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TRANSPORT
FOR A **GLOBAL ECONOMY**

*Challenges and Opportunities
in the Downturn*



**Financing Airport Infrastructure
- the Fraport Perspective**

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Aviation Market Characterized by Rapid Change

Global air traffic has been growing steadily during the last few decades. In 2008, airports around the world handled 4.5 billion passengers, 77.9 million tons of cargo, and 66.9 million aircraft movements. The Top 100 airports handled about two-thirds of the passenger volume and more than 85 percent of the cargo tonnage worldwide last year. From 1998 to 2008, these top airports recorded a 33.4 percent increase in passengers and a 30.6 percent gain in cargo – an average annual growth rate of 2.9 percent and 2.7 percent respectively – despite the crisis years of 2001 to 2003 which faced a decrease in dynamic traffic growth due to terror attacks, SARS and the Iraq war. Despite the current economic crisis, global passengers volumes are predicted to reach 11 billion by 2027. This represents an average rise of 4.2 percent per year and is being mainly driven by an international traffic growth of 4.5 percent p.a. (*Source: ACI statistics, Global Traffic Forecast Report 2008 - 2027*). Medium and long-term confidence in growth remains strong within the airport industry.

Liberalization of the European aviation market has resulted in tremendous air traffic growth at European airports in the previous 20 years. In particular, hub airports like Frankfurt have been benefiting from a growing number of additional flight connections to and from European and intercontinental destinations.

Changing market conditions, global airline competition and increasing pressure on cost and revenue have significantly changed the international aviation business. This has led to greater competition among airports as well. Airport competition is intensifying due to the following trends: ongoing concentration in the airline industry (global mergers and alliances), new airline business models (low cost carriers), differentiated hub strategies (the trend towards multi-hubbing), increasing overlap of catchment areas supported by high-speed rail links between the airports, and the development of multinational airport companies.

European airports are no longer mere infrastructure providers but have become fully developed businesses. Faced with the necessity of financing their own operating and infrastructure development costs, European airports have had to diversify their revenue sources – relying not only on traditional aeronautical revenues made up of airport charges but also on real estate, retailing, parking, etc.

Privatization has become an increasingly important trend in the airport industry, accelerating commercialization, competition and introducing even more efficiency across the airport sector. In 2001, Fraport AG became the first German airport operator to privatize (Initial Public Offering). Whether public or private, airport operators across Europe today follow comparable management and financial models. Moreover, both have to strike a balance between meeting shareholders' expectations and a wide range of public interests.

Intense Airport Competition in an Oligopolistic Airline Industry

Route liberalization and airport privatization have brought about effective competition among European airports. Today, all major European airports compete massively with each other to strengthen their hub position and/or to expand their airline portfolio. This severe competition leads to a loss of market power, particularly for hub airports focusing strongly on transfer traffic.

Hub functions are not dependent on their location, so they are not strongly dependent on airports. In principle, airlines can choose where to locate their hub, although this may cause switching costs. Furthermore, the trend of liberalization of traffic rights to the point of worldwide open sky agreements are expected to boost this development giving more choice and freedom to the airlines. Against this background, it can be stated that at most hub airports the potential for “market power” lies mainly with the (home) carriers and less with the hub airport itself.

Apart from hub competition mergers and airline alliances tend to weaken the airports’ positions by increasingly imposing pressure upon the airports, forcing them permanently to improve cost efficiencies through cost-cutting measures (always possible but ultimately limited because of the high capital intensity of airports) and by optimizing operational processes. Attaining the best operational performance is of significant importance, particularly for hub airports that have complex infrastructure and product diversity, aligned with fast and reliable transfer processes for passengers and baggage. Short transfer times for passengers on the hub – shown as minimum connecting time in the computer reservations systems (CRS) of airlines and tour operators – is a crucial competitive factor both for the respective hub carrier and the airport. Sufficient runway capacity is needed as well as efficient terminal infrastructure to guarantee short transfer times.

Traffic growth in the air is contingent upon adequate capacities on the ground. Hub airports like Frankfurt are especially affected by current capacity bottlenecks, because airline network structures concentrate growth in global air transportation on the major air transportation hubs. The efficiency of hubs is crucial to the future. They need to be expanded according to market needs.

Strong Need to Build Airport Infrastructure

However, the fact is that current capacities at many European airports are substantially insufficient to meet the passenger and cargo demand expected within the next 10 to 20 years. This situation applies both for major European hubs (e.g., Frankfurt, London-Heathrow) and for many secondary airports facing a growing demand for intra-European and intercontinental point-to-point traffic.

Despite the current economic crisis European airports need to finance and build much needed infrastructure to cope with the expected passenger and cargo traffic demand of the next 20 years. Unless capacity can keep pace with this traffic growth, passengers, airports and airlines across Europe will suffer from congestion, delays

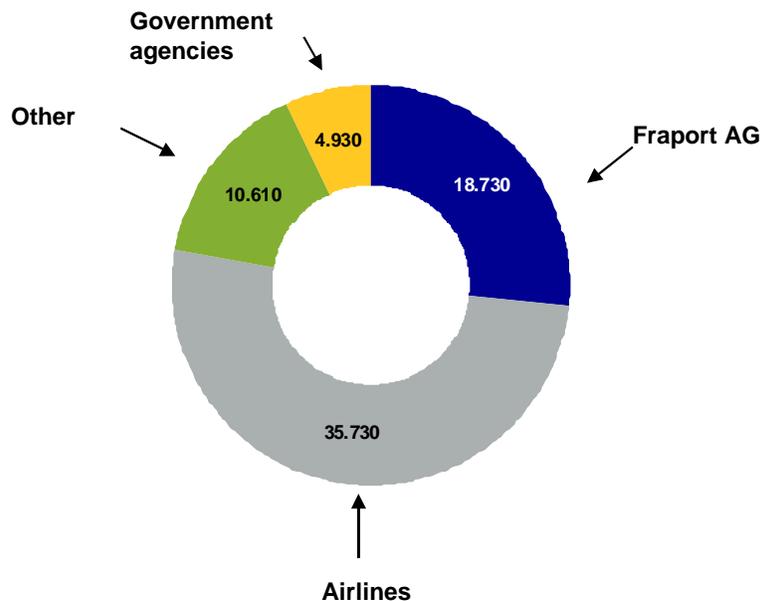
and service reductions. Because airport infrastructure involves extremely long lead-time in terms of planning, financing and construction, it is essential that European airports keep investing to meet the future needs of airlines and passengers.

Positive Employment Effects

In Germany more than 850,000 direct, indirect and induced (catalytic effect) jobs are dependent on air transportation. In 2007, more than 300,000 people were directly employed within the air transportation sector.

More than ever, major airports today are economic engines driving the economies of their regions and beyond. The same also applies to the employment market. Prospering airports not only create jobs on site but also in the surrounding region. Between 1980 and 2007 the number of people employed at Frankfurt Airport more than doubled from 30,000 to some 70,000. The larger employer at Frankfurt Airport is Lufthansa with more than 35,000 people. Next is Fraport AG and its subsidiaries with more than 18,000 employees. Over the last 25 years, Fraport's workforce at FRA has grown statistically at between 3.5 and 4 percent per year. If one compares the employment perspectives of the expansion and non-expansion scenarios, the planned expansion of Frankfurt Airport is expected to create up to 100,000 additional jobs in the Frankfurt/Rhein-Main region and throughout Germany.

More than 70,000 employees at Frankfurt Airport



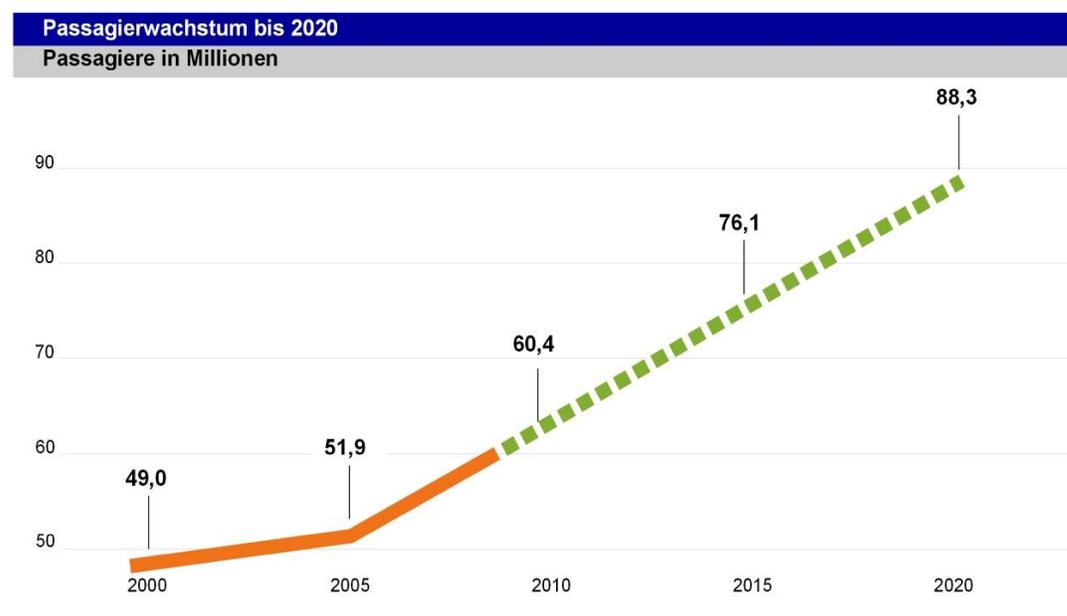
As of April 2009

Source: Fraport AG

According to Intraplan Research Institute, a long-term forecast on the development of air traffic demand predicts that FRA will have about 88 million passengers by 2020. Compared to some 52 million passengers in 2005, this corresponds to an annual passenger growth rate of 3.5 percent. Cargo and mail tonnage is expected to increase by more than 70 percent to a total of 3.16 million metric tons in 2020. Annual demand for flight movements is expected to climb from 490,000 movements in 2005 to about 700,000 movements in 2020. These figures are not expected to change despite the current economic crisis. Based on past experience and statistical figures, it is more than likely that the recovery will lead to a traffic surge that brings international air traffic back to the forecasted growth path.

Expected passenger growth at Frankfurt Airport until 2020

Passengers in million



Quelle: Intraplan

Source: Intraplan Research Institute

Thus, Fraport AG is committed to its future development plans and will continue to invest some €4 billion in FRA's expansion program through 2015. This includes the construction of the new Runway Northwest for landings and Terminal 3. Fraport is forging ahead with the most significant privately-financed investment project in Germany. Another €3 billion are currently being invested in upgrading and expanding existing passenger facilities at Frankfurt.

What is our Challenge?

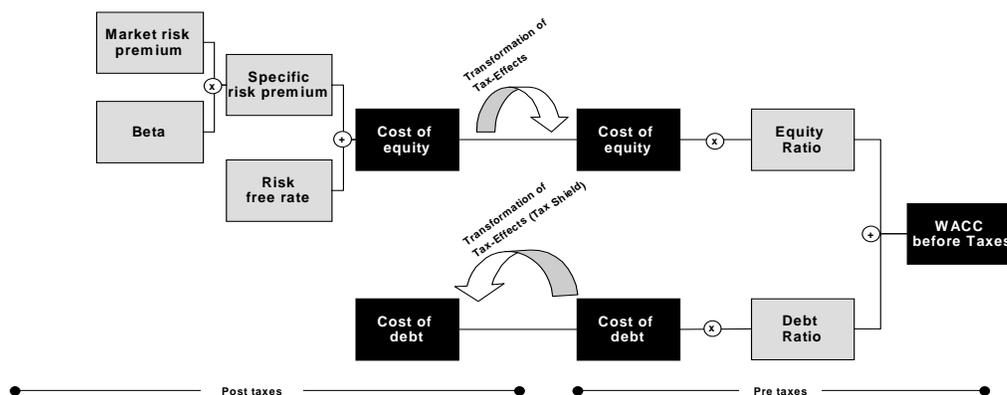
By far the biggest challenge for airports today is managing the capacity crunch to cope with future traffic growth by ensuring cost-efficient and timely provision of expanded airport infrastructure according to user demand. While airports are not labor intensive, their operations involve a very high proportion of fixed costs. Therefore, building new airport infrastructure creates a disproportionately high share of costs of capital being implemented as incremental costs, which are very difficult to cover by phased increases in airport charges.

In most cases, airlines are not paying the full cost of the airport infrastructure they use. They benefit from an under-recovery of capital costs at the expense of the airport operators. There is a growing trend of compensation losses from aeronautical revenue, since airports are often not able to achieve adequate cost recovery through aeronautical charges due to market conditions. This situation also applies to Frankfurt Airport which for years has shown negative outcomes from airport charges.

Airports need to bear their full and fair share of the cost of providing and developing airport infrastructure and services, including:

- Cost of maintenance, operation and administration expenses
- Depreciation in the value of assets during the period concerned
- Cost of capital, including an reasonable return on assets at a sufficient level to secure financing on favourable terms in capital markets. For the purpose of investing in new or expanded airport infrastructure to remunerate adequately holders of airport equity.

WACC-Approach before Taxes



Source: Fraport AG

Hence, pre-financing of infrastructure development must be a valid option to smooth the annual increase in charges and to ensure that the development is undertaken cost efficiently. Pre-financing is key to ensuring that investment occurs at the most appropriate time, and timely investment is essential to ensure that investment costs are efficient.

Is There a Need for Airport Regulation?

As already shown, airport competition has intensified significantly in recent years as a result of different factors which have often led to a decrease of the market power of airports. In contrast, the dominance of (home) carriers with global alliances has grown greatly, boosting the pressure on airport operators to limit or, more typically, to lower their charges and fees.

Responding to the airlines' claims, Fraport has increased airport charges only moderately in recent years, accepting that aviation costs by far could not be covered. Insufficient cost coverage through airport charges is also a fact at most other German airports, which could lead one to conclude that airport regulation is not necessary because market mechanisms – at least as far as the level of airport charges is concerned – seem to be operating effectively.

For this reason, it also can be assumed that the multiple call for definition of criteria for cost efficiency as part of airport price regulation is not providing the right direction, at least as long as the airports partially have to accept significant economic shortages in their aviation business. In addition, it must be stated that airlines and other airport users themselves have a significant impact on the design of airport infrastructure and handling processes by defining their respective requirements; therefore, they have a significant effect on the cost efficiency of airports.

Fraport is prepared to continue its efforts successfully to increase Frankfurt Airport's efficiency in the coming years and will reach this goal – without bureaucratic catalogues of efficiency and over-regulation – simply due to market needs.

Nevertheless, European airports need regulatory conditions to cope with the challenges of the rapid market changes.

- Without an appropriate return on assets no investment in necessary new airport infrastructure will be possible.
- Without pre-financing of expanded or new airport infrastructure through airport charges it is likely that in many cases airports will not be able to manage high incremental costs sufficiently and economically.
- Investors demand long-term security when financing airport infrastructure projects
- Protecting airlines from the possible misuse of airport monopoly positions in original markets (does not apply to hub airports)

- Creating a level playing field for the competition among airports
- Airports and Airlines need a framework for discussing airport charges

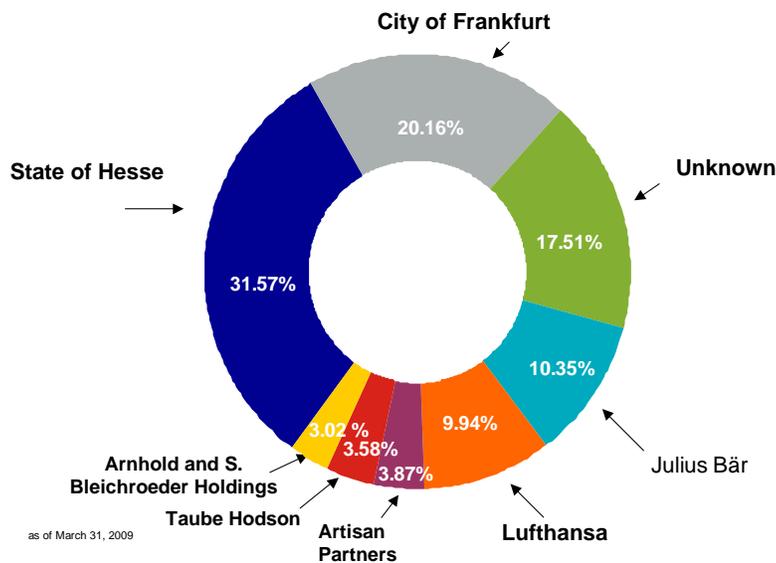
Assessment about the New Directive on Airport Charges

In this respect, Fraport welcomes the new EU Directive on Airport Charges, which has been adopted by the European Parliament and Council in March 2009. The directive is the template for setting airport charges within the EU member states and applies to all European civil aviation airports serving more than five million passengers per year. On the one hand, the directive contains important clarifications in terms of determining, consultation and approval of airport charges by making use of ICAO guidelines; on the other hand, it provides member states with the necessary flexibility for implementation into national law, taking into account the diversity of airport charges systems and different needs at the national level.

Basically, this is the right approach. However, despite all clarifications the directive fails to recognize that airports need to have an incentive to finance and develop new infrastructure. A stronger commitment of the directive particularly in regard to the issue of pre-financing of airport infrastructure would have been desirable.

In Germany the setting of airport charges is subject to governmental approval according to Article 43a LuftVZO (Air Traffic Licensing Regulations) based on the German National Air Transportation Act (Luftverkehrsgesetz). Responsibilities are clearly defined: The Federal Ministry of Transport (Bundesministerium für Verkehr, Bau & Stadtentwicklung) acts as a supervisory body at the national level and the competences of the government agencies -- performing monitoring and approval of airport charges -- are performed at the state level. As for Frankfurt Airport, the Hesse Ministry of Economics, Transport, Urban and Regional Development (HMWVL) - which is the responsible government entity for aviation - is clearly separated and acts independently from the Hesse Ministry of Finance, which represents the state's 30-percent shareholder interest in Fraport AG.

Shareholders of Fraport AG



Source: Fraport AG

There is no need to replace Germany's well-functioning decentralized system of economic oversight by establishing a central supervisory authority for airport charges that would create inefficient bureaucracy and over-regulation.

Why Fraport Favours the "Dual Till"

In terms of the application of the so called dual till or single till principles, Fraport welcomes the freedom of choice for EU member states. Regarding the assessment of airport charges, Fraport clearly votes for the application of dual till, which means the strict separation between aviation and non-aviation and the relevant cost and revenue. Basically, Fraport considers the dual till to be an appropriate projection for airport regulation, offering stronger economic incentives for investments in new airport infrastructure than the single till approach. The latter has to be declined, since it creates regulation where no regulation is needed. There is little incentive for the airport to maximize economic efficiency or to invest in commercial activities when the profits involved are systematically used to subsidise the airlines through lower charges. Only dual till makes the persistent under-funding of the aviation sector affordable, justifies the development of airport infrastructure and, first and foremost, allows commercially orientated "airport cities" to be created - for the benefit of all.

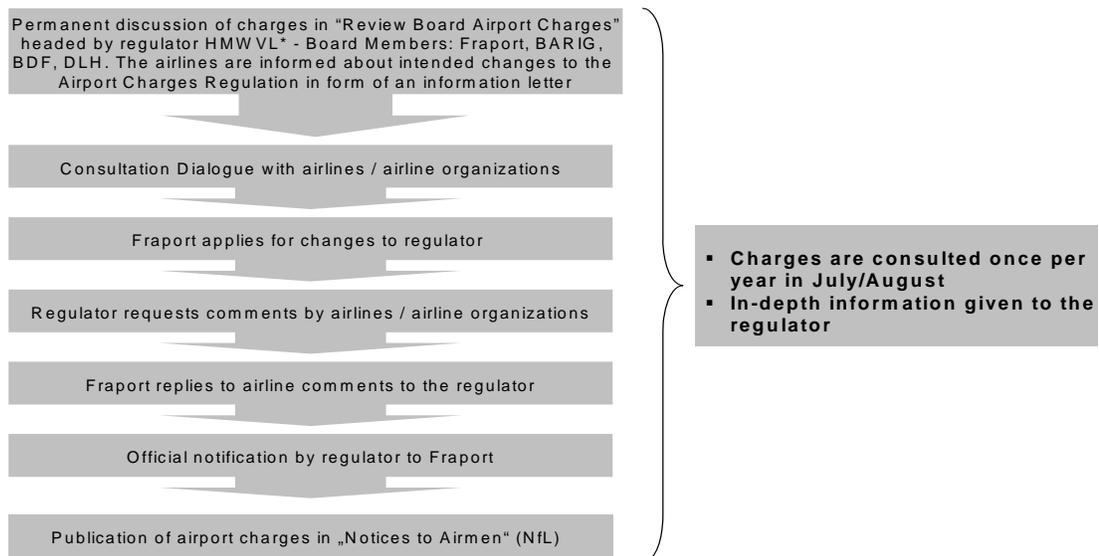
Following the dual till principle does not necessarily mean that cost coverage in aviation can be achieved. Even under a dual till regime an airport may be forced by the market not to recover fully its aeronautical costs by the respective charges.

Moreover, the dual till offers enough and even more flexibility for charges agreements between airports and their users. Fraport had agreed upon a mid-term agreement with the airlines on the level of airport charges for the period 2002 to 2006. Simultaneously, a contract under public law between Fraport and HMWVL has been effective. The average charge per passenger was determined by the future passenger growth rate agreed according to the traffic forecast for the period of the contract. Fraport and the airlines agreed that if the projected growth rate was met airport charges could be increased by two per cent on average. In the case of a *higher* growth rate, the airlines participated with a 33 percent share in additional revenues by lowering charges in the next period.

In case of a *lower* growth rate *one* third of the shortfall in revenue would be compensated by increasing charges in the following period. The other *two* third of the shortfall had to be compensated for by other income generated by Fraport: i.e., from the non-aviation business. Without the dual till this agreement would have hardly been economically affordable and viable to Fraport.

Due to uncertainties - particularly for the cost development resulting from FRA's huge investment program - both sides, airport and airlines alike, did not aim for a mid-term follow-up contract. Thus in 2007 Fraport returned to the process of setting charges, consultation and application on a year-to-year basis.

Consultation Process at FRA- all Airlines are continuously involved



Source: Fraport AG

However, the so-called “Review Board Airport Charges Frankfurt”, which was established in 2002 as part of the mid-term agreement has been continuing up to now. Consisting of representatives of the airline associations, Lufthansa and Fraport and headed by HMWVL, the board is aimed at following up all relevant charging aspects at Frankfurt Airport in regular meetings throughout the year. It is obvious that the level of transparency on the issue on airport charges discussed in the gatherings of the board clearly goes beyond the information distributed in the regular consultation meeting on airport charges which usually takes place once a year prior to the official charges application. From the Fraport perspective the “Review Board Airport Charges Frankfurt” can be considered as well-functioning example of confidence and cooperation between airport and airlines – it clearly stands for more transparency, market-orientation and less regulation.

Conclusion: What are the Key Messages?

- Airports today are commercially operated businesses confronted by an airline industry that is increasingly consolidating and putting pressure on airports to lower their costs and prices.
- There is strong demand to build new airport infrastructure and facilities, which need to be financed by a sufficient level of airport charges. However, airports often are not able to achieve full coverage of their aeronautical cost basis.
- Airport regulation must provide incentives for the airports to invest in new infrastructure. In this regard, the new EU directive on airport charges falls short of the airports’ expectations. Airport financing should be considered as a key issue in the course of implementing the directive at the national level.
- In terms of airport regulation, a well-proven decentralized system of economic oversight has been established in Germany. There is no need to replace this by implementing a national supervisory body.
- Given market realities any inefficient over-regulation must be avoided.