THE IMPACT OF THE COVID-19 ON THE AIRLINE INDUSTRY AND A PATH TO RECOVERY

22/04/2020

THE LAST DAYS OF MARCH HAVE SEEN THE AIRLINE INDUSTRY ENTERING THE BIGGEST CRISIS EVER EXPERIENCED

Traffic compared to the year before

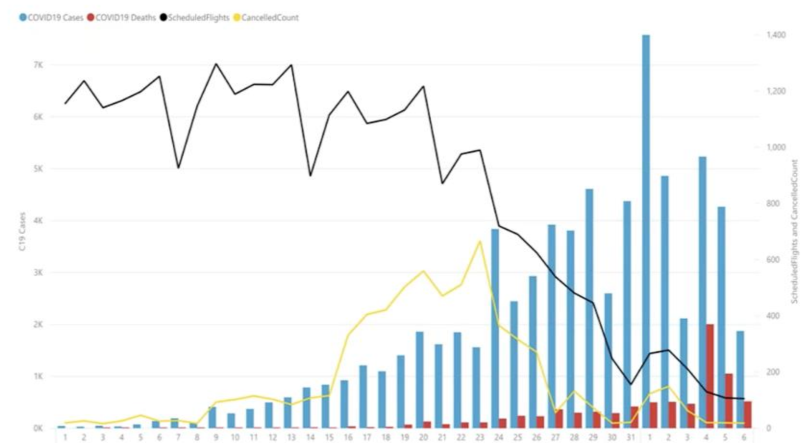
23 March 2020

- Despite the fact that China accounts for almost a fifth of the global economy, the Covid-19 started to impact the global airline industry mainly from mid March with the weekend of the 20th being turning point.
- Following the spread of the virus in Italy and other EU countries, the US closed its sky to flights from the EU from March 13 for 30 days.
- Several EU countries will follow with movement restrictions (see next slide). EU Airlines have first hesitated but then started to cancelled flights massively.
- The measures initiated by most of the countries globally will ground almost all international traffic but also in the EU most of the domestic traffic. Well before the outbreak of the virus in the EU (see below)
- By the beginning of April, all the airlines around the world have reduced their capacity. Western Europe, the Southwest Pacific and Lower South America are all reporting capacity some 90% below the levels planned

6 April 2020

Source: OAG

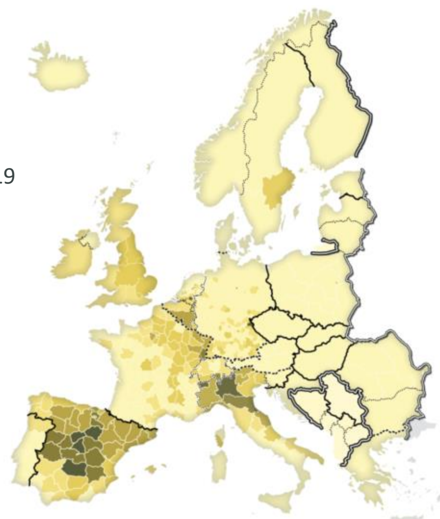
Daily Frequency March 2020



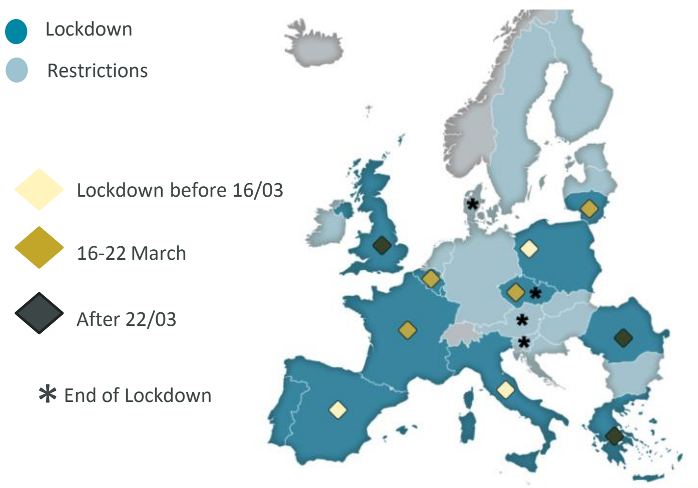
Source: OAG

MOVEMENTS RESTRICTIONS AND BORDER CHECK HAVE SPREAD ALL OVER EUROPE. THEY HAVE ACCELERATED THE DECISION TO GROUND THE FLEETS BUT THE DEMAND HAD ALREADY DISAPPEARED.

Borders are back in the Schengen area

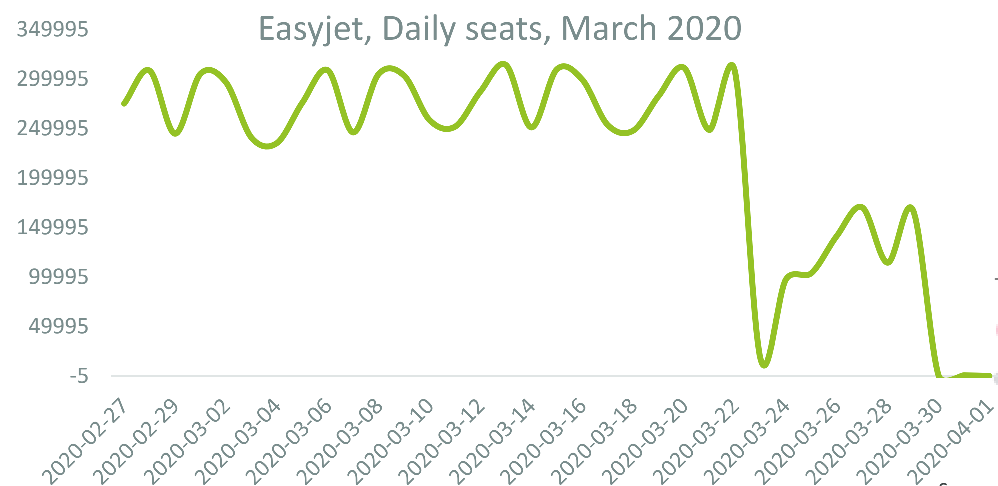


Measures in place



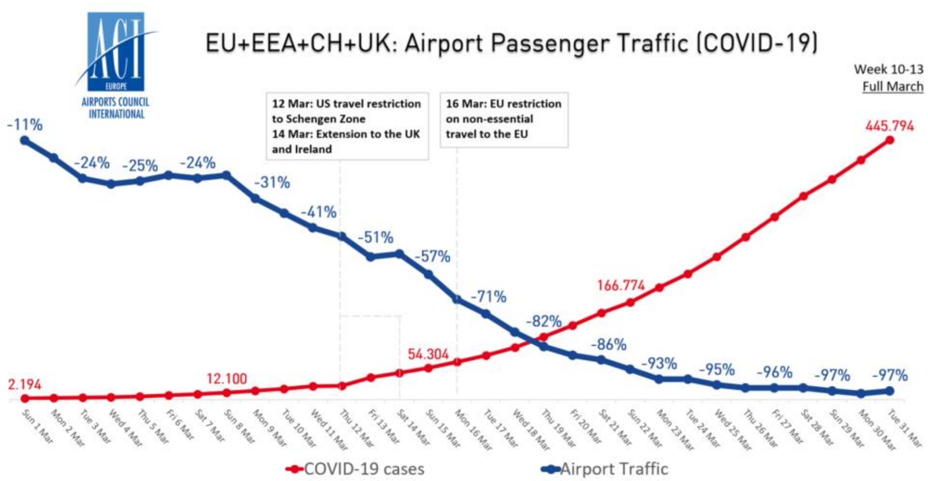
Source: Le Monde

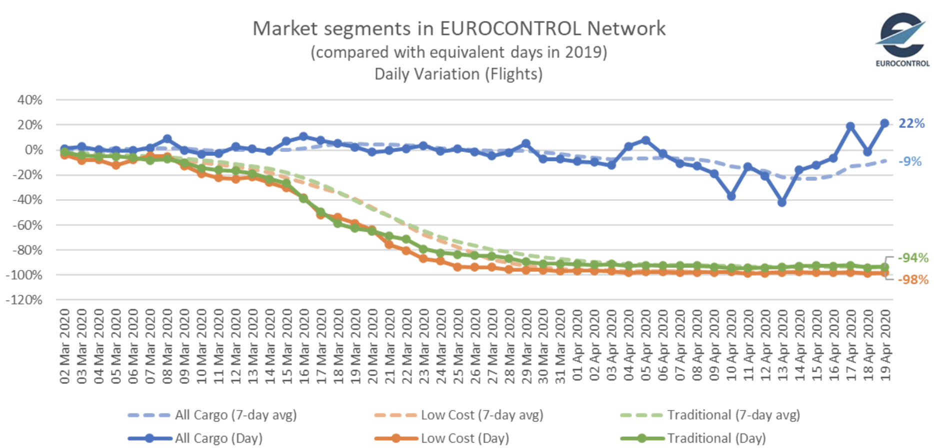
- 30 EU and Schengen countries closed their borders on March 17 to contain the pandemic. Since then, the travel ban has blocked entry to those nations for all tourists and most foreigners. The initial 30-day border closure has been extended to May 15.
- Most of the EU countries require that arriving passengers restrict their movement for 14 days on arrival.
- A significant number of EU countries closed their borders (see graph) and will surely only reopen them to specific countries.
- The lockdown (see graph) and cross-border restrictions have been the key drivers of decrease in air traffic. easyJet decision to ground almost all a/c (24/03) follows the announcement of movements restrictions in the UK. Following the lockdown in France (16/03), AF announced a capacity reduction up to 90%. Iberia will wait the announcement of IAG (16/03).
- A lot of company have already announced that they intend to stay grounded until mid-June. The release of the lockdown will not be the key factor for the relaunch of operations. Demand will have to materialise. Companies will surely restart progressively. Obviously, first will be domestic but this will not be of a great help for most of the EU airlines (see further). Intra European demand will be subdued as long as the virus will be significantly active in Europe (at least until the summer, based on the Chinese dynamics).
- The hub / feeder model will be particularly at risk with customers avoiding big airports
- As shown in next slide, the fear of the virus has impacted the industry well before the movements restrictions.



Source: CAPA

FEAR HAD DRIVEN DEMAND DOWN BEFORE THE MEASURES RESTRICTING MOVEMENTS



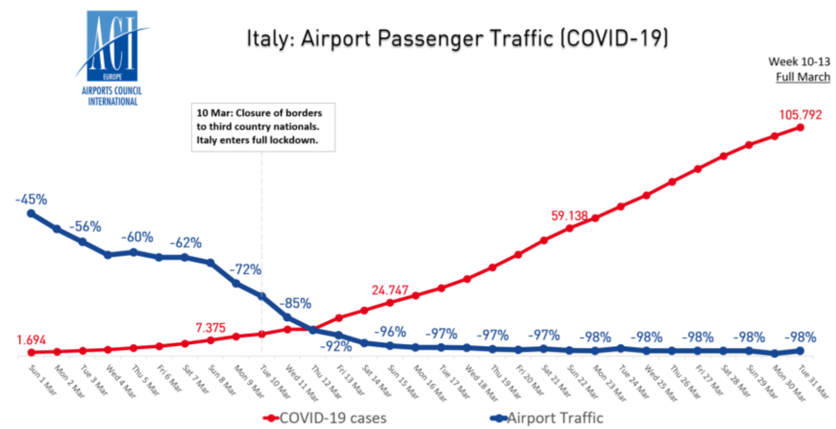


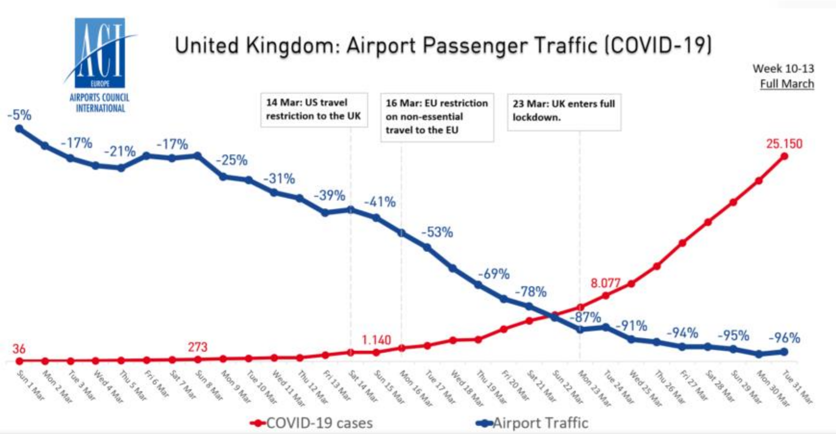
- Passenger traffic fell by **-59.5%** during the month of **March**, dragging **Q1 passenger traffic down by -21%**. But while Europe's airports still handled **5,120,000 passengers on 1 March** (-**11.7%** compared to the same day in 2019), that number had reduced to just **174,000 by 31 March** (**-97.1%** compared to the same day in 2019). 80% of airports are still open and only 93 have close.
- 106 million passengers have been lost in March 2020 (ACI), more than during the 12 months of 2009.
- Before the first travel ban (US-EU), the demand was already 41% lower than a year ago. At the same date the number of flights was just 20% lower than a year ago (see graph). De facto, airlines have experienced a decrease of their load factor by almost 25%, an unsustainable level notably for the LCC.
- **Before the decision to restrict non-essential travels, demand was down 71% in Europe.**
- Customers have massively **resigned flying by fear of the virus** and companies have rapidly extended the travel ban for their employees.

- This happened at a time where the population was not aware of the real impact of the virus and where a lot of people were still talking of this as a "bad flue". After a month of information, thousands of deaths, hundred of thousands of cases, the knowledge on the virus has significantly improved and with this the fear as surely increased.

- **Travel has been at the centre of the spread of the virus.** Europe has played a key role in the process. Travel from and within Europe preceded the first coronavirus cases in at least 93 countries across all five continents, accounting for more than half of the world's index cases. Travel from Italy alone preceded index cases in at least 46 countries, compared to 27 countries associated with travel from China. The main reason for this is the late closure of air links. Italy closed one terminal of Milan's main airport on March 16, when the northern region of Lombardy already had 3,760 cases in a population of 10 million people. By contrast, China had shut down flights out of Hubei province on January 23, when there were 500 reported cases worldwide and 17 deaths in Hubei among a population of 58 million. (the Intercept) .

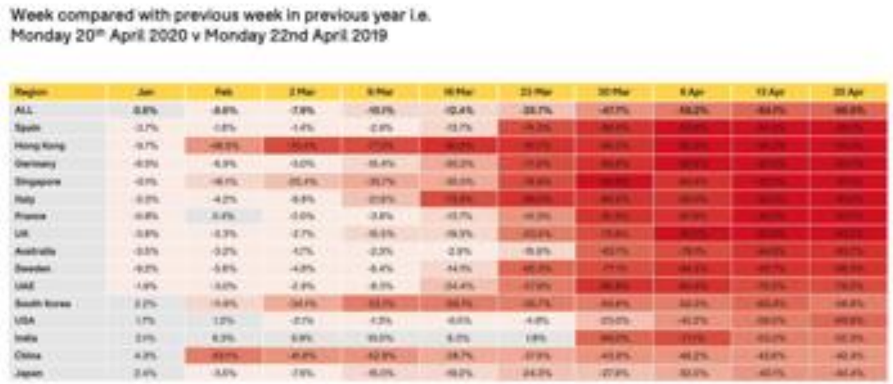
EUROPE WILL SUFFER AS A DESTINATION … AND INTRA EUROPEAN BORDERS WILL NOT DISAPPEAR .





- Europe is key for the spread of the virus in Africa. Senegal's first case, for example, was imported from France, while the Gambia's was the U.K., Angola's was from Portugal, and Suriname's was from the Netherlands Europe accounts for 84% of imported case in Africa until March 28 (Covid 19- Afro tracking team)
- On April 13th, with 108 new cases, China's new case rise to a six week-high with 90% being imported notably from Russia.
- **If a second wave developed in China the case for long term borders closure will be made almost everywhere.**
- France has announced on April 13 that its border with non EU countries will be closed until further notice. Given the intensity of the virus spread within the EU, **the call for intra EU cross border regulation will be hard to resist**.
- But again, **whatever the regulation will be the dynamic will be above all driven by the fear of the infection**.
- As shown by the first graphic on this page, traffic in Italy was down 72% before any travel restriction (9/03). People were just avoiding to travel to Italy. At the same date, traffic in the UK was already 25% below the year before, whereas the country had less than 300 cases.
- People were already avoiding big hubs and numerous passengers were wearing masks.
- As long as the virus will not be fully eradicated the demand for air travel will be subdued, independently of official restrictions. People will avoid any non-essential travel and companies will surely adopt strict precaution principle.
- The game changer will be the vaccine which could lead us waiting 12 to 24 months or the natural extinction of the virus which could take even longer (and would maybe never happen after the end of lockdowns)
- On the top of this, given its track record, Europe, and notably the main business and touristic spots, will suffer as a destination. European flights will surely be banned by a significant number of countries.
- Without even mentioning the impact of the economic crisis, **it will take at least 2 years for the airline industry to recover**. This also the timeline expected by the CEO's for AF/KLM or Lufthansa.

EUROPE IS THE MOST IMPACTED REGION WITH A DECLINE OF RPK BY ALMOST 50% IN 2020 COMPARED TO 2019.

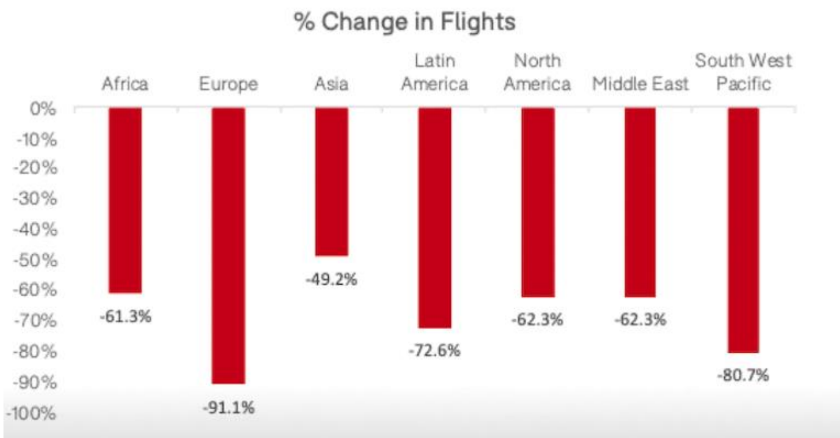


Source: OAG

- Since the end of March, most of the European air traffic has stopped. On April 6, the traffic for LCC was -98% compared to 2019 and for flag carriers -92%. At the same date the US had experienced a drop of capacity by 45%. On April 20, the world has experienced a drop of capacity of 66%China at the peak of the crisis has seen a drop of 70%.

- IATA has estimated that global RPKs will fall by 71% in 2Q2020 and that this measure will still be down by around 20% in 4Q2020, giving a 38% reduction for the full year. Even this could be optimistic, requiring significant quarter on quarter recoveries in 3Q and 4Q in order to be born out.

- Europe has so far undergone heavier capacity cuts than the rest of the world and IATA estimates **a 46% fall in RPKs** for Europe in 2020.

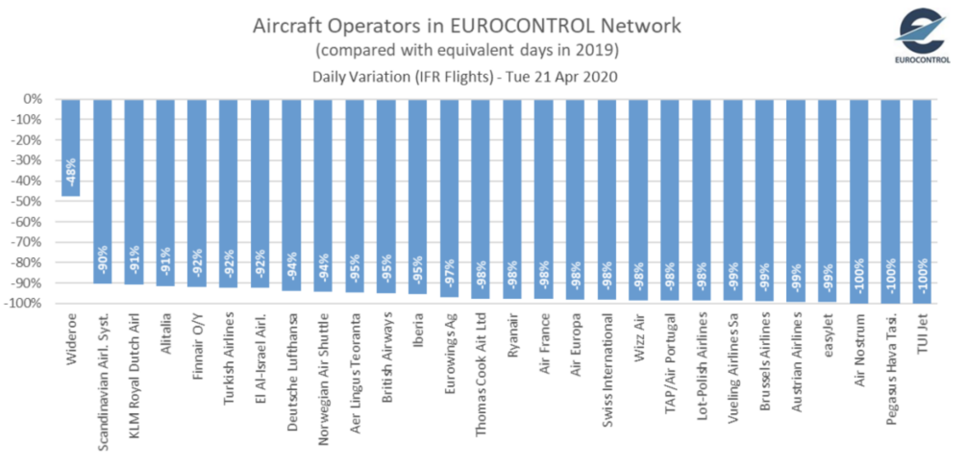


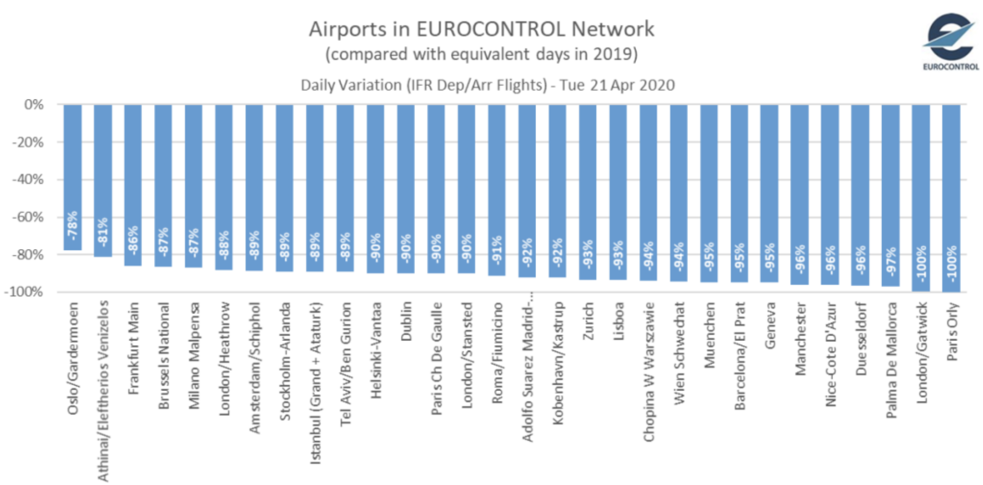
Source: OAG

Daily traffic April 3, 2020

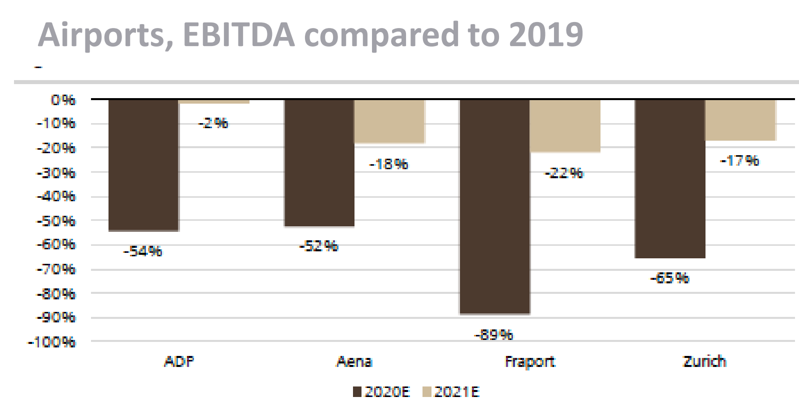
Source: The Guardian

NO ONE IS SPARED…



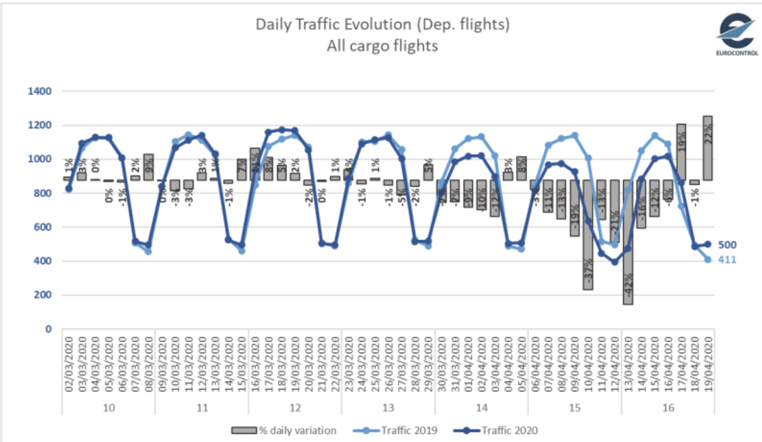


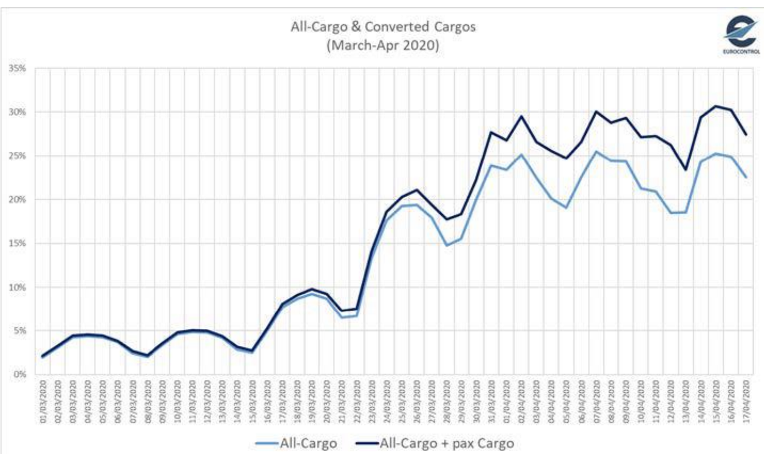
- **The current crisis has impacted all the players with the same intensity.** Almost everyone, apart maybe the Cargo operators are experiencing a decrease in revenue between 85% and 100%.
- As repatriation is coming to an end, most of the airlines have grounded their entire passenger fleet.
- **Airports are in the same situation**, with the main hubs being the more badly impacted with almost 90% decrease in activity. For airports, the higher the share of international connections the higher is the decrease in activity.
- ACI forecast loss of **-873 million passengers** for Europe's airports in **2020**, representing a decrease of **-35%** in a year that was predicted to see +2.3% passenger growth in a business-as-usual scenario. In financial terms, a loss of **-€23 billion in revenues**, representing a decrease of **-41%** compared to the business-as-usual scenario
- **Airports are maybe the weakest link with a loss of revenue (ADP, rent, duty free, …) and far less share of variable costs (around 20%) than the airlines**. UBS estimated that most of the airports have less than 6 months liquidity.
- Services companies are also suffering. With labour representing 70% of operational costs, work retention packages put in place by the different government offered a relief but not enough to allow the sector to survive a long standstill.



Source: UBS estimates

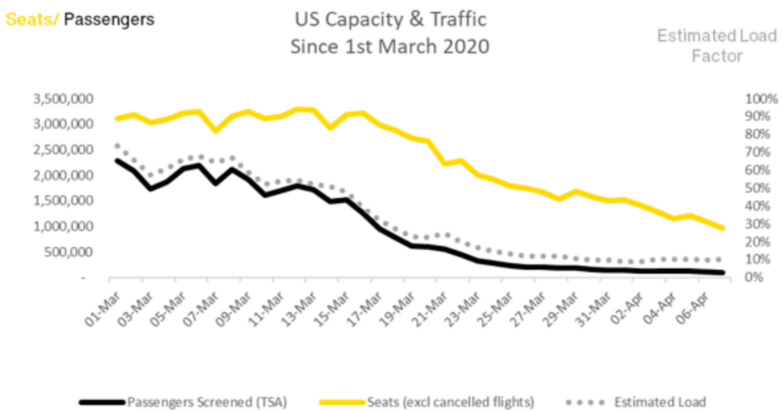
GROUND HANDLERS, CLEANERS, FUEL TANKERS, BUT ALSO AIR TRAFFIC MANAGEMENT, ALL THE VALUE CHAIN IS UNDER EXTREME PRESSURE

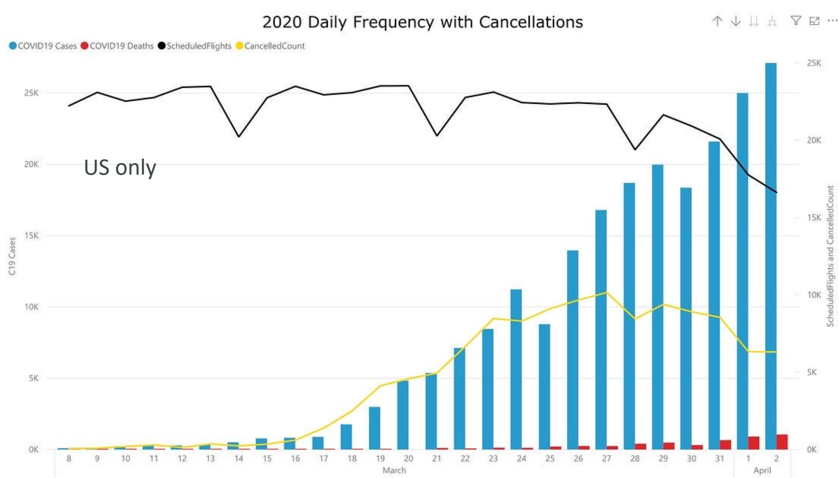




- If commercial passengers' airlines have grounded almost their entire fleet, the infrastructure of the industry is still active to allow the small activity to continue. This concerns the very limited commercial traffic, repatriation and above all freight.
- The number of closed airport is limited, and the sky is still open.
- Cargo traffic has slowed down but moderately and start to pick up again since mid April (see also slide 4). Cargo traffic has decreased by 9% compared to 2019, with a significant increase of converted passenger a/c into full cargo.
- The revenue from the cargo traffic is not sufficient to sustain the viability of the supply chain. The main private service providers have already reported significant cash flow challenges with dramatic impact on the workforce. Moreover, the activity being more irregular (cargo, repatriation, …) the continuity of services requires a flexibility for which the current furlough schemes are not always well fitted.
- Cargo handlers have often introduced surcharge, highly criticised by the freight industry but this is not sufficient to cover for the loss on revenue on the passenger's side of the operations.
- Air traffic management is another part of the industry facing a significant cash squeeze.
- ANSPs are still delivering almost the same service than before the crisis but with a drop of 70% to 90% of their revenue . On the top of this Eurocontrol has postponed the collection of ATM charges including February until November. This will boost the cash flow of the airlines by €1.1bn but will leave the ANSPs with almost no revenue for six months. Cash savings measures have been put in place but they are limited. Labour costs represent 70-80% of total costs of ANSPs but they are not always eligible to state backed furlough scheme and capacity cannot be reduced beyond 80%. ANSP are still paying 80-90% of their usual costs.
- In order to finance the cash requirements ANSPs have sometimes received additional funding from the States and/or have borrowed money. Eurocontrol itself has borrowed €500m to support national ANSPs. This is not sufficient and some ANSPs are already reducing wages and to laying-off employees.
- This cash squeeze impacts the ANSPs at a time when they need to invest massively in new technology and recruitment to avoid any shortage of competencies in 3 to 4 years.
- With the increased risk of bankruptcy of airlines, debt of the ANSPO could become unsustainable. Given the importance of the service an additional public funding will be necessary.

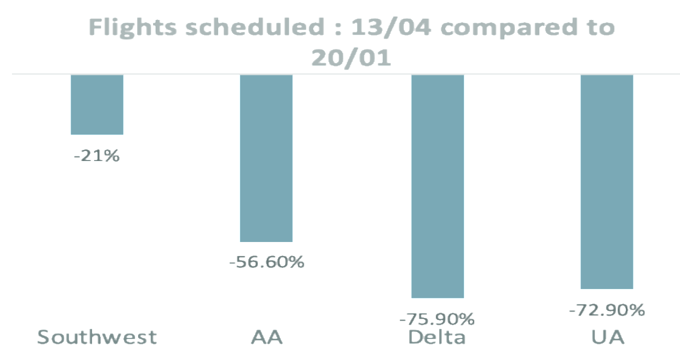
THE US HAVE TAKEN A DIFFERENT PATH… AIMING AT PROTECTING THE NETWORK





Source: OAG

- Despite being the new centre of the epidemic, the US have taken a different path.
- US airlines have on recently started to massively decrease their capacity. By April 6, the decrease in capacity was of 46% despite a demand 95% lower. The load factor is estimated at 10%.
- This situation explains the dramatic cash burn of US airlines as the cost reduction is not comparable to the one achieved by European airlines.
- The main reason for this strategy is the **requirement of the government to maintain the network as a condition to be eligible to public support** (see further)
- Following a strong lobby from small carriers, the DOT has revised its expectations but maintained capacity is a condition of eligibility to the CARES act.
- **The big 4 will have to maintain 90% of their domestic weekly frequencies, the smaller airlines 60%.** The US government has decided to protect the domestic routes and the connectivity and not the airlines. International network could also be considered if critical supply chains break down.
- Some airlines plan to develop more “tag flying”. Alaska has already announced two stops out of Seattle rather than just one.
- **The US solution could be a source of inspiration for the European industry but with greater consideration of environmental issues (lower frequencies on route supported to allow maximum load factor)**



Source: OAG

HOW TO PROTECT AN INDUSTRY IN EUROPE : EXAMPLE OF THE CORONAVIRUS AID, RELIEF, AND ECONOMIC SECURITY (CARES) VOTED ON MARCH 27 AND THE AIR CARRIER WORKER SUPPORT

- The Act provides liquidity in the form of loans, loan guarantees and other investments to aviation industry eligible businesses that incurred, or are expected to incur, covered losses such that the continued operations of the business are jeopardised as a result of COVID-19 coronavirus
- The loan and loan guarantee amounts will not exceed the following amounts:
    - $25 billion for passenger air carriers, including general aviation operators that conduct flights under Federal Aviation Regulations ("FAR")
- The Act imposes several restrictions and burdens on eligible businesses taking advantage of the grants and loan guarantee program that make participation in such programs burdensome.
- First, like the Air Transportation Stabilization Board (the "ATSB) the Act requires government equity or debt participation by eligible businesses utilising the loan or loan guarantee program, and "the principal amount of any obligation issued to an eligible business … shall not be reduced through loan forgiveness." In other words, eligible businesses must exchange warrants, an equity interest or debt in their companies to take advantage of the loan or loan guarantee programs, and the loans cannot be forgiven
- Second, participating eligible businesses are prohibited from share buybacks, paying dividends or making capital contributions from the date of the loan until 12 months after the direct loan is repaid in full.
- Third, the Act places restrictions on fund recipients' executive pay, including limiting pay increases and severance pay or other benefits upon terminations.
- Fourth, the issuance of a loan or loan guarantee cannot be made contingent upon an air carrier's or eligible business's implementation of measures to enter into negotiations with the certified bargaining representative or class of employees of the air carrier or eligible business regarding pay or other terms and conditions of employment. This is explicitly contrary to the ATSB process post 9/11, in which economic concessions from all significant stakeholders in the air carriers, including the labour unions, were a key government condition to receiving financial assistance in several negotiations.
- Fifth, all eligible businesses participating in the program must also maintain employment levels at the levels in place as of March 24, 2020, to the extent practicable, and are prohibited from reducing their employment levels by more than 10% from that date until September 30, 2020.
- Sixth, eligible businesses participating in the program must be created or organised in the U.S. or under the laws of the U.S. and have significant operations in and a majority of its employees based in the U.S.
- Seventh, eligible business participating in the program must have incurred or is expected to incur covered losses such that the continued operations of the business are jeopardised, as determined by the Treasury

THE AIR CARRIER WORKER SUPPORT: THE US TREASURY WILL PAY THE SALARY UNTIL SEPTEMBER 2019

- The Act provides financial assistance that is to be exclusively used for the continuation of payment of employee wages, salaries and benefits to employees of (1) passenger air carriers, in an aggregate amount up to $25 billion; (2) cargo air carriers, in the aggregate amount up to $4 billion; and (3) contractors, in an aggregate amount up to $3 billion.

- The Treasury is required to provide financial assistance to: (1) an air carrier in an amount equal to the salaries and benefits reported by such air carrier to the DOT for the period from **April 1, 2019 through September 30, 2019**;

- To be eligible for financial assistance, an air carrier or contractor will need to enter into an agreement with the Treasury that will require the participating air carrier or contractor to do the following:

- (1) refrain from conducting involuntary furloughs or reducing pay rates and benefits until September 30, 2020;
- (2) refrain from share buy back until September 2021
- (3) through September 30, 2021, ensure that the air carrier or contractor shall not pay dividends, or make other capital distributions, with respect to the common stock (or equivalent interest) of the air carrier or contractor; and
- (4) meet the requirements of sections regarding collective bargaining collections and executive compensation restrictions.
- (5) to the extent reasonable and practicable, an air carrier provided financial assistance under this subtitle to maintain scheduled air transportation service, as the DOT deems necessary, to ensure services to any point served by that carrier before March 1, 2020.

- Finally, the Treasury may receive warrants, options, preferred stock, debt securities, notes, or other financial instruments issued by recipients of financial assistance under the Air Carrier Worker Support program, which, in the sole determination of the Treasury, provide appropriate compensation to the government

- 30% of the funds will have to be repaid and the act could give the government warrants equal to 10% of the loan amount. The government could end up owning about 2.3% of United Airlines Holdings Inc, 1% of Delta Air Lines Inc, 1.3% of JetBlue Airways Corp, 0.6% of Southwest Airlines Co and 3% of American Airlines

- **Based on wages and benefits in the second and third quarters of 2019, United was eligible for about $6 billion in grants, Delta about $5.6 billion and Southwest about $4 billion.**

IMPACT OF THE COVID 19 ON THE AIRLINE INDUSTRY IN EUROPE : PRESSURE ON FINANCES

in bn€	AF-KLM	IAG	LUFTH	EASY	RYAN	WIZZ	NORW
				Crew only			
Employees (% of total cost)	31%	25%	24%	15%	15%	10%	19%
Employees costs 2019	7.6	5.6	9.1	1.0	1.0	0.2	0.9
Monthly spent on employees in m	635	470	759	82	82	17	71
Cash available	5.5	10.7	5.0	2.3	4.0	1.5	0.5
CASH BURN in DAYS							
Salary in months of cash	8.7	22.8	6.6	27.9	48.8	90.6	6.7
Total operating costs 2019	24.4	22.9	37.3	6.8	6.7	2.0	4.5
daily cash burn in m	67	63	102	19	18	6	12
days before cash dry BAU	82	171	49	123	219	271	38
HSBC estimate 18/03							
End of Feb	6.5	7.8	4.9	1.9	4.3	1.4	0.5
End of june	1.2	2.7	-2.3	0.9	2.6	0.9	0.0
Monthly cash burn	1.3	1.3	1.8	0.3	0.4	0.1	0.1
Daily in m	44.1	42.0	60.2	8.4	14.3	4.2	3.8
Capex monthly in m (Capex as BAU)	296	292	267	113	450	12	34
Capex monthly in m (estimation Syndex)	267	233	240	54	90	12	24
Estimate Syndex (with furlough)							
Fixed operational expenses (annual)	5.9	6.3	5.6	1.2	0.4	0.1	0.8
Daily opex in m	16.3	17.2	15.2	3.3	1.2	0.4	2.3
Daily Capex in m (BAU)	9.9	9.7	8.9	3.8	15.0	0.4	1.1
Total daily cash outflow in m	26.2	26.9	24.1	7.1	16.2	0.8	3.5
Months before bankruptcy Capex BAU	7	13	7	11	8	63	5
Months before bankruptcy reduced Capex	**7**	**14**	**7**	**15**	**31**	**63**	**5**
Daily cash burn reduced capex (estimation Syndex)	**25.2**	**25.0**	**23.2**	**5.1**	**4.2**	**0.8**	**3.1**

Source: Companies report, HBSC, Syndex

- The airline industry is experiencing serious turbulences through a very difficult time, but the **short term is surely not the most significant concern**.
- All European airlines have reacted swiftly to the crisis and have put in place drastic cash-saving measures and in most of the cases have been eligible to public support covering a large part of the costs of the furloughed employees.
- **Contrary to newspapers headlines and industry bodies, most of the airlines in the EU will easily survive the crisis at least as long as they will not have to flight again**…
- We estimate that the main European airlines (representing 50% of total ASK) have enough cask to survive from 5 months (Norwegian) to 6 years (Wizzair) with their entire fleet grounded under the current conditions in terms of public support and without taking into account refinancing requirements or fuel hedge settlements.
- Some airlines are facing specific refinancing issues and will need significant additional support to survive. Norwegian is proposing a debt to equity to its bondholders which will dilute its shareholders to almost nothing. The strings attached by the government to the support package are too demanding to allow Norwegian to be eligible to the plan (notably the required third party funding). Virgin asked for £750m to the UK government. The latter refused so far any industry specific package. easyJet has borrowed £600m through the Covid Fund (CCFF) in order to meet the remaining payment to Airbus following the deferral of a portion only of 2020 CAPEX commitments. Alitalia will be nationalised and massively restructured.
- Some companies are entering in unknown territories. The cancellation of LOT's offer on Condor could end up in the bankruptcy of the former Thomas cook company.
- Some companies are clearly candidates to the role of consolidator notably IAG and Ryanair.
- But the main challenge will be the financial burden of the relaunch of the operations with a subdued demand and surely significant health and safety constraints.

THE EUROPEAN AIRLINES CANNOT RELY ON DOMESTIC MARKETS AND WILL NEED A EUROPEAN COORDINATED APPROACH

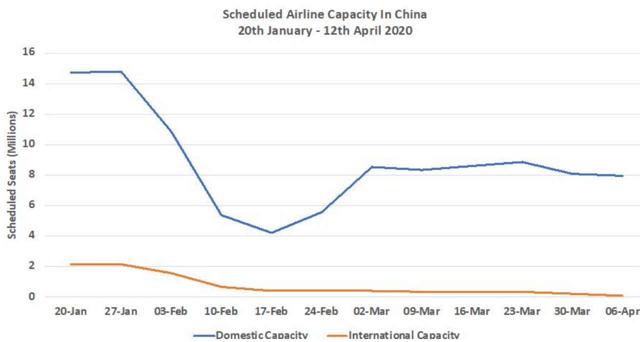
	Share of domestic ASK on total ASK	Share of ASK in Europe	Share of total domestic travel in Europe
Ryanair	9.05%	10.5%	10%
Lufthansa German Airlines	6.28%	7.2%	5%
Easyjet	10.92%	6.4%	7%
British Airways	3.13%	6.2%	2%
Air France	11.00%	5.7%	6%
KLM-Royal Dutch Airlines	0.00%	4.0%	0%
Wizz Air	0.00%	3.2%	0%
Iberia	17.63%	3.1%	5%
SAS Scandinavian Airlines	19.45%	2.3%	5%
TAP Air Portugal	6.69%	2.3%	2%
Jet2.com	0.03%	2.2%	0%
Vueling Airlines	34.63%	2.2%	8%
Eurowings	12.41%	2.0%	3%
Norwegian Air Shuttle	14.66%	2.0%	3%
Pegasus Airlines	29.22%	1.9%	6%
Alitalia - Societa Aerea Italiana S.p.A	26.12%	1.9%	5%
Finnair	4.90%	1.9%	1%
TUI Airways	0.00%	1.9%	0%
SWISS	0.71%	1.9%	0%
Condor Flugdienst	0.07%	1.5%	0%
Virgin Atlantic Airways	0.00%	1.3%	0%
Norwegian	5.61%	1.3%	1%
Air Europa	21.43%	1.3%	3%
Aer Lingus	1.09%	1.3%	0%
SunExpress	10.38%	1.2%	1%
Austrian Airlines AG dba Austrian	1.10%	1.2%	0%
LOT - Polish Airlines	4.29%	1.0%	0%
Transavia.com	0.01%	0.9%	0%
Nord Wind	17.64%	0.9%	2%
Pobeda	68.66%	0.9%	6%
Brussels Airlines	0.00%	0.9%	0%
TUIfly	0.01%	0.8%	0%
Aegean Airlines	0.00%	0.8%	0%
AZUR air	0.08%	0.8%	0%
Icelandair	0.00%	0.7%	0%
Transavia.com France	2.65%	0.6%	0%
TUI fly Belgium	1.18%	0.6%	0%
LAUDAMOTION GMBH	0.00%	0.5%	0%
Norwegian Air UK ltd	0.00%	0.5%	0%
Edelweiss Air	0.00%	0.5%	0%
Volotea	50.59%	0.4%	2%
SmartWings	0.03%	0.4%	0%
Air Baltic Corporation	0.08%	0.4%	0%
Wizz Air UK	0.00%	0.4%	0%
TUI fly Netherlands	0.31%	0.4%	0%
Red Wings Airlines	24.28%	0.4%	1%
Corendon Airlines	0.38%	0.4%	0%
Blue Air	9.14%	0.4%	0%

	Share of domestic traffic (seats)	Share of domestic traffic (ASK)
Africa : Central/Western Africa	39%	10%
Africa : Eastern Africa	35%	5%
Africa : North Africa	18%	5%
Africa : Southern Africa	63%	26%
Asia : Central Asia	47%	22%
Asia : North East Asia	75%	51%
Asia : South Asia	73%	44%
Asia : South East Asia	59%	26%
Europe : Eastern/Central Europe	30%	25%
Europe : Western Europe	25%	8%
Latin America : Caribbean	9%	1%
Latin America : Central America	60%	35%
Latin America : Lower South America	84%	51%
Latin America : Upper South America	74%	30%
Middle East	22%	6%
North America	85%	60%
Southwest Pacific	70%	29%
Grand Total	59%	35%

Source: OAG/CAPA, Syndex

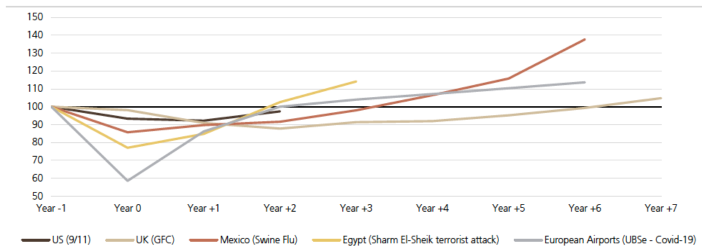
- Given the ban on cross-border travel it is natural that the relaunch of air traffic in China has started with the domestic market
- Domestic flights worldwide counted for 89% of departures on the week of April 6th.
- In the US the domestic traffic has allowed the airlines to fly a significant share of their fleet. The US domestic market represents 85% of the seats offered by US airlines and 60% of ASK.
- In the EU, the domestic market is small and accounts for 25% of seats and 8% of ASK in western Europe, and 30% of seats in eastern and central Europe (including CEI)
- The Spanish market is the biggest market with 59m seats, followed by Italy. De facto only some Spanish airlines (Iberia/ Vueling/Air Europa/ Volotea) or Italian (Alitalia) and some Nordics have more than 25% of their capacity on the domestic market.
- For most of the European airlines there is no hope any relaunch of operations if the intra European market is not reopen.
- The end of the ban on travel will be key but also the coordination of safety measures :
    - Social distancing on board
    - Social distancing at the airport
    - Heath screening
    - PPE
    - Staff / customers interactions
- If this is left to member states, the intra European market could stay disrupted.

EUROPEAN AIRLINES ARE ALREADY TRIMMING CAPACITY.



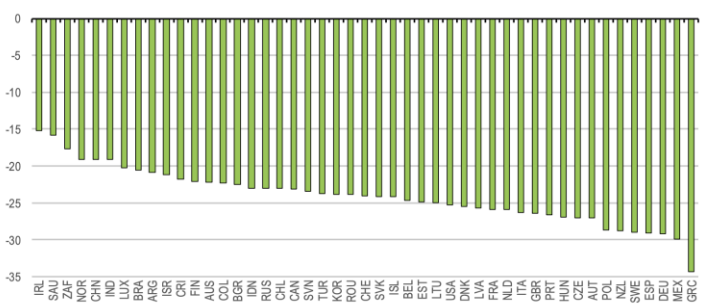
Source: CAPA

Recovery time line of previous crisis



Source: Company data, regulatory bodies, UBS estimates

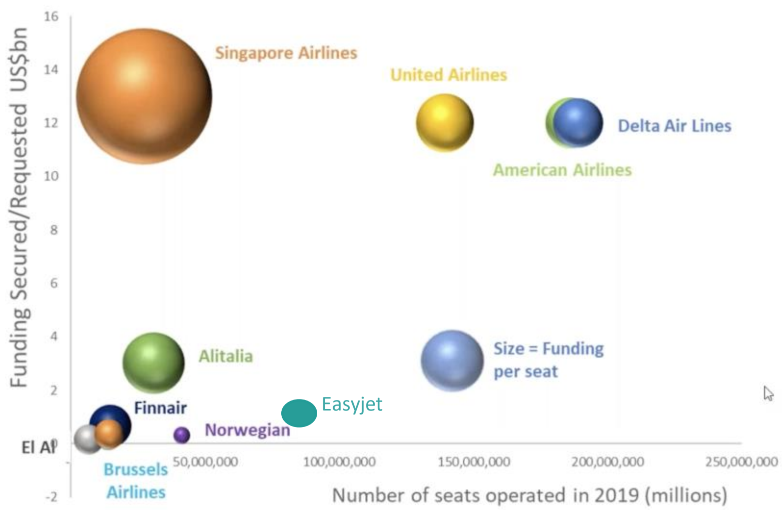
Impact of the Covid crisis in % GDP



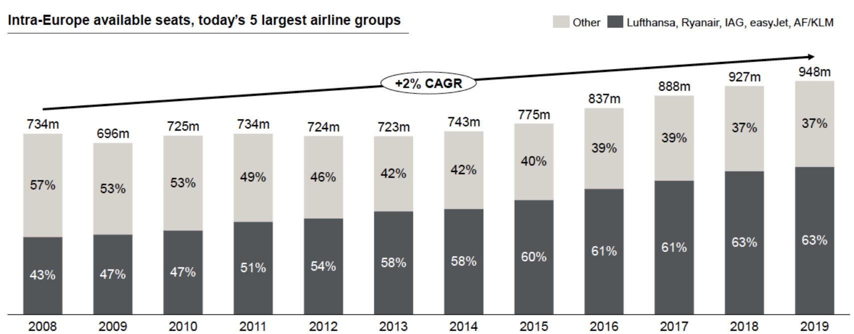
Source: OECD

- The Chinese model shows that the recovery is far from being a V shape. With the expected recession to come, the demand will be subdued for years, at least three years according to the consensus.
- As a result airlines are trimming capacity.
- LH plans to reduce the fleet under its mainline brand and Eurowings are the first such restructuring announced by a major European airline group in response to the expected significant decline in air travel post covid-19 travel restrictions
- The permanent retirement of 21 widebodies and 11 narrowbodies represents 9% of the Lufthansa branded fleet and 13% of its seats. In addition, the axing of 11 Eurowings narrowbodies represents 6% of the low cost brand's fleet.
- AF/KLM, IAG have also announced significant a/c retirement. EasyJet has deferred a significant part of its A320 and A320 orders. Order cancellations are growing.
- We estimate a potential reduction of capacity of 20 to 30% to base line due to capacity trimming and bankruptcy.
- But governments could help the consolidation without leaving the immediate profitability deciding of the services offered and the lessors picking the consolidators based on the strength of of their balance sheet by deciding to whom borrowing money against lease buy back aircraft. Considerations in terms of public services, social responsibility (climate change and employment standards) as well as structural role within the sector (support to the airport, maintenance, service providers). Leaving the consolidation to the market only will surely challenged the EU position on ownership and control. Indeed middle east and Chinese capital has different way to influence the consolidation with their funding of lessors and their subscription to debt emissions. This financial position could be used later to leverage on more strategical corporate decision .
- The support should come with strings attached but, moreover, a new regulation should be put in place to strengthen the balance sheet of the airlines. As the crisis of 2009 has triggered a request for additional capital buffer for the banks, the current crisis should trigger a request for similar cash buffer for the airline industry .

GOVERNMENT SUPPORT TO CHANGE THE INDUSTRY FOR A STRONGER SUSTAINABILITY



Source: CAPA



Source: IAG

- The support to the airline industry has taken the form of wage support for furloughed staff
- The sums allocated so far are rather symbolic compared to the American airlines but the immediate needs are also lower

- Airports have offered parking discounts

- A significant number of companies will resist any public support in order to facilitate the consolidation (see graphic) in the EU (far lower than in the USA) but also to avoid any restrictions in terms of shareholders and executive pay.
  - Since 2015, IAG has used 66.6% of its FCF for buy back its own share well above Delta (50%)
  - IAG has paid in dividends and share buy backs more than 171% of its Free Cash Flow.
  - easyJet has pay £174m dividend in March, at a time when it was asking staff to take unpaid leave and proposed to ditch crew food.

- Governments find difficult to finance private companies with often a significant share of foreign shareholders, highly paid bosses and lavish dividends. Financing the services and not the companies is surely the solution. This would protect the industry and avoid any Malthusianism aiming at maximising the ROCE (as illustrated by the stance of the biggest shareholder of easyJet, Stellios Haji-Ioannou).

POST OUTBREAK RECOVERY WILL REQUIRE EVEN MORE PUBLIC SUPPORT

- As long as the vaccine will not be available, fear will be a key element. In order to convince customers to fly again, the industry will have to work on new standards. One of them will surely be social distancing., at least following the immediate period after the lockdowns
- Most of the airlines still flying are already implementing social distancing :
  - Middle seats free
  - Sequenced boarding
  - Limited on board services
- Airports are working on new guidance with could lead to the introduction of social distancing, health screening.
- The low demand will facilitate the implementation of new measures but if they have to last they will constitute a significant financial burden. Most of the flights will become non-profitable at the current ticket price. The LCC model based on high load factor will particularly be challenged.
  - A 320-200 with twenty-nine 6-seat rows and two 3-seat rows, will have only 120 seats available without the middle seats. With the two first rows as well as the three last rows (28/29/30, 12 seats) top protect the crew and allow access to toilets, this leaves 96 seats only ie. 53% load factor … once taken into account the loss of in-flight sales, the longer turnaround due to social distancing at boarding/ loading/ maintenance/ cleaning, reducing the a/c utilisation by at least 30% … most of the operations would not be profitable, Even if demand comes back..
  - Social distancing, given low fuel price, could even make widebodies more attractive for short haul ….

- All the economics of the industry could be challenged and the pressure to put profit before people will be significant. At the restart, social distancing and other measures will be easy to respect due to low demand. It will even avoid a price war which has been damaging to the industry in the past. But with the demand picking up the pressure for lower constraints will grow. The rules need to be dictated by medical consideration only.
- The only way to avoid this will be to accept that the services rendered by the airlines under these conditions require a public financial support. This support should aim at the sustainability of the intra European connectivity for which the social distancing measures could be more a challenge to profitability.

- This European plan could take the model of the US plan by focusing on supporting the routes and notably the one at risk of significant capacity reduction and not only directly the airlines. The subsidies to the routes are already a reality of the industry whether through Public Services Obligations or more controversial launching schemes and regional funding. The current crisis would see the extension of this principle in order to sustain structurally viable operations or mitigate the risk for potential consolidators in a period where the underlying profitability will surely be limited. By doing this it could also help to support the airports. It should also support the employment by focusing on mitigating the labour costs and conditioning the support to quality and stable jobs. It could also favour the consolidation and incentivise an internalisation of most of the services, notably for health and safety purpose. It could also boost the commitments to climate change by supporting the best in class. It could also help to mitigate the loss on passenger traffic by supporting the development of an enhanced cargo offer.

- The EU is thinking at relaxing rules on state aid with at the same time requiring more strings attached in terms of dividend, buy back shares and executive remuneration . This is creating a good basis to implement a package for the airline industry. At the same time it is also reported that the Commission would limit the right to buy up rival while still repaying the state. In the case of the airline industry this would be counterproductive as it will halt the consolidation. Alternatively, support should be directed to structurally healthy airlines which are also delivering the higher environmental social and governance metric aiming at supporting a consolidation which will deliver a competitive and quality service without the damage of social dumping and bogus employment experienced by the industry over the last cycle. The state aid should allow significant investment in new and cleaner aircraft in order to boost the reduction of emission while supporting the aerospace industry. The EU will surely fund the support to the industry through a unique program and the delivery will be a matter of national governments. It could nevertheless design a coordinated approach in consultation with all the stakeholders.