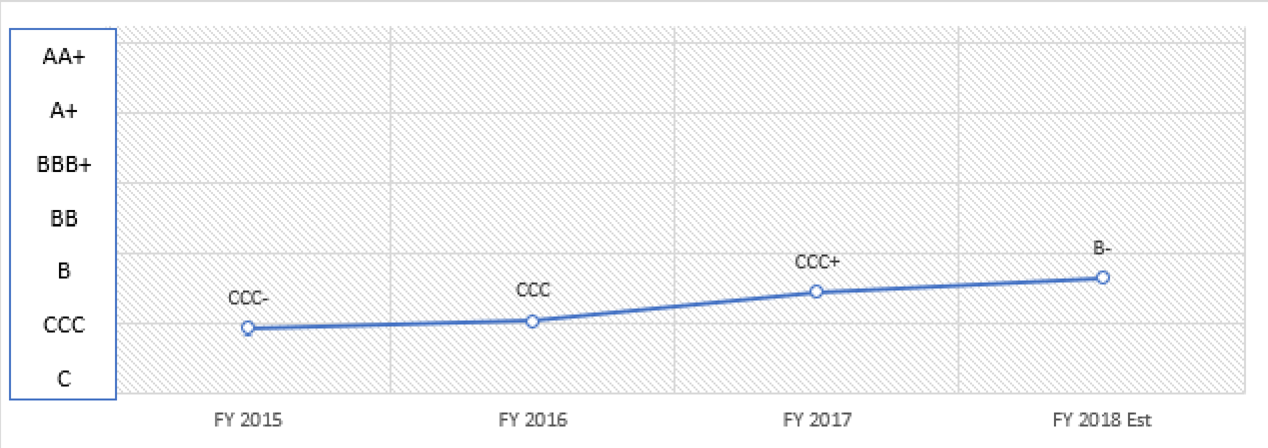
Country	**Portugal**
Alliance Membership	**Star Alliance**
Business Model	**Full-Service Carrier**

Ishka View for 2018	Financials	Traffic Growth (RPKs)	Yields	Macroeconomic Indicators	Competition
	V	Λ	—	Λ	—

Ishka Credit Score



Source: Ishka calculations and Airline financial statements

Note: Consensus estimates were not available at the time of writing. As such, we have estimated a 'proxy' Ishka Score for FY 2018 using a combination of the airline's past historical performance, its general & financial outlook. Please refer to Ishka's Approach & Methodology for explanatory notes on the Ishka Credit Score and the Ishka View for 2018 and its colour coding.

Ishka Scorecard

	FY 2015	FY 2016	FY 2017
Liquidity	B	B	B
Leverage	C	C	CCC
Gearing	C	C	C
EBITDAR Margin	B	B+	BB
Average Age	C	CCC-	CCC
Load Factors	A	A	A+
Ishka Credit Score	**CCC-**	**CCC**	**CCC+**

Source: Ishka calculations and Airline financial statements

Note: Scores for individual financial and operational indicators are added together using a weighted-sum technique to derive one single score, Ishka Credit Score.

Financial Summary for TAP Group

Summary Financials for Yr Ending	31-Dec-16	31-Dec-17
Income Statement		
Total Revenues USDm	2,715	3,480
Increase/Decrease	-4.9%	28.2%
EBITDAR margin	8.2%	13.7%
Net profit margin	-1.0%	0.8%
Balance Sheet		
Balance sheet debt USDm	1,180	1,033
Adjusted net debt USDm	2,330	2,957
Adjusted net debt/EBITDAR	10.4x	6.2x
Adjusted net debt/Equity	Neg. Equity	Neg. Equity
Cash & marketable securities (liquidity) as % of total revenues	6.6%	5.7%
No. of months liquidity to cover EBITDAR expenses & aircraft rental	0.81 months	0.73 months
Operational & Per-unit Data		
RPKs*	31,648	37,180
Increase/Decrease	-3.9%	17.5%
ASKs*	37,019	42,863
Increase/Decrease	-4.2%	15.8%
Load Factor*	85.5%	86.7%
Breakeven load factor	85.8%	83.4%
Passenger Revenue per RPK (Pax Yield) USD cents	7.9071	8.6035
RASK (Unit Revenues) USD cents	7.3341	8.1192
CASK (Unit Cost) USD cents	7.3616	7.8099
RASK-CASK Margin USD cents	-0.0275	0.3093
No. of Passengers ('000)	11,698	14,225
Revenue per Passenger USD	214	225

Source: Ishka calculations, Airline financial statements and OAG. *TAP does not publish traffic statistics. These numbers have been sourced from OAG.

Performance Review

At first glance TAP's financials appear weak, however while this may be the case, the improving trend is encouraging. There has been a healthy improvement in the key financial metrics owing to robust economic conditions, recovering yields and restructuring.

The standalone results for the airline business were even stronger, having posted a net profit of nearly EUR100m during 2017.

2017 delivered robust revenue growth across all key businesses. Thanks to a reorganised fare structure along with improving macroeconomic conditions, TAP's yields and unit revenues also recorded an uptick in 2017.

TAP's balance sheet remains extremely weak. The airline remains highly leveraged despite the debt restructuring and recapitalisation. Equity, too, remains negative due to the accumulated losses.

The airline's cash balances are also not very encouraging and in the event of weaker cash flows from operating activities the carrier could struggle with liquidity.

TAP is exposed to fuel price and currency fluctuations. It does not have any fuel hedges and its non-euro operations and operating leases are susceptible to foreign exchange movements.

Impact Intelligence

TAP appointed a new CEO, Antonoaldo Neves, in January 2018 (see Management Review). The airline now provides services to 48 European destinations, as well as to 33 destinations in North and South America as well as to Africa.

Fleet Analysis

The table below provides a summary of the TAP Air Portugal fleet.

Aircraft Type	Current Fleet	Average. Age (Yrs)	On Order	% Leased	Lessors
A319-100	21	19.0	-	90%	AerCap, Alpiarca, ACG, AerCap, Seraph, World Star
A320-200	20	14.1	-	95%	AerCap, Aergen, Aircastle, Avolon, Alpiarca, CDB, Macquarie, Showa
A320-200neo	1	0.3	15	-	
A321-200	4	16.3	-	100%	ALC, Showa, SMBC
A321-200neo	-	-	14	-	
A321-200neoLR	-	-	10	-	
A330-200	14*	15.7	-	100%	AerCap, Castlelake, Doric, GECAS
A330-300	4	9.5	-	100%	Aircastle
A330-900neo	-	-	16	-	ALC
A340-300	4	23.3	-	100%	Aircastle
ERJ190-100LR	9	6.8	-	100%	ALC, NAC
E195AR	4	6.2	-	100%	
ATR 72-500	1	12.4	-	-	Operated by White Airways
ATR 72-600	8	2.8	-	-	Operated by White Airways
Overall Total	90		55		

**Includes one aircraft recently parked and believed to be returning to lessor* *Source: CAPA Fleets Database*

TAP began a cabin overhaul of its Airbus single-aisle fleet beginning in 2016, which involved the installation of slim-line seats supplied by Recaro. The front of the cabin has the BL3530 seats which can have the middle seat 'blocked'; while towards the back of the cabin, the SL3510 seats is used. A divider can be used to differentiate the two 'classes'. In addition, the G2 galley has been removed. This has resulted in the A319's capacity going up from 132 to 144 seats, the A320 from 162 to 174 seats and the A321 from 200 to 216 seats.

Although not all A319s were delivered new to the airline (some are ex-Air Canada), research indicates that the aircraft have a single over-wing exit. They are powered by CFM56-5B5 engines which incorporate the /P build package.

The A320s are also CFM56-5B-powered; some aircraft have the /P engine, and others the /3 build standard. One aircraft (CS-TQD) is thought to retain DAC engines, as it originally flew with Swissair/Swiss. It is understood that 5 aircraft have been retrofitted with Sharklets.

The A321 are, again, CFM56-5B-powered. None of the aircraft are believed to have Sharklets fitted, rather retaining the original wingtip fences. The A321neo currently on order are to be CFM LEAP-1A powered. The first batch of aircraft are believed to have the 'traditional' 4 exit-door arrangement, while latter aircraft will be in ACF (Airbus Cabin Flex) configuration when the airline begins to take the 'LR' variant. This ACF door layout is due to become the A321neo baseline standard configuration from 2020. The 'LR' aircraft will feature 175 seats.

The airline's A330-200 aircraft consist of two batches. The earlier 1990s vintage aircraft are ex-Austrian Airlines, with two originally being Airbus testbed aircraft and are PW4168A-powered. Later aircraft, built in the 2000s, some of which are ex-TAM, are GE CF6-80E1-powered and are believed to be the A4B variant. All A330-200s have an A-A-I-A exit door configuration, which allows a maximum exit capacity of 375.

It has refurbished the cabins of the seven younger aircraft to provide consistency of product with the A330-900neos the airline is due to begin receiving in the latter half of 2018. This has involved the installation of new seating that, while not offering a true Premium Economy class product, this cabin now offers extra legroom economy seats with new comfort options on the seat. The A330neo aircraft will feature the 'Airspace' cabin. The airline is scheduled to be the launch operator of the A330neo, and, thus, will be accepting some of the early build aircraft.

The A330-300s are ex-Singapore Airlines and are RR Trent 700-powered. They are configured in a dual-class layout. The aircraft have an A-A-I-A exit door configuration. As with the -200 series, this limits the maximum exit capacity to 375.

The Embraer 190s were originally operated by TRIP Linhas Aéreas (subsequently Azul). It is believed that the configuration of the aircraft has remained unchanged, being a single-class arrangement with 106 seats. The aircraft are not equipped with IFE or wi-fi.

2018 Delivery Profile

Type	Approx No.	Value	Remarks
Airbus A320neo	1	$50m	First of 15 was delivered in April 2018. 3 more due in 2019
Airbus A321neo	4	$220m	First four of 12 due in 2018, with 3 more in 2019
Airbus A321neoLR	2	$110m	2 due at the end of 2018, with 4 more in 2019
Airbus A330neo	7	$770m	7 due in 2018 and 10 in 2019
Total	14	$1,150m	

TAP has commenced a comprehensive overhaul of its fleet. 53 Airbus aircraft were ordered shortly after privatisation for delivery between 2018 and 2025, which are being supplemented with up to another 18 aircraft on operating lease from lessors own order books, including BOC Aviation and ALC.

1 A319 and 1 A320ceo are also being added on short term operating lease until 2019, pending arrival of more A320neos.

The first A320neo for TAP arrived in April 2018. Up to 4 A321neos are also expected on lease in 2018, to be followed by three more from TAPs own orderbook in 2019. The first two long range A321neoLRs are also expected in the 4th quarter of 2018.

TAP is scheduled to be the first airline to fly the A330-900neo (featuring Airbus' Airspace cabin interior). Deliveries of all 17 A330neos on order (direct or on lease) are due by the end of 2019.

Country and Regional Risk

From a macroeconomic perspective, Portugal has been witnessing a wide-ranging economic recovery with the country posting a GDP growth of 2.7% during 2017, up from 1.6% in 2016, which was not only the highest in 17 years but also better than the euro area average.

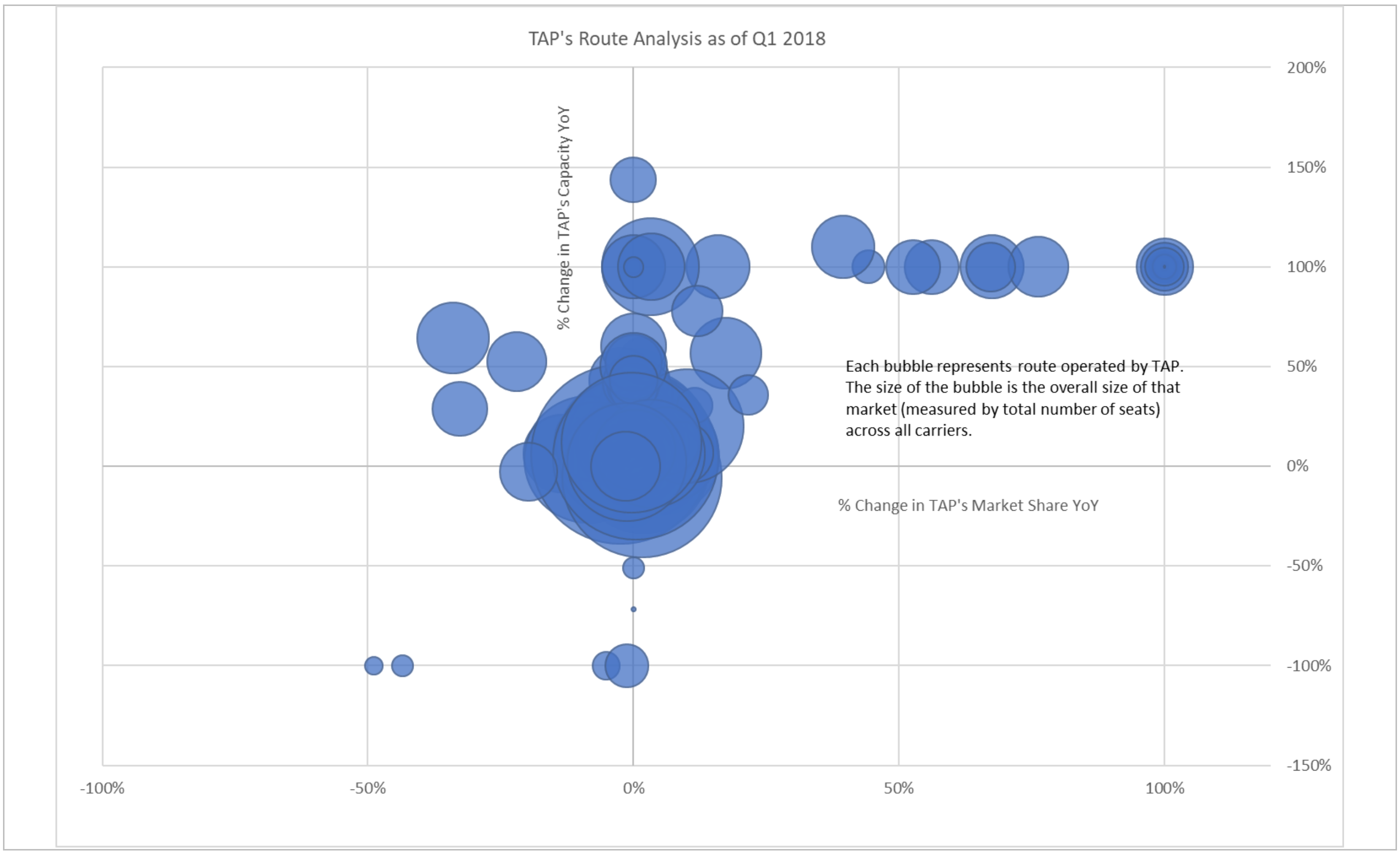
The key economic fundamentals have seen a meaningful improvement and are expected to remain robust. In the absence of any major exogenous shock, the country's macroeconomic outlook is positive. Although the pace of growth might not remain as robust as it has been, the expectation is that the recovery will continue through 2018. A favourable and more accommodative monetary approach by the European Central Bank also limits credit risk to the country's banking sector. More importantly, the boom in tourism, which has become a mainstay of the Portuguese economy over the recent years, is a further positive for aviation in the country. The country has also managed to remain undented by major terrorism-related incidents which has further attracted tourists driven away from other tourists hotspots. Politically too, there appear to be limited concerns. Structural changes by the current government have played an important part in improving Portugal's macroeconomic fundamentals.

The economy is, however, not without its challenges particularly the need for additional structural reforms. Debt also remains a major concern as both public and private debt is at uncomfortably high levels.

In Brazil, a key market for TAP, a macroeconomic recovery is underway following the improved political landscape and a rebound in commodity prices and currency values relative to the lows seen two years ago. As per the Brazil 2018 survey published by the OECD, Brazil's economy expanded in 2017 for the first time since 2014. Although the recovery remains fragile and there are still numerous challenges, there is a general optimism among Brazilian executives and barring any major external shock, Brazil's economy is expected to continue to improve.

In Europe, overcapacity, intense competition and the threat of terrorism-related incidents remain a major challenge for the region's airlines, however, the collapse of airberlin, Alitalia, VIM and Monarch Airlines within months of each other augurs well for the healthier airlines in the region - the failure of weaker carriers should help to consolidate some of the excess capacity. The impact of terrorism-related incidents seen during 2016 was diminished in 2017 – as a result traffic has been stronger, compared to 2016. On a macroeconomic front too, there has been a positive trend and an acceleration in economic activity.

Route Network Analysis



Source: OAG and Ishka Calculations. Indicator of bubble size/market size - The largest bubbles represent around 400,000 seats, medium-sized bubbles are around 50,000 seats and the smaller ones are less than 30,000 seats. Seat counts are for the quarter - Q1 2018.

TAP has been undergoing a major route and network optimisation. The airline has been scaling back on loss-making routes and instead adding more flights between Europe and the Americas. Brazil has traditionally been a key market outside of Europe due to the historical ties between the two countries and the macroeconomic recovery in Latin America's biggest economy augurs well for the carrier. TAP increased its capacity between Brazil and Portugal by 14.4% between Q1 2017 and Q1 2018. The airline is also exploring further code-share arrangements in Brazil and there has also been speculation of a possible joint venture between Azul and TAP.

The chart suggests TAP has been making modest changes to its capacity deployment. Although there are some city pairs that saw significant changes, including a few new routes, the clustering of the majority of the bubbles near the centre of the chart suggests moderate changes. The chart also shows that TAP was able to capture a healthy market share (more than 50%) on a number of new city pairs that it started serving between Q1 2017 and Q1 2018. The majority of the new city pairs were to Germany, Spain, Austria, Hungary, Morocco, UK and Canada.

Being based in Europe means the carrier is exposed to intense competition, particularly from the LCCs. Four of TAP's top five competitors are LCCs which include Ryanair, easyJet, Vueling and Norwegian. However, data suggests that TAP maintains an overall healthy lead over its competitors in its markets. During the year, TAP exited some smaller city pairs where a limited amount of the carrier's capacity was deployed.

Cape Town Convention Coverage

TAP operates out of Portugal which has acceded to the Protocol To The Convention On International Interests In Mobile Equipment On Matters Specific To Aircraft Equipment. Apart from domestic operations, the carrier operates a number of flights to countries within Europe and to Brazil, the USA and Canada, all of which have either signed/acceded/ratified the aircraft protocol. Around 4% of its total capacity is deployed to countries that are yet to sign/accede/ratify the aircraft protocol.

Management Review

Antonoaldo Neves was appointed TAP's CEO in January 2018. He replaced Fernando Pinto who was the airline's CEO for 17 years and had played an important role in the recovery seen so far. It is understood that Pinto's term had come to an end but he will continue to be associated with TAP for a few more years.

Neves was TAP's Chief Commercial Officer immediately prior to becoming the CEO. Before that he served as Azul's CEO (an airline that has a close relationship with TAP – see Group Structure) for a period of four months between April and July 2017. He became involved with Azul during its integration with TRIP, serving as a Member of the Board of Executive Officers between October 2014 and July 2017. Neves was a partner at McKinsey and led the merger process. Neves has extensive experience in other aviation and infrastructure projects.

TAP also benefits from the presence of an experienced aviation professional in the form of David Neeleman, who is also one of the airline's major shareholders (see Shareholding). Having founded and run several successful airlines, Neeleman's oversight and control over TAP is a significant positive for the carrier.

Shareholding Register/Group Structure

In addition to air transport, the TAP Group is also involved in other aviation-related activities such as MRO, catering and handling services. TAP's regional operations are now consolidated under a new brand, TAP Express, which also covers ACMI services provided by White Airways.

At the end of 2017, TAP was 50% owned by Parpublica-Participacoes Publicas (SGPS), 45% by Atlantic Gateway and the remaining 5% by its employees. SGPS is a 100% Portuguese state-owned holding company, while Atlantic Gateway is consortium of investors that includes seasoned aviation entrepreneur, David Neeleman (through his US-based company DGN corporation), HPGB SGPS SA, which is part of the Portuguese Barraqueiro group controlled by Humberto Pedrosa, and HNA Group, through Hainan Airlines.

In addition, Neeleman's other Brazilian low-cost airline, Azul, has invested EUR90 million in (Series A) bonds issued by TAP. The investment, which is secured by an interest in TAP's loyalty programme, is convertible into TAP equity securities and represents 6% of TAP's total share capital and voting equity securities on a fully diluted basis. Series B bonds of the same issue, amounting to EUR30 million have been subscribed by Parpublica.

Originally, as part of the privatisation in 2015, Atlantic Gateway purchased 61% of TAP for EUR10 million. However, in the following year, the newly instituted Socialist Government in Portugal decided to unwind the privatisation and increased its stake from 34% to 50%. As per the terms of the deal between the investors and government, the day-to-day management of the airline was left with Atlantic Gateway although the state has the final say over strategic decisions. The state will also get to decide the Board Chair while the management team's appointment will be decided by the investors.

Over time, the ambitious Chinese conglomerate, HNA Group, has also become involved in TAP by picking up stakes in Atlantic Gateway. It held an 11.5% stake in Atlantic at the end of November 2017. HNA, through Hainan Airlines, also controls around 21.7% (as of 12th March 2018) economic interest in Azul making it the single largest percentage of economic interest in the carrier.

The consortium has been supportive of TAP's restructuring, having invested in the airline's fleet cabin upgrade programme. The consortium also injected EUR150 million and EUR70 million of capital contributions during 2015 and 2016 in TAP. This has helped the airline to restructure and renegotiate its short-term debt by extending its maturity date and lowering the cost of such debt.

Although not imminent, an IPO could be on the cards in 2-3 years' time from now.

ishka View

TAP appears to have made tangible progress in the restructuring exercise over the past three years. The key financial metrics are on an improving trajectory and the airline has also managed to return to the black. The air transport business, in particular, is performing well – 2017 was the second year of profitability for the air transport business. Operationally, 2017's statistics for capacity utilisation, yields, RASK-CASK margin were also fairly encouraging.

Renewed product – Following the privatisation, TAP has been undergoing a major fleet renewal exercise which saw the airline ordering several new aircraft and also retrofitting some of its existing aircraft. The entry of the more efficient and higher capacity aircraft in the fleet should help to unlock additional efficiency gains. TAP has also benefitted from gains on sale leaseback transactions, recording gains of EUR17.8 million and EUR16.2 million during 2017 and 2016, respectively.

Against a robust macroeconomic backdrop, not just locally in Portugal but also in nearly all of TAP's key markets such as Europe, Brazil and North America - the airline has strategically shifted its focus to these regions and a favourable macroeconomic prospect augurs well for the airline's future recovery.

Although TAP's financial metrics are still critical, a majority ownership by a government that is presiding over a rapidly improving economy and the presence of a major shareholder (Neeleman) that has not only been supportive but also has extensive industry expertise places the airline in a favourable position going forward. Employee ownership is also a positive – it means that employees have a personal interest in ensuring the airline's healthy recovery.

The increase in government stake suggests that the socialist government treats TAP as an important state asset. Allowing the investors to handle the day-to-day management is a prudent step and already appears to be having an effect on its performance indicators. However, there is also a risk whether the government might push for increasing its stake in the future which could cause some frictions between the shareholders. There is no indication at this stage that this might happen.

Legacy financial issues – Although credible progress has been made, legacy financial issues mean that the airline's key financial metrics, especially the balance sheet, still remain fairly critical. The MRO business, particularly the one in Brazil, continues to be drag on the group's profitability having recorded a net loss of EUR50 million during 2017.

78% of TAP's balance sheet debt as of December 2017 was on a floating rate. Interest rates have been stable and at record lows for a very long period, but they are likely to start trending upwards in the coming years. A 0.5% rise in interest rates would push up the debt servicing costs by EUR10 million.

The competitive scenario is extremely challenging in Europe, especially in Western Europe which is dominated by LCCs such as Ryanair and easyJet. Ryanair has aggressive plans to expand its services to Portugal presenting a substantial challenge to an airline like TAP. And the rise of low-cost long-haul carriers also threatens to eat into TAP's transatlantic ambitions.

Rising crude oil prices – Although this would affect the industry universally, an airline like TAP is more vulnerable due to its fragile recovery, a weak balance sheet and no fuel hedges. A 10% rise in jet fuel prices would impact its income statement by nearly EUR58 million. The induction of fuel-efficient aircraft will help to alleviate those concerns to some extent.

Currency risks – TAP is also exposed to currency fluctuations as a substantial portion of its operations are denominated in non-euro currencies, particularly in the Brazilian real and the US dollar. From a balance sheet perspective, only 14% of the total debt is denominated in the US dollars (non-euro currencies) however nearly 58% of its total fleet is on operating lease.

TAP has a substantial portion of its cash (EUR41.6 million as of Dec 17) locked in Angola which is proving challenging to repatriate. It has also invested in Angola's treasury bonds worth nearly EUR80 million. TAP plans to use the cash deposit to pay for local operations.

IFRS 16 – TAP is estimating a material impact to its financial statements as a result of IFRS 16.

Ishka Credit Score - Approach & Methodology

The Ishka Credit Score is an indicator of the financial health of an airline. The model assesses airlines using six critical measures, which include financial indicators such as: liquidity, leverage, gearing, and EBITDAR margin; and operational indicators like average fleet age and load factors. These different financial and operational indicators are combined to derive one single score that is mapped to a scale ranging from AAA to C (from strong to critical financial health). Scores are calculated for four years – two historical and two future years (where available), allowing readers to understand the likely movement in the financial health of an airline and compare that to its historical performance. It should be noted that these scores are intended to illustrate trends (and magnitude) in the direction of performance and are not intended to be predictors of default or bankruptcy.

Data Sources

Historical data is sourced directly from airline financial statements. Forward-looking data, where available, is sourced from consensus analysts' estimates compiled by Bloomberg. All raw financial data is fed into a standard financial template in-order to ensure comparability across airlines.

Approach

- Liquidity is calculated as all liquid cash resources, which includes unrestricted cash as well as marketable securities with short-term investment horizons, as a percentage of an airline's annual revenues
- Leverage = Adjusted net debt divided by annual EBITDAR ($\frac{Adjusted\ net\ debt}{EBITDAR}$)
- Gearing = Adjusted net debt divided by total equity ($\frac{Adjusted\ net\ debt}{Total\ equity}$)
- Adjusted net debt is balance sheet debt plus capitalised lease rentals (capitalised using a factor of 8) minus all liquid cash resources
- EBITDAR is earnings before interest, tax, depreciation, amortisation and rent (aircraft lease)
- Using a proprietary scaling & scoring system developed by Ishka using its deep industry expertise, each of the above-mentioned measures is given a quantitative score
- All individual scores are then added together using a weighted-sum technique as all measures are unique and have varying impacts on an airline's financial health. The final numerical score has a corresponding alphabetical score developed using a standardised naming convention, which makes the scores easy to interpret

Ishka Credit Score Scaling System		
Ishka Credit Score	**Financial Health**	**Overall Assessment**
AAA	Strong	Investment grade
AA+		
AA		
AA-		
A+		
A		
A-		
BBB+	Stable	
BBB		
BBB-		
BB+	Adequate but some concerns	High-yield/Non-investment grade/Speculative
BB		
BB-		
B+	Weak	
B		
B-		
CCC+	Critical	
CCC		
CCC-		
CC		
C		

Disclaimer: Ishka Credit Score does not constitute any form of advice, recommendation, representation, endorsement or arrangement by Ishka and is not intended to be relied upon by users in making (or refraining from making) any specific investment or other decisions.

How to read the different parameters in the 'Ishka View for 2018' section

Ishka has summarised the 'Ishka View for 2018' in terms of the following five attributes:

- Financials – The airline's financial strength
- Traffic Growth (RPKs) – The airline's anticipated traffic growth performance
- Yields – Will yields be strong, stay stable or decline?
- Macroeconomic Indicators – The overall macroeconomic situation in the airline's base market
- Competition – The competitive scenario in the airline's key markets and its relative position in those markets (Green would mean limited competition with the airline being in a very dominant position and Red would mean an extremely competitive market with no single dominant player)

How to read the colour codes in the 'Ishka View for 2018' section

The colour coding is not relative to the current period but reflects our view of the absolute position in the future.

Green - Healthy/Strong
Yellow - Stable/Manageable pressures, if any
Red - Weak/Declining