

Third Runway is Key to Hong Kong's Competitiveness

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Over the past decade, passenger number and cargo tonnage at the Hong Kong International Airport (HKIA) have respectively increased by 8% and 5% on average per year. The number of flight movements has risen 65% to 391 000 last year.

Each day about 1 100 flights fly to and from some 180 destinations worldwide, including Mainland cities, making Hong Kong one of the world's global and regional aviation hubs and contributing immensely to our trade, logistics and tourism industries.

However, the current two-runway system can only allow for a practical maximum capacity of 68 flights per hour. If present air traffic growth trend continues, HKIA will reach saturation in the coming two years.

If HKIA is not to give up its hard-earned hub status, amid fierce competition from other international airports in the region, notably Singapore, Seoul and Shanghai, as well as Guangzhou and Shenzhen in the Pearl River Delta (PRD) area, which are all having further expansion, there is no alternative but to build a third runway without delay.

The question is therefore not “whether” or “when”, but “how” to take the project forward.

Under the Airport Authority's (AA) plan, a three-runway system can handle around 100 million passengers and cargo throughput of some 9 million tonnes by 2030.

AA has already completed a rigorous statutory environmental impact assessment (EIA) covering 12 aspects including aircraft noise, air quality, marine ecology and impact on human health. A total of 250 mitigation and enhancement measures, including setting up a biggest-ever 2 400-hectare marine park, were committed in the EIA report to address public opinion and the views of the Advisory Council on the Environment.

The Director of Environmental Protection granted the environmental permit for the project in November 2014 with conditions. AA has taken these conditions fully on board and aims at achieving "development alongside environmental conservation" under its vision to be one of the world's greenest airports.

AA has put up a self-financing plan based on the "joint contribution" principle for this mega infrastructure, estimated to cost \$141.5 billion in money-of-the-day prices. It comprises raising market borrowings given AA's AAA credit rating; restoring present airport charges for airlines to pre-2000 level with subsequent adjustments in line with inflation; and introducing an airport construction fee per departing passenger except transit passengers. AA also plans to retain all profits earned without dividend payment for ten years.

Government supports such joint-contribution approach. Through borrowings, the market will exercise financial prudence in scrutinizing the business viability of the project. Charging an airport construction fee to help finance airport expansion is not uncommon overseas. However, the Government is of the view that AA should maximize borrowings and lower the airport construction fee so as to reduce burden on passengers. AA is also asked to design airline charges in such a way as to facilitate and encourage the most efficient use of the airport, and encourage the use of more wide-body planes.

Airspace and its management naturally determine how much air traffic an airport can accommodate within international safety limits. The airspace over Hong Kong and the surrounding PRD area has seen tremendous growth since the 2000s, constituting one of the busiest in the whole of China.

In 2004, recognizing the need to optimize the utilization and management of PRD airspace, a tripartite working group was formed among the Civil Aviation Administration of China (CAAC), Hong Kong Civil Aviation Department (CAD) and Macao Civil Aviation Authority, to work out planning targets and measures to enhance cooperation, coordination and standardization of procedures and measurements.

The result was the PRD airspace management plan in 2007 aiming at implementing various improvement measures by phases before 2020. AA's target runway capacity of 102 flights per hour (or 620 000 flights per year) under the three-runway system was premised on

such plan which also envisaged five runways for Guangzhou and three runways for Shenzhen. CAD has been engaging mainland authorities to take forward the 2007 plan, and some measures have been rolled out in recent years.

The Central Authorities including CAAC are supportive of the three-runway system so as to maintain Hong Kong's global aviation hub position. We will continue to work closely with CAAC on technical solutions to optimize the use of PRD airspace and meet the operational needs of all sides, thereby achieving mutual gain.

AA will take into consideration Government's feedback and review its financial proposal and design scheme for the three-runway system, making necessary adjustments to ensure the financing arrangements are fair and reasonable, and that the capital investment is well justified. It will also develop appropriate planning contingencies and cost control measures.

Some critics of the third runway have suggested that HKIA could expand the existing 68 flights per hour limit to 86 flights even with two runways, citing a 1992 report prepared for the then Provisional Airport Authority. Such suggestion is based on wrong understanding.

That report actually pointed to a range of maximum capacity from 52 to 86 flights per hour for dual runways depending on various conditions and constraints. Due to the surrounding terrain notably Lantau Island's high

mountains, it would be impracticable and unsafe under international standards to achieve the higher targets.

CAD's commissioned consultancy in 1994 confirmed a two-runway maximum capacity of 63 movements per hour. Subsequently, the UK-based National Air Traffic Services reviewed this capacity in 2008 and concluded that using the latest air traffic control technology, it could be raised to 68 flights per hour subject to various enhancement measures.

We know for sure that maintaining the status quo would mean no growth for Hong Kong aviation, losing out our business and hub advantage to neighbouring international airports, and reducing our economic competitiveness. Just enhancing terminal and cargo facilities with only two runways will not remove the ultimate runway capacity bottleneck.