” Financial Risk Profile being evidenced over the forecasted period.

4.2.4 Financial Risk Profile: Intermediate

We note that when completing their cash flow / leverage analysis, S&P choose the ratio which best reflects the overall leverage of the firm. We believe that for Dublin Airport, and airports in general, this may be the core ratio of FFO / Net Debt. Therefore, the indicative assessment of the Financial Risk Profile is “Intermediate” based on our cash flow / leverage analysis.

However, we also would like to stipulate, that although the secondary ratio alone would present the possibility that financeability could be more challenging based on the results of

¹⁵ S&P – daa plc – March 2022

this assessment. It does not necessarily indicate that the ratio as outlined in the base case above are unfinanceable for the following reasons:

- Individual metrics in excess of threshold levels on a temporary basis do not necessarily lead to credit rating downgrades. This is because rating agencies, including S&P, looking at a range of wider factors from qualitative Business Risk Profile to government support mechanisms, the sustainability of ratios over the long term, peer group and market trends as well as range of wider factors;
- These scenarios do not allow for any measures which could be available to Dublin Airport to bolster financeability e.g. greater cost control, changing the parameters of the CapEx programme or other measures; &
- The relationship between the level of credit rating required and / or market appetite for particular rating levels across the various debt market participants which can vary significantly over time.

We also recognise that a large or sustained failure to achieve threshold ratings consistently across the primary and secondary leverage ratios may not be consistent with maintaining the credit rating in question and we intend to take this risk into consideration when assessing financeability.

4.2.4.1 Anchor Rating - bbb+

Based on our review, we believe the regulated entity's Financial Risk Profile and Business Risk Profile would not deviate in any material way from that of daa plc based on the current building block outcome. Therefore, we conclude that the indicative anchor rating for the regulated entity would likely equal that of daa plc ("bbb+"), based on the combination of their indicative "Strong" Business Risk Profile and "Intermediate" Financial Risk Profile assessments.

Below, we present an illustration of how daa's anchor credit rating is arrived at under S&P's methodology when combining S&P's latest assessment of both their Business Risk Profile and Financial Risk Profile.

Table 4.11: daa plc anchor rating matrix

		Financial risk profile					
		Minimal	Modest	Intermediate	Significant	Aggressive	Highly Leveraged
Business Risk Profile	1. Excellent	aaa/aa+	aa	a+/a	a-	bbb	bbb-/bb+
	2. Strong	aa/aa-	a+/a	a-/bbb+	bbb	bb+	bb
	3. Satisfactory	a/a-	bbb+	bbb/bbb-	bbb-/bb+	bb	bb+
	4. Fair	bbb/bbb-	bbb-	bb+	bb	bb-	b
	5. Weak	bb+	bb+	bb	bb-	b+	b/b-
	6. Vulnerable	bb-	bb-	bb-/b+	b+	b	b-

Source: S&P Capital Ratings

4.2.4.2 Modifiers

Before the final determination of the Stand-Alone Credit Profile (“SACP”) of the entity, S&P considers whether there is a need for any modifiers or adjustments required to this anchor credit rating based on wider factors as presented in Figure 4.3.

In our previous report, we noted that due to their comparable ratings analysis, S&P had applied a modifier to daa plc’s anchor. This modifier resulted in a 1 notch downgrade of the anchor, resulting in a SACP of “bbb+”. This adjustment factor took into account where daa plc’s Business Risk Profile and Financial Risk Profile ranked among its peer group (limited to those rated by S&P as below). This was primarily down to the FFO / Net Debt ratio and the EBITDA margin ratios being out of alignment with their peer group analysis of daa plc. However, based on our review of S&P’s latest published surveillance, we note they no longer appear to apply this modifier to daa plc.

Therefore, based on the regulated entities Business Risk Profile and Financial Risk Profile not deviating from that of daa plc, we have also assumed the modifiers utilised by S&P for daa plc would also apply to the regulated entity. As a result, similar to daa plc, we conclude that the regulated entities anchor rating would not be subject to any modifiers and thus the resulting SACP as indicated by our analysis would be “bbb+”, as summarised in Figure 4.4.

Figure 4.3: Modifiers

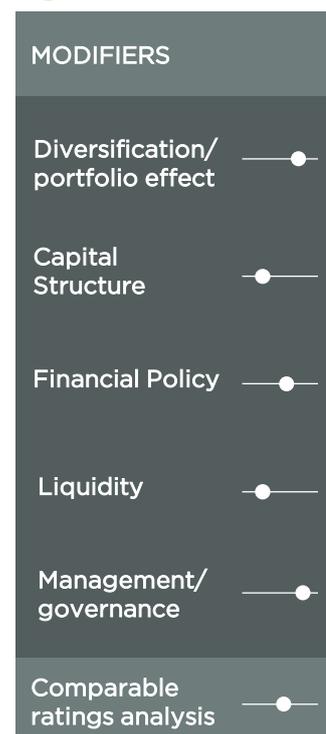
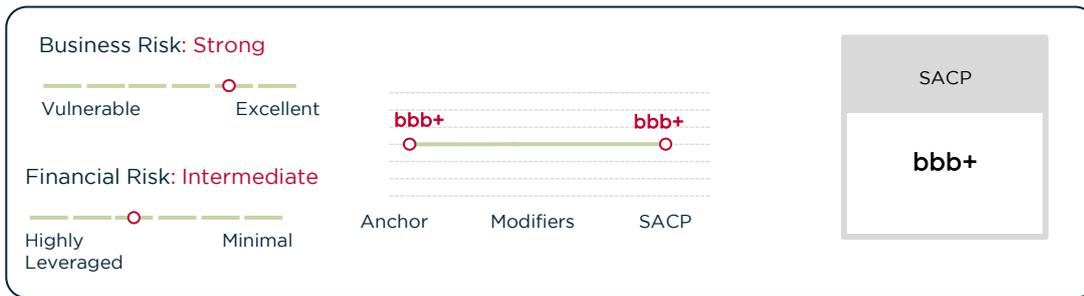


Figure 4.4: Summary of SACP for Dublin Airport



Source: S&P Capital Ratings

4.2.4.3 GRE / Government Support

As per S&P’s Methodology, daa plc is considered a government related entity for the purpose of their credit assessment. A matrix is applied, which differs depending on S&P’s assessment of the likelihood of support. This is considered Moderately High for daa plc, as S&P believes there is a moderately high likelihood the State of Ireland would provide timely and sufficient extraordinary support to daa plc in the event of financial crisis. This is given, due to its 100% ownership by the government and that the airport is a strategic asset for Ireland. We would not expect this adjustment for government support would differ when considering the rating of the regulated entity versus that of the group.

This matrix looks at the Government’s local currency rating combined with the SACP and determines whether there is any potential rating uplift as follows:

Table 4.12: daa plc’s indicative table

Determining a GRE’s Issuers Credit Rating: Moderately High (MH) Likelihood of Support																
-- Government’s Local Currency Rating --																
SACP	AAA	AA+	AA	AA-	A+	A	A-	BBB+	BBB	BBB-	BB+	BB	BB-	B+	B	B-
aaa	AAA															
aa+	AA+	AA+														
aa	AA	AA	AA													
aa-	AA	AA-	AA-	AA-												
a+	AA-	AA-	A+	A+	A+											
a	AA-	AA-	A+	A+	A+	A										
a-	A+	A	A	A	A-	A-	A-									
bbb+	A	A	A-	A-	A-	BBB+	BBB+	BBB+								
bbb	A-	A-	A-	BBB+	BBB+	BBB+	BBB+	BBB	BBB							
bbb-	BBB+	BBB+	BBB+	BBB+	BBB	BBB	BBB	BBB-	BBB-	BBB-						
bb+	BBB	BBB	BBB	BBB	BBB	BBB-	BBB-	BBB-	BB+	BB+	BB+	BB+				
bb	BBB-	BB+	BB+	BB	BB	BB	BB									
bb-	BB+	BB	BB	BB	BB-	BB-	BB-	BB-								
B+	BB	BB-	BB-	BB-	BB-	B+	B+									
b	BB-	B+	B+	B+	B	B	B									
b-	B+	B	B	B	B-	B-	B-	B-								
ccc+	B	B	B	B	B	B	B	B	B	B-	B-	B-	*	*	*	*
ccc	B-	*	*	*	*	*	*									
ccc-	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*
cc	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*	*

*These combinations may suggest an issuer credit rating in the 'CCC' or weaker rating categories. As per paragraph 43, we only assign issuer credit ratings for GREs in these rating categories based on "Criteria For Assigning 'CCC+', 'CCC', 'CCC-', And 'CC' Ratings," published Oct. 1, 2012. SACP--Stand-alone credit profile.

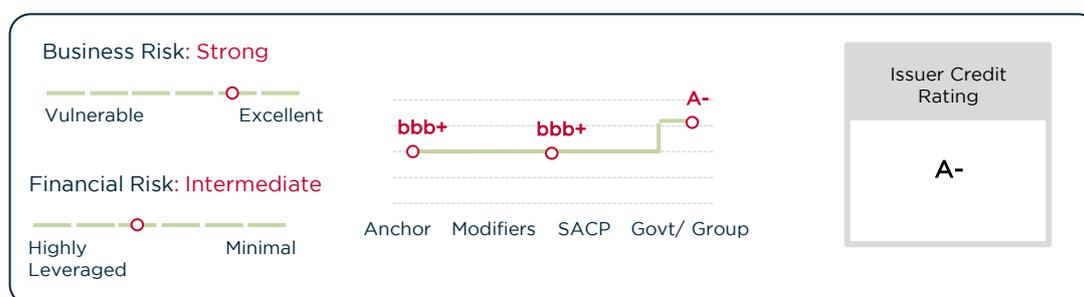
Source: S&P Capital Ratings

As assessed by S&P, the Ireland Government Local Currency Rating is currently AA- and daa plc’s SACP is bbb+ at this time, then as indicated by Table 4.11, daa plc benefit from a +1 notch from their SACP, resulting in a credit rating of A- currently on negative outlook.

We note, should the Irish Government Local Currency Rating fall to A+, then daa plc would still attain a +1 notch from their SACP and remain at “A-”. However, should the Government Rating fall below “A+”, then all else equal, daa plc’s rating would be the same as it’s SACP i.e. “BBB+”.

Should daa’s SACP fall to “bbb” flat i.e. a downgrade of 1 notch (which S&P suggested would be possible if daa plc failed to maintained a weighted average FFO / Net Debt sustainably above 13% for example) then the government support would result in daa plc maintaining a credit rating of “BBB+” at worst (assuming the Ireland rating did not fall below “A”). We note that this could also be true for Dublin Airport and therefore we would conclude that Dublin Airport’s indicative shadow credit rating, based on the regulatory output, would be “A-”.

Figure 4.5: Indicative Shadow Rating Assessment



Source: S&P Capital Ratings

4.3 Funder Methodology

We also consider the wider question of financeability from the perspective of debt funders to airport operators such as Dublin Airport, including infrastructure and public sector investors. We have designed a general credit assessment which a debt funder may complete. The general credit assessment is based on the wider Centrus teams experience working in debt capital markets and subsequent knowledge of how funders may assess regulated infrastructure assets. An overview of factors which a funder may consider are outlined below. We have also used the S&P benchmark Table (Appendix 1) as reference when assessing any quantitative figures for ease of reference. However, we note that funders may have their own internal benchmarks which they assess an entities ratios’ against.

4.3.1 Debt Funder Methodology

Similar to the methodology used by a rating agency, debt funders also focus on a number of core financial ratios within the context of a wider qualitative assessment of the company’s overall business management, operating environment, regulatory framework, macroeconomic environment, and ownership / capital profile. We have outlined some of the key additional items debt funders may include in their assessment which have not

already been explored, or not explored in their entirety during the shadow credit rating assessment. Moreover, we have included some additional context for some elements covered in the credit rating assessment from a funder perspective.

1. Time frame

While S&P's methodology when assessing credit ratios in the current environment typically focuses on a 3-year weighted average period (being the current financial year and 2 years' forward forecasts), debt funders will often assess expected performance over the full regulatory pricing period along with any reasonable forecasts beyond that period to when their debt will be repaid / refinanced in full. This is required to allow them to take a view on the probability that their principal and interest will get repaid in full and in a timely manner.

This also facilitates debt funders taking a longer-term view on financial performance over the investment cycle characteristic of the airport sector. Multi-year capital expenditure programmes result in periods of negative cashflow and thus are funded through debt raising, while higher passenger numbers / improved service feed through to increases in revenues with a lag and allow deleveraging in the post investment period.

2. Debt Service

In addition to the ratios outlined within the metrics assessment and scenario analysis, a funder will also consider the ability of a borrower to service the ongoing debt requirements using specific coverage ratios.

3. Government Support

Funders will also give consideration to the airport's sovereign ownership structure which brings both benefits and constraints.

4. Stress Scenarios / scenario analysis

Scenario analysis allows funders to assess the extent to which these other risk factors could impact on Dublin Airport's future performance e.g. through lower passenger volumes, different outturn operating costs, construction programme overruns or delays, etc.

We have also undertaken scenario analysis to reflect the impact that these risks materialising could have on Dublin Airport's future debt capacity and to understand the extent to which changes in the final price determination might help to mitigate same.

The scenarios we have assessed for the purpose of this paper are focused on:

- (i) CAR's pricing model with inputs based on its draft decisions on the relevant building blocks within the price determination process; &

- (ii) Those scenarios we consider that debt investors and rating agencies are likely to assess as most relevant for debt funding as they impact the EBITDA and cash generation of the entity as well as its debt profile over the regulatory period.

Our analysis indicates that there are a range of credible scenarios that are financeable and there are also scenarios where financeability would be more difficult. We note however, that there is significant potential for a larger range of scenarios to allow for variances that might emerge in the longer run, for instance resurgence of covid-19 case numbers, the impact of Brexit, slower economic growth in Ireland, different outturns for operating costs or CapEx programme timing and costs to current stakeholder forecasts, financial market conditions changing, etc.

We also note that stakeholders, rating agencies and debt funders may have their own views on the scenarios it is most appropriate to consider and on how financeability should be assessed that differ from our assessment.

Finally, we note that we are not attempting or consider it appropriate to replicate all the factors and scenarios that a funder might consider when developing a credit application. Therefore, we have focused on the metrics, that are most likely to impact negatively on debt funder appetite and pricing.

Given airports may be viewed as more levered to economic growth than other core infrastructure / utility companies, funders may require that airports retain sufficient financial flexibility to sustain operations and those investment programs in the face of shocks which they assess through downside testing described below.

4.3.2 Analysis

We present the analysis of the debt capacity indicators we believe will be focused on most closely by a range of debt funders below.

4.3.2.1 Time Frame

As outlined previously, a funder is likely to consider more than just the current 3-year weighted average assessment employed by S&P, when assessing the key credit metrics explored in Section 4.2.3.2. For instance, they would likely assess the full regulatory cycle in their view and could also consider a wider period in their assessment in order to determine if the metrics that indicate performance in the period would be sustained over the investment / funding cycle.

In order to support this analysis, we have reviewed forecasts for the full regulatory period. We note that although a funder would likely assess forecasts beyond the current base case regulatory period, where for example the cycle of capital expenditure is reduced, and the “lag” impact of the expected higher passenger growth continues. We have omitted this from our analysis on the basis that CAR’s building block model only extends as far as the end of the regulatory period 2026.

4.3.2.2 Ratio Analysis:

FFO to Net Debt

As noted in the credit rating methodology section, this is a core ratio for S&P when assessing infrastructure related companies including airports, where there are large amounts of debt held on balance sheet. Similarly, it is also one of the more important ratios given consideration by debt funders for the same reason outlined previously (see Section 4.2.3.2).

Table 4.13: FFO / Net Debt

	2023f	2024f	2025f	2026f
FFO / Net debt	15.1%	15.4%	15.5%	15.4%

Source: CAR Model

Based on the above ratios, a funder is likely to identify that the FFO / Net Debt for the regulated entity is forecasted to increase over the four-year period 2023f to 2026f. Similarly, funders could interpret that this forecasted ratio is on an upward trajectory over the first three years, reducing slightly in year 2026f from 2025f. We note funders analyse this metric in a similar manner to rating agencies, allowing for the ratio to fall below certain thresholds in isolated periods, but requiring it stay above on a sustained basis.

Therefore, a funder assessing this measure may consider it a positive sign that its trending upwards, and that it consistently remains above the threshold for a potential downgrade of 13%. However, they would also note the minimum headroom which is forecasted over the period and run various scenarios to check when this headroom may be eroded, as explored in our scenario analysis.

Net debt to EBITDA

A funder may supplement its credit assessment with further analysis based on Net Debt to EBITDA. Once the ratio approaches certain threshold levels it may limit their appetite to provide further debt financing. Therefore, consideration of this metric from a funder's perspective is important for assessing overall financeability

Table 4.14 Net Debt / EBITDA

	2023f	2024f	2025f	2026f
Net Debt / EBITDA	5.5x	5.51x	5.55x	5.65x

Source: CAR Model

The ratios outlined in Table 4.14 for the period 2022f-2026f indicates a disimprovement in the ratio over the period as it edges closer to the "Highly Leveraged" equivalent rating from a funder perspective in year 2026. With minimum headroom a Net Debt / EIBTDA ratio of close to 6.0x as exhibited in 2026f could give cause to concern for some funders on the

ability to withstand downside scenarios and therefore limit the investor pool and overall financeability for the quantum of new debt when it is required.

However, by combining this with the FFO / Net Debt ratios in their analysis a funder may identify that the overall categorisation of the Financial Risk Profile would be their equivalent of “Intermediate” and may require headroom to sustain some of the scenarios / sensitivities presented in the scenario analysis.

4.3.2.3 Debt Service

In addition to the ratios outlined previously and a scenario analysis, a funder will consider the ability of a borrower to service its ongoing debt requirements. FFO / Cash Interest and EBITDA / Cash Interest are interest ratios typically used by funders as an illustration of an entity’s ability to meet the costs of the debt (see Appendix 1 for benchmark ratings). These ratios for Dublin Airport in the base case are presented in Table 4.15.

Table 4.15: Dublin Airport forecasted debt service ratios

	2023f	2024f	2025f	2026f
FFO / Cash Interest (x)	6.6x	8.2x	9.8x	11.4x
EBITDA / Interest (x)	8.0x	9.7x	11.4x	13.1x

Source: CAR Model

It is clear from the above metrics that there is headroom in the interest cover ratios over the regulatory period such that it could be expected that the financeability assessment should not be materially impacted by a forecast change in interest cost levels (for context, when we assessed the pre-covid (2016-2019) average EBITDA / Interest cover ratio across the peer group airports rated by S&P was 7.28 when Zurich Airport with an outlier ratio of 47.1 was excluded). We note that our understanding is the regulated entity’s forecasted interest obligations are based on CAR’s assumptions with respect to embedded debt, new debt requirements, and the nominal cost of debt. The assessment of the cost of capital is not within the scope of this report and therefore, we have not provided a separate assessment on same.

4.3.2.4 Government Support

As noted previously, we would expect that the government ownership and support is an important factor for funders when assessing the credit profile of Dublin Airport, as the expectation that government would support a strategic asset such as Dublin airport can create a tolerance for higher business risk, lower financial ratios and lending with minimal covenants and / or security packages than would be the case for general corporates.

As a result of the government support and the ratings uplift, it allows Dublin Airport through daa plc to continue to access a wider pool of investors associated with higher ratings, e.g. some investors and traders in public bonds along with certain US private placement

investors require a minimum credit rating of “A-” and institutional investors who have a strong appetite for lending to government related entities as evidenced with funder appetite seen in recent issuance books for other Irish public sector entities such as ESB whereby in January their €500m 1% fixed-rate green bond received more than €2 billion orders¹⁶. Conversely if the rating falls below this “A-” level it could narrow the pool of potential funders by excluding these investors.

4.3.2.5 We note that daa plc’s current documentation for EIB loans and its public bond prospectuses provide a put option to funders in the event of a change of control from government (albeit there is an inbuilt “cure” provision as long as the notes maintain an investment grade rating), providing funders some protection against a loss of government shareholding in certain circumstances. Scenario Analysis

In order to determine what a funder would assess for financeability purposes, we consider a number of key business risks that can cause EBITDA underperformance for airport operators such as Dublin Airport.

The review has been broken down into a review of General Business Risks and Capital Investment Programme Risks.

In each of the scenarios, as in the base case, the pressure on the ratings is evidenced in the entire price period of 2023-2026 where the Financial Risk Profile trends towards “Aggressive” from a ratings context and the Net Debt / EBITA ratio is at relatively high levels above 6.0x.

It is likely that if a funder were to carry out detailed stress testing as part of their financeability assessment they would seek to ensure that downside scenarios are assumed to occur and that in those scenarios the metrics presented would not drop below an appropriate level.

Therefore, for the purposes of our analysis we have tested the base case in a range of downside scenarios in order to determine the EBITDA adjustment or financeability adjustment required in order to provide appropriate metrics. This has largely been driven by the Net Debt / EBITDA ratio given it is the metric that is already at a level that would likely give cause for concern to funders. However, we have also sought to ensure that the FFO / Debt metrics remain above threshold levels as the most relevant ratios for rating agencies and the wider pool of investors that Dublin Airport would require for the quantum of funding to be raised.

Whilst various levers are available in a downside scenario, when a funder is assessing financeability they are likely to only consider those levers that are guaranteed to occur in the case of a downside scenario. Our analysis of downside risks has not taken into account any such possible levers.

¹⁶ ESB - [Green Bond Issuance](#) - 2022

General Business Risks

- **Passenger Numbers**

Passenger numbers are subject to changes and are particularly sensitive to economic events where a shock to the level of passengers forecast in the regulatory period to not achieve the levels set out. As CAR have proposed, with the general support of stakeholders including Dublin Airport, that passenger number variability, both upside and downside, are assigned to the operator, then a funder will ensure that this is stress tested in order to determine how sensitive the metrics are to passenger number changes. We note that in the event of an extreme downside, such as that experienced during the covid-19 pandemic, it is difficult to anticipate the regulatory response, or the long-term effect on passenger psychology, and debt funder appetite. Similarly, we believe this is also true for the current fragmented recovery path the European aviation industry is experiencing, which may be viewed as outside the control of the airport such as operational issues experienced by airlines. Therefore, we would anticipate in such a scenario whereby the forecasted recovery path was significantly prolonged and hampered, due to the factors such as those referenced above, the outcome of a financeability assessment would need to be revisited. For this reason, we have excluded any extreme scenarios from our downside analysis.

- **Operating Expenditure**

Any change in the allowance prior to the draft price determination for the OpEx forecast will be reflected as an equal and opposite offset in associated income allowed in the final price determination and therefore the metrics outlined in the base case will remain constant in this instance. However, the level of downside testing on OpEx relative to the base case that funders would consider likely to be required may be less onerous when compared to other industries, as a result of the airport's ability to recoup any operational expenses which are directly linked to increase in passenger numbers through the price cap (i.e. as passengers increase, there is a direct mechanism to offset additional operational expenditure related to additional passengers).

For the purposes of our report, sensitivities are based on the current forecast OpEx numbers from the CAR model and are based on any potential overspends occurring on these numbers post the final price determination.

Capital Investment Programme Risks

- **Capital Expenditure Delays**

As a result of carrying out such a significant level of capital investment over the entire regulatory period, the risk of delays to the completion dates is one that a funder would factor into their downside scenario analysis.

Should the capital expenditure suffer a delay in initiation or slower than expected delivery timelines, it is expected that the critical impact could be experienced in reduced passenger numbers into the future as the increased capacity resulting from the capital investment is realised later. However, we note that the major new capacity projects are not expected to

be completed within the current regulatory period, and therefore, if delays are experienced, they should not affect the capacity of the current regulatory period. This was analysed as one of the possible funder downside scenarios which results in lower ratios and could cause possible ratings and metrics pressures thereafter. However, these ratios would need to be assessed for any changes in debt drawdown profile resulting from the delay to appropriately calibrate the overall impact on forecast ratios.

- **Capital Expenditure Overspend**

Should a project result in an overspend, there will be an associated increase in the net debt over the regulatory period reflecting the amounts not currently forecast and allowed for within the regulators building block model. Therefore, it may not be guaranteed that the regulated entity would obtain the price benefit associated with the increased investment in the RAB and even if it was determined as an appropriately sought and allowed increase in capital expenditure, the benefits of this would not be received until the next regulatory period price determination as an opening adjustment to the regulatory asset value. In the interim period the overall quantum of debt funding required would be higher.

All else being equal, an increase in capital expenditure would most likely reduce the FFO / Net Debt to threshold levels in later years while Net Debt / EBITDA ratios could trend towards the highly leveraged end of the S&P Financial Risk Profile given the forecast ratios in the base case. This would result in the increased possibility that a rating of SACP BBB+ would come under pressure for a possible rating downgrade due to the primary metrics not been deemed sufficient in the initial instance and the secondary metrics indicating a higher level of financial risk. To mitigate the impact on metrics of this downside, would require a similar increase in the level of cashflow / EBITDA required to service debt as calibrated under the revenue and OpEx scenarios outlined above.

We note that the Stage-Gate process established by CAR for the capital expenditure programme, which allows for the development of the costs and scope of projects within the regulatory period rather than being fixed from the determination, could help mitigate the probability of significant cost overspends not being remunerated.

Scenario Outcomes

CAR have run a range of scenarios on these inputs including an assessment of variations in OpEx, passenger numbers, capital expenditure delays and overspends compared to forecasts. Based on our analysis of these scenarios, aiming for improved base case ratios of FFO/Net Debt above 15% and Net Debt / EBITDA below 5.0x would improve confidence of maintaining financeability should certain higher probability downside scenarios occur.

Target ratios in this range may be needed to provide confidence that the metrics a funder would assess over the regulatory period in a downside scenario in the case of both passenger volatility and operational expenditure overspends are protected against, all other variables being held unchanged.

4.3.2.6 Funder assessment of Dublin Airport credit risk and financeability

Some of the downside assessments analysed above will relate to components of the building blocks within allowed revenues that are within management's control or its accepted risk profile. Furthermore, as our analysis was based on the financial model for the Third Interim Review of the 2019 Determination on Airport Charges at Dublin Airport for the period 2023 to 2026. We note that the base case figures are likely to change for the draft price determination and where CAR build allowances into the individual building blocks, it is likely to mitigate the severity of downside analysis that funders apply to those inputs i.e. funders will consider any additional headroom which may have already been built into the forecasts in order to mitigate downside scenarios.

However, we note that generally a funder will size the quantum of debt it is willing to lend based on its assessment of headroom within the forecast financial ratios in those downside outcomes, rather than the base case out-turn. Therefore, the financial ratios in the future will need to be targeted with head room to the levels that may seem acceptable to funders if presented to them as current levels today, to help ensure the full debt requirement could be funded over the life of the price determination period under the base case scenario.

As a result, where it is considered that a given rating category is the required level to ensure access to funding across a range of debt investors and market conditions, it is recommended that target ratios in the base case are set at levels that fall comfortably within that rating category rather than at the threshold level, for example targeting FFO / Net Debt of 15% or greater rather than 13% or above. This would help ensure that there may be funder appetite for the required debt raise in later years of the price determination period, even when ratios are forecast to be tighter and there is a possibility that lending conditions / market appetite will be more restrictive than seen today. As highlighted in appendix 1, there may be a larger appetite for higher investment grade ratings during times of crisis.

Based on the assessment of the financeability from a funder perspective, factoring in both the base case metrics and the associated downside scenarios, it appears that if a funder were presented with the CAR base case, the results of their downside scenarios are likely to indicate an increased risk of potential pressure on a forecast SACP of BBB+. This could be viewed as consistent with the view of S&P who in their latest surveillance on the ratings of daa plc note there a number of downside risks to the rating, including scenarios that could lead to the downgrade of the SACP to BBB if for example daa were unable to maintain a weighted average FFO to debt sustainably above 13% or profit margins above 30% in normal times.

Whilst we do not consider that this rating pressure alone would lead to a conclusion of the regulated entity being unfinanceable, when it is combined with the potential for financial metrics to reach levels in 2024 and 2025 that some funders may consider as too sensitive to adverse outcomes for an airport company like Dublin Airport and therefore too highly levered, then it could potentially signal a problem.

A funder's assessment of appropriate financial ratios is likely to depend to a large extent on prevalent funding market conditions at the time it is making its investment decision and the relative credit metrics being presented to debt providers as alternate opportunities by peer group companies. In the following section we provide a review of current market conditions and recent debt market transactions relevant to Dublin Airport to assess the market appetite today for leverage levels.

5 Funding Market Context

Chart 5.1: EURIBOR Swap Rates



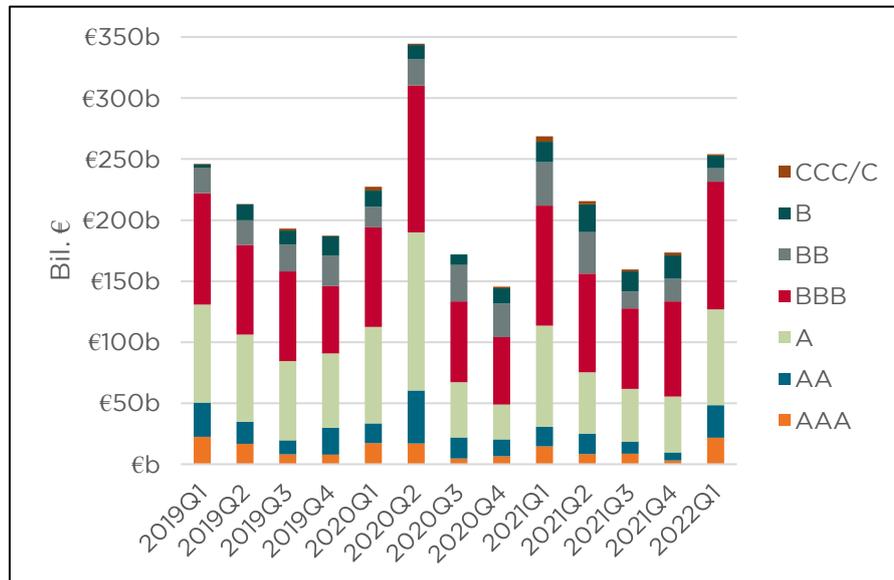
Source: Bloomberg

Interest rates have climbed rapidly during 2022. The ongoing conflict in Ukraine, re-surging in covid case numbers in China, as well as the energy price crisis, have all impacted global supply chains and reported inflation levels. The macro-economic and geopolitical climate have experienced unprecedented tensions which have exacerbated the uncertainty in markets across the globe. We note that central banks around the world have opted for policy rate increases to combat inflation, and some have halted their bond purchasing programmes which they began following the financial crisis. Moreover, swap rates have surged in light of recent events, as analysts' price in future expected monetary policy shifts.

In our 2019 report, we noted that global debt levels (across bonds, loans and revolving credit facilities) had been rising over recent years and investment grade issuances were the predominant category. Within the investment grade issuance, BBB rated issuances had the largest share of rated corporate debt reflecting a growing concentration of issuers within this lowest level of the investment grade category. This evidences that access to markets for BBB rated issuers had been strong over recent years, although S&P who noted that most BBB issuers are above the BBB- category, that is a one notch level above speculative

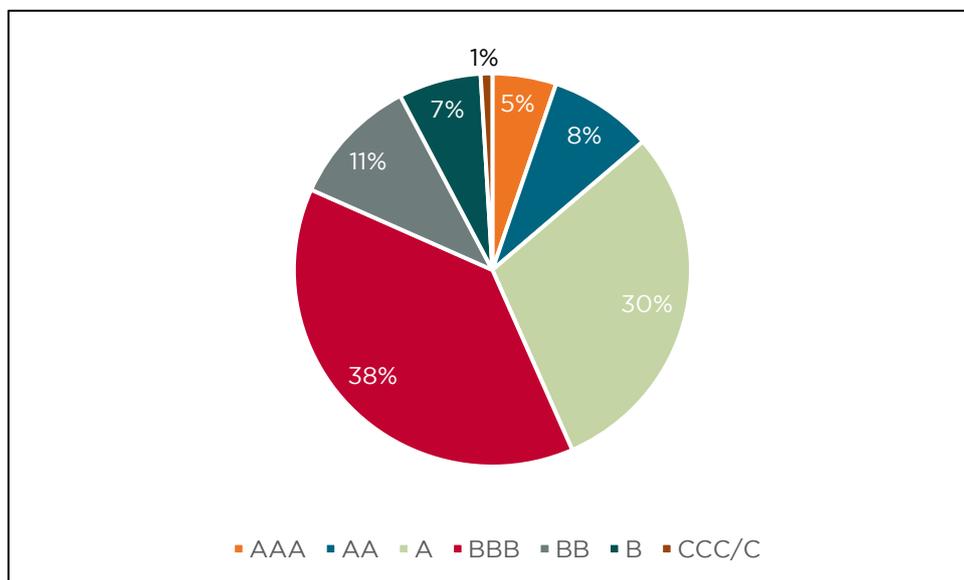
grade.¹⁷ This trend has continued throughout the pandemic as demonstrated by charts 5.2. and 5.3 below.

Chart 5.2: Quarterly European Rated Corporate Bond Issuance



Source: S&P Global Ratings Research.

Chart 5.3: Average distribution of Quarterly European Rated Corporate Bond Issuance Q1 2020 to Q1 2022



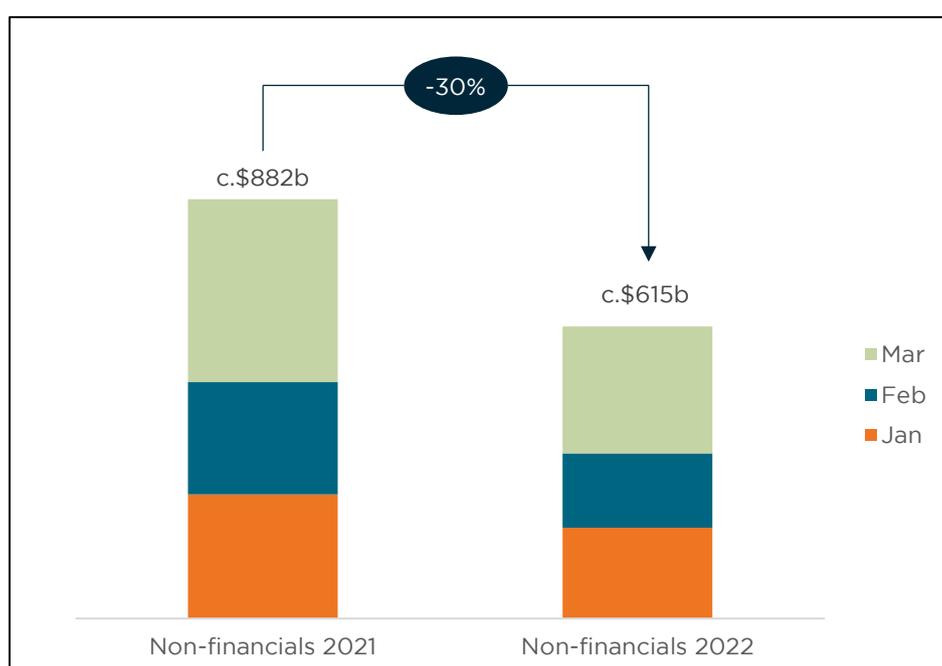
Source: Refinitiv, IHS Global Insight, and S&P Global Ratings Research.

¹⁷ Global Corporate Debt Market: The State of Play in 2019”, S&P, May 2019

Based on the published data from S&P, we note that 82% of bonds issued in Europe since Q1 2020 have been in the investment grade rating category at their time of issuance. The largest portion of these issuances have been in the BBB group. Similarly, we saw a large increase in the number of bonds issued during Q2 2020 as entities tried to raise capital before the pandemic took its hold on the global markets.

However, as the conflict in Ukraine began, rated corporate bond issuances, particularly in Europe, slowed in pace. When comparing Q1 2022 to Q1 2021, we note that there has been a 30% decrease in the amount of corporate bonds issued, as highlighted by graph 5.4 below. Similarly, in recent weeks, speculative grade issuances have all but stopped.¹⁸

Graph 5.4: Non-Financial debt issuance 2021 Q1 vs 2022 Q2



Source: S&P Global Ratings Research.

The spreads on both investment grade and sub-investment grade credit risk premiums are rapidly escalating as market participants factor in the potentially wide-ranging adverse impacts of the current macroeconomic outlook and geopolitical climate (as of the 27th of June). Sub-investment grade credit spreads have increased by 75% since the beginning of January. They have surpassed the 570-bps point mark, but for now, they remain below their peak levels during the pandemic which was 866 bps. Investment grade credit spreads have more than double since the beginning of the year as they exceeded 180 bps. They too remain below their peak pandemic level of 237 bps but they are continuing to grow. We

¹⁸ [Global Financing Conditions: Bond Issuance Looks Set To Contract Almost 5% In 2022 As Conditions Tighten Quickly](#)

note that a similar divergence in spreads may continue and could follow a similar trend to that of the pandemic.

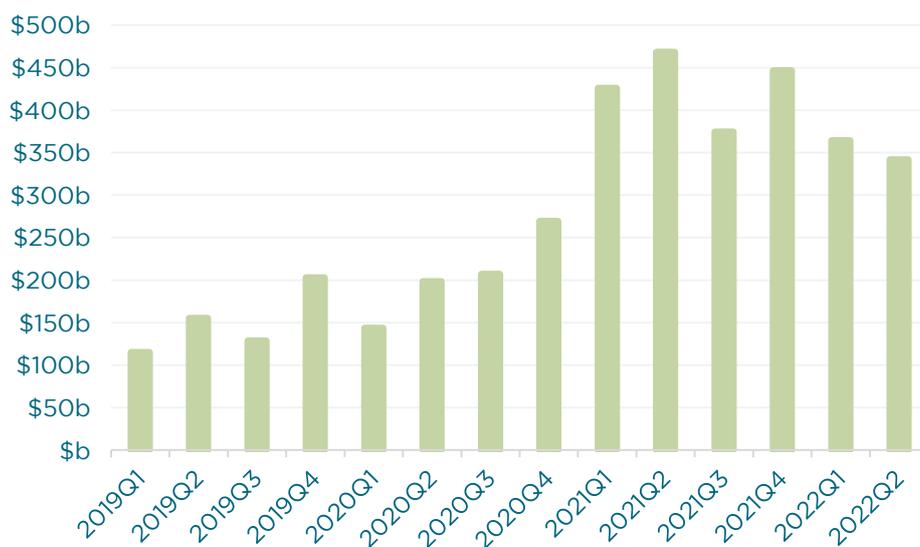
Chart 5.6: European Investment Grade & Speculative Grade Spreads



Source: S&P Eurozone Investment Grade Corporate Bond Index, ICE BofA Euro High Yield Index Option-Adjusted Spread, Percent, Daily, Not Seasonally Adjusted

Since our 2019 review, there has been huge shift in investor attitudes towards ESG investing. This is also true in global debt markets, as funders become increasingly concerned about how the capital they lend will be used. This is highlighted by chart 5.7 below, which shows the significant shift in issuances linked to ESG debt since 2019.

Chart 5.7: Global Issuance of ESG linked Debt



Source: Bloomberg

Airports, amongst other industries may be considered less attractive in terms of traditional ESG investing. This is largely due to the carbon intensive nature the of aviation industry (i.e. fuel consumption), which pose environmental concerns. Therefore, it would be prudent to anticipate this impact on funder appetite, as funders become increasingly conscious about their capital's effects on the environment. We note that unless the capital is being used to transition to net zero, then this could rule out a number of funders.

Similarly, since the onset of the pandemic, airports exposure to health risks have been amplified and hence funders will want to understand the potential for large reductions in the number of passengers travelling during any similar period.

5.1.1 Dublin Airport's funding markets options

Public bonds

To date Dublin Airport, through daa plc, has funded its long-term debt through a combination of EIB loans and the bond market. In our 2019 financeability report, we commented on daa's €400m issuance in the market in 2016 could be considered a sub-benchmark size (which is usually seen as €500m although some bond benchmarks will include issues in smaller sizes from €300m). Issuing at lower than the benchmark size of €500m could limit investor appetite for funders in that market, as some investors have a minimum threshold size for issuances and traditionally, as with all debt markets, the higher the credit rating of the issuer the wider the pool of investor who can purchase that debt. However, daa have since tapped the same issuance for €150m. Whilst their latest issuance in 2020 in the Eurobond market was for €500m.

Table 5.1: Global Issuance of ESG linked Debt

Issuer	Issuer Rating at time of Issuance	Issue Date	Term (yrs)	Currency	Amount (m)
daa plc	A-	2020	12	€	500
daa plc	A-	2016	12	€	550
Aeroporti di Roma	BB+	2021	10	€	500
Aeroporti di Roma	BB+	2020	8	€	300
Aeroports de Paris	A	2020	9	€	750
Aeroports de Paris	A	2020	12	€	750
Aeroports de Paris	A	2020	7	€	1000
Aeroports de Paris	A	2020	10	€	1500
Australia Pacific Airport	BBB+	2021	10	AUD\$	700
Avinor	A-	2020	10	€	500
Avinor	A-	2020	6	NOK	1000
Avinor	A-	2020	11	NOK	1000
Brisbane Airport	BBB	2020	6	AUD\$	250
Brisbane Airport	BBB	2020	11	AUD\$	600
Flughafen Zurich	A+	2020	7	CHF	200
Flughafen Zurich	A+	2020	7	CHF	200
Flughafen Zurich	AA-	2020	4	CHF	300
Gatwick	BBB	2021	9	£	300
Heathrow	BBB+	2022	5	CHF	165
Heathrow	BBB+	2021	20	AUD	125
Heathrow	BBB+	2021	12	CAD\$	625
Heathrow	BBB+	2021	10	€	500
Heathrow	BBB+	2021	7	GBP	350
Heathrow	BBB+	2020	12	GBP	182
Heathrow	BBB+	2020	9	GBP	450
Heathrow	BBB+	2020	5	€	750
Royal Schiphol Group	A	2021	4	€	300
Royal Schiphol Group	A	2021	12	€	700
Royal Schiphol Group	A	2020	7	€	700
Royal Schiphol Group	A	2020	12	€	500

Source: &P Global Market Intelligence's CreditPro, Bloomberg, Global Capital Markets

We note that there have been a range of airport operators who have successfully issued in the public bond markets throughout the pandemic and into 2022 which demonstrates that access to these markets is good for investment grade rated borrowers issuing senior, unsecured corporate debt in the sector.

Its noteworthy that issuances by airports had been achieved when metrics fell below threshold levels such as those published by S&P. However, it could be interpreted that funders, like S&P, may be of the opinion that results published during the pandemic were not reflective of the long-term equilibrium of the industry. Funder's internal assessment of ratios may have also taken a forward-looking approach, similar to those assessed by S&P. Therefore, in evaluating successful issuers ratios, we have assessed those issuances which pre-date the pandemic. We note, although it could be interpreted that ratios falling below threshold levels during a time of crisis for essential transportation infrastructure such as

airports may not limit financeability in its entirety, this is generally when the consensus believes those entities will return to their pre-crisis levels. Table 5.2 below is an extract from our 2019 report.

Table 5.2: Peer Issuance Analysis

Issuer	Issuer Ratings (current)	Currency	Amount (€m)	Issue Date	Term (yrs)	FFO/Debt*	Debt/Ebitda*
Daa	A-	€	400	2016	12	36.9%	2.23
Aerports de Paris	A+	€	500	2018	10	32.5%	2.4
Aerports de Paris	A+	€	500	2017	10	30.0%	2.4
Aerporti de Roma	BBB+	€	500	2017	10	29.8%	2.3
Avinor	A1/AA-	€	500	2017	10	12.2%	6.4
Avinor	A1/AA-	€	300	2015	10	15.5%	4.8
Brussels Airport	Baa1	€	300	2017	7	14.1%	4.1
Zurich Airport	AA-	CHF	350	2017	12	74.9%	0.8
Heathrow	A-	€	650	2019	15	--	--
Heathrow	A-	CAD\$	400	2018	14	11.4%	8.3
Heathrow	A-	A\$	175	2018	10	11.4%	8.3
Heathrow	A-	€	500	2017	15	11.2%	8.7
Gatwick Airport	Baa1	£	300	2018	30	10.7%	6.1
Manchester Airport Group	Baa1	£	350	2019	25	--	--
APAC (Melbourne) Airports	BBB+	NOK	1500	2016	14	9.0%	6.0
APAC (Melbourne) Airports	BBB+	AUD\$	197	2016	10	9.0%	6.0
Sydney Airport	Baa1/BBB+	€	500	2018	10	7.2%	9.5
Sydney Airport	Baa1/BBB+	\$	900	2016	10	8.9%	7.1

Source: S&P Global Market Intelligence's CreditPro, Bloomberg, Global Capital Markets

Note: Financial Ratios are based on financial statements as at the year of issue based on calculations for same by S&P or Bloomberg

As noted in our previous report, prior to the onset of covid, we saw that there were a number of airports within the category of privately owned airports that have issued longer dated bonds (10 to 30 years) when their financial ratios were at levels lower than 13% on a FFO / Net Debt and higher than 6 times Debt / EBITDA, whereas the government owned issuers have typically issued in tenors of 7 to 10 years and generally have FFO / Net Debt levels

exceeding 13% and Debt / EBITDA ratios of less than 5 in the year of issuance. This suggested that it's possible to differentiate between these two sub-categories with private issuers demonstrating a risk appetite for higher gearing relative to their government owned peers. We noted that all these issuers had credit ratings of BBB+/Baa1 or above (which is the rating after the GRE application) and issuance sizes smaller than the typical €500m benchmark size is not unusual for the sector.

Given its sovereign ownership, Dublin Airport is also likely to be attractive to debt funders who are looking for opportunities to invest in the Irish market and therefore we also assessed issuance amongst its public sector peers to assess market demand for those types of credits.

Table 5.3: Public Sector Peer Issuance Analysis

Issuer	Sector	Issuer Ratings (current)	Currency	Amount (€m)	Issue Date	Term (yrs)	FFO: Debt	Debt / Ebitda
Daa	Infra/Transport	A-	€	500	2020	12	-17.34%	-6.38x
Daa	Infra/Transport	A-	€	400	2016	12	36.90%	2.23x
ESB	Utility	A-	€	500	2022	22	--	--
ESB	Utility	A-	£	325	2020	15	18.70%	4.30x
ESB	Utility	A-	€	100	2019	25	--	--
ESB	Utility	A-	€	700	2019	25	18.70%	4.39x
ESB	Utility	A-	€	500	2018	15	16.30%	4.50x
ESB	Utility	A-	€	500	2019	21	--	--
GNI	Utility	A	€	300	2019	5	19.14%	4.56x
GNI	Utility	A	€	500	2016	10	25.00%	3.30x
GNI	Utility	A	€	125	2016	20	25.00%	3.30x
Northern Ireland Electricity	Utility	BBB+	£	350	2018	7	15.80%	4.60x

Source: S&P Capital IQ, Global Capital, Bloomberg

ESB, including its subsidiary North Ireland Electricity and GNI as well as the Irish government itself¹⁹ have issued in public bond markets in recent years. Generally, issuance by the most active participants in the market have been well received.

Generally, daa plc credit spreads imply a credit risk premium to the regulated gas and electricity semi-state utility issuers. More recently it could also be observed that where Brexit and economic growth concerns have led to spread widening in Ireland sovereign debt, it has led to a bigger impact on the daa plc's spreads than the other utilities which we have taken into account in our analysis. We would note that trading volumes in daa bonds are low and therefore this spread widening likely represents a market view on pricing and not necessarily levels that were transacted.

¹⁹ We have limited our review to 10-year benchmark issuance in recent years as the most relevant indicator of market appetite

Other debt funding

There are many other markets where daa plc can issue debt, for example through European private placements (“PPs”), US private placements, bank financing market, and sovereign funds and development banks e.g. the EIB where it agreed a €350m loan facility which was drawn down in 2020.

Historically, the European private placement markets may have seemed unattractive due to a requirement for a greater number of bespoke covenants relative to public bond issuance. However, institutional investors are increasingly competitive in debt markets, especially when underpinned by long dated, cashflow generative assets and have lent significant amounts of debt to infrastructure and government related borrowers in recent years.

6 Conclusions

Based on our analysis of credit factors, both quantitative and qualitative including scenario analysis, combined with our market analysis we conclude the following in relation to the financeability of the price determination:

- The regulatory settlement should allow for a minimum credit rating of BBB+.
- Whilst running various downside scenarios which a funder may consider, we also believe in order to maintain sufficient headroom and to assist with ensuring financeability throughout the full regulatory period, CAR could aim to allow for a minimum target Net Debt / EBITDA ratio of 5.0 times or less, whilst similarly aiming for an FFO / Net Debt in the mid-teens.

Standard and Poor's do not provide a credit rating for the regulated entity but, by considering the components of its ratings methodology for Business Risk Profile, it is reasonable that its Business Risk Profile may also be assessed as "strong" and when combined with the Financial Risk Profile, funders may assess the standalone credit profile ("SACP") of the regulated entity as within the 'a-/bbb+' rating category. Given its GRE status and the benefit that many funders are also likely to attribute to government ownership, it is likely that a BBB+ SACP credit rating could continue to provide access to the widest range of funders when taking into account the current resulting A- credit rating that could be implied following the GRE uplift.

- Whilst our review of forecasts based on the Commission's data would not lead us to immediately conclude that a BBB+ rating is likely to be breached, we note that funders will also give consideration to the level of financial ratios in downside scenarios and both FFO/Net Debt and Debt/ EBITDA measures in the base case could be considered to be at tight levels in the later years of the price determination.
- When doing so, they may have a concern that financial ratios with respect to gearing have insufficient headroom for downside scenarios which could impact their appetite for funding over the pricing period. In addition, CAR is setting a price cap for a 4-year period and we note that market conditions remain subject to change. Therefore, there is a risk that funder appetite at these levels may not persist over the full pricing period during which Dublin Airport will need to raise new debt.
- To increase confidence that Dublin Airport should be able to raise the full requirement for c.€1bn of new debt to fund a significant programme of capital expenditure forecast over the pricing period, to take account of both company specific adverse scenarios and in a potentially deteriorated debt market, CAR should consider enabling a path to Dublin Airport achieving an FFO/Net Debt above 15%, and a Net Debt/EBITDA of less than 5.0x in the later years of the forecast period.

The rationale for the above-mentioned headroom and associated thresholds is to increase confidence that funders will lend of the required level of new debt over multiple fundraisings required in order to fund a significant programme of capital expenditure forecast. This

headroom would be designed to address funder downside scenarios and mitigate against adverse market conditions and other developments beyond Dublin Airport's control. These metrics would also place Dublin Airport more in line with the peer group of other airport issuers seen in the bond markets in recent years.

However, we note these conclusions are based on the various building block inputs for the Third Interim Review of the 2019 Determination on Airport Charges at Dublin Airport for the period 2023 to 2026. Similarly, the forecasted figures which are assessed as part of this report have not been adjusted for financeability, which we understand remain subject to change before the draft determination based on a series of factors, including the output of this report. Furthermore, they do not allow for other levers within Dublin Airport's control that could be used over the period to enhance credit ratings and financeability to reduce the quantum of new debt required as discussed previously.

Other considerations:

Whilst we recommend that the final price determination enables the achievement of FFO / Net Debt above 15% and Net Debt / EBITDA below 5.0x to protect against reasonable downside and to provide confidence to debt providers to fund the allowed capital programme, we note that the Commission could consider introducing an interim review. This review would assess the outturn performance and projected capital expenditure in the context of market conditions at that time for the purpose of determining whether the Financeability adjustment is still warranted in the latter years and disallowed from that time forward if not. For example, this could be implemented as a form of trigger which is used following an assessment for delays in capital expenditure which changes the overall debt requirement over the remaining period. In this way, funders would be provided comfort that there is sufficient headroom in the future financial ratios when lending new debt in the early years. Whilst beyond the scope of this report, it is important to have the correct lever applied when doing this review to ensure the balance it maintained between funder certainty and also ensuring appropriate incentives to maintain an efficient operator.

Any final adjustment for financeability will need to be recalibrated based on the final building blocks and resulting price based on same before the final determination.

Appendix 1

Low Volatility Benchmark Table

	--Core ratios--		--Supplementary coverage ratios--		--Supplementary payback ratios--		
	FFO/debt (%)	Debt/EBITDA (x)	FFO/cash Interest (x)	EBITDA/Interest (x)	CFO/debt (%)	FOCF/debt (%)	DCF/debt (%)
Minimal	35+	less than 2	More than 8	More than 13	More than 30	20+	11+
Modest	23-35	2-3	5-8	7-13	20-30	10-20	7-11
Intermediate	13-23	3-4	3-5	4-7	12-20	4-10	3-7
Significant	9-13	4-5	4-5	2.5-4	8-12	0-4	0-3
Aggressive	6-9	5-6	5-6	1.5-2.5	5-8	(10)-0	(20)-0
Highly leveraged	Less than 6	Greater than 6	Less than 1.5	Less than 1.5	Less than 5	Less than (10)	Less than (20)

Source: S&P Global Ratings

Appendix 2

Peer Group Analysis

daa plc as an airport operator is generally classified within the infrastructure and transport sector alongside a number of airports across the UK, Europe and globally whose principal line of business is the operation and maintenance of airports and in many cases are subject to regulatory tariffs or licences that limit the prices they can charge to airlines and/or passengers. For our peer group comparison, we have considered only companies that carry credit ratings and access debt funding markets.

Across this group, there is a large variation in size of the entities with the larger airports such as Heathrow, Schiphol and Aéroport de Paris benefiting from reduced volume risk due to their positioning as major transport hubs, others such as Norway and Aena which operate a large network of airports and other smaller operators such as daa plc and Brussels which are largely reliant on single assets and exposed to a greater extent to the domestic economy and the performance of individual airlines.

This larger group of airports can be categorised into two further sub-groups according to ownership – state owned or private. Generally, the “private” airports adapt different shareholders policies and capital structures, including ring fencing of regulated / operational company assets for debt structuring e.g. Heathrow and Gatwick. Amongst the state owned airports we have considered within the peer group assessment, there are also significant differences across the sub-category according to government ownership levels (e.g. daa plc, Avinor and Schiphol are 100% government owned, Aéroport de Paris (“ADP”) and Aena are majority government / public sector owned, while Brussels Airport, Zurich Airport, Copenhagen Airport and Aéroport di Roma have a minority government / public sector ownership beside private investors) but generally are operated for profit maximisation rather than for public benefit.

Given Dublin Airport’s Irish government ownership, it can also be considered within the public sector entity category alongside ESB and Gas Networks Ireland (“GSNI”) as Irish government owned companies that are subject to regulation and carry a credit rating / issue debt on bond markets. More broadly this could also put daa plc into the same category as other public sector European utilities such as Snam, Gasunie and Verbund.

Whilst we refer to the regulatory framework of other utility sectors such as the water and energy sectors in the UK within our report and highlight state owned utilities above, we note that generally companies within those sectors are not considered directly comparable to airports such as daa plc by rating agencies and funders as they have a different risk profile. This is because they typically do not face volume risk and in the case of UK utilities tend to have private ownership structures. Therefore, we do not include them for peer group analysis purposes.

Name	Location	Credit Rating	Government / Public Sector Ownership
daa	Dublin	A-	Majority
Aena	Spain	A3*	Majority
Aeroporti Di Roma	Italy	BBB-	Minority
Avinor	Norway	A	Majority
Brussels Airport	Brussels	BBB+	Minority
Copenhagen Airport	Denmark	Baa2	Minority
Paris Aéroport	France	A	Majority
Schipol	The Netherlands	A	Majority
Zurich Airport	Switzerland	A+	Minority
Brisbane Airport	Australia	BBB	No
Gatwick	UK	BBB	No
Heathrow	UK	BBB+	No
Manchester Airport Group	UK	BBB	No
Melbourne Airport	Australia	Baa1	No
Perth Airport	Australia	Baa2	No
Sydney Airport	Australia	Baa1	No
ESB	Ireland	A-	Yes
Gas Networks Ireland (GNI)	Ireland	A	Yes
SNAM	Italy	BBB+	Yes
Gasunie	The Netherlands	AA-	Yes
Verbund	Austria	A	Yes

Note: Based on S&P credit ratings where available, otherwise Moody's or Fitch ratings are provided

Source: S&P Capital IQ, Global Capital, Bloomberg, Moody's, Fitch



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