

## **ITEM FOR PUBLIC WORKS SUBCOMMITTEE OF FINANCE COMMITTEE**

### **HEAD 703 – BUILDINGS**

#### **Fitting Out – Internal security**

#### **172IC – Fitting out works for customs, immigration and quarantine facilities at the SkyPlaza of the Hong Kong International Airport**

Members are invited to recommend to Finance Committee the upgrading of **172IC** to Category A at an estimated cost of \$40.7 million in money-of-the-day prices for carrying out fitting out works for customs, immigration and quarantine facilities at the SkyPlaza of the Hong Kong International Airport.

### **PROBLEM**

We need to provide customs, immigration and quarantine (CIQ) facilities in the second passenger terminal building of the Hong Kong International Airport called the SkyPlaza<sup>1</sup> (see location plan at Enclosure 1) to be completed in mid-2006 by the Airport Authority (AA).

### **PROPOSAL**

2. The Director of Architectural Services (D Arch S), with the support of the Secretary for Economic Development and Labour, proposes to upgrade **172IC** to Category A at an estimated cost of \$40.7 million in money-of-the-day (MOD) prices for carrying out fitting out works for CIQ facilities at the SkyPlaza of the Hong Kong International Airport.

**/PROJECT .....**

---

<sup>1</sup> The SkyPlaza, which is planned for forming an extension of the existing Passenger Terminal Building at the Hong Kong International Airport, will become a transport and business centre connected with the Airport Express railway station.

**PROJECT SCOPE AND NATURE**

3. The scope of **172IC** comprises the design and fitting out works for the CIQ facilities located mainly on Levels 3 and 5 of the SkyPlaza. The proposed works involve a construction floor area (CFA) of 2 000 square metres (m<sup>2</sup>) or a net operational floor area (NOFA<sup>2</sup>) of 992 m<sup>2</sup>, with the following facilities –

- (a) Customs and Excise Department (C&ED) – NOFA of 154 m<sup>2</sup>
  - four search rooms, an observation room, offices, two changing rooms and a computer server room;
- (b) Immigration Department (IMMD) – NOFA of 569 m<sup>2</sup>
  - three interview rooms, a search room, a briefing room, a computer room, a closed circuit television control room, offices, a security lockers room, four locker and changing rooms, two staff standby rooms, a computer server room, and a store room;
- (c) Hong Kong Police Force (HKPF) – NOFA of 242 m<sup>2</sup>
  - a report centre, two interview/search rooms, an interview room, an observation room, a briefing room, an operational duty room, offices, a changing room, a strong room, two computer equipment rooms, two equipment rooms and a store room;
- (d) Department of Health (DH) – NOFA of 27 m<sup>2</sup>
  - a consultation room, a waiting area, an isolation room and a store room; and
- (e) Other government departments, including Civil Aviation Department, Agriculture, Fisheries and Conservation Department and Information Services Department
  - display fixtures to facilitate delivery of various border crossing control and essential information to the public.

/A .....

---

<sup>2</sup> NOFA is a standard term used to describe the floor area actually allocated to the users for carrying out the intended activities. Unlike CFA which takes into account all areas within the building structure envelope, NOFA does not include areas for toilets, bathrooms and showers, lift lobbies, stair halls, public/shared corridors, stairwells, escalators and lift shafts, pipe/services ducts, refuse chutes and refuse rooms, balconies, verandahs, open decks and flat roofs, loading/unloading areas, mechanical plant rooms, etc.

———— A site plan is at Enclosure 2. Layout plans of the proposed CIQ facilities on  
———— Levels 3 and 5 of the SkyPlaza are at Enclosures 3 and 4 respectively. Views of  
———— the SkyPlaza are at Enclosure 5. To tie in with AA's construction programme of  
the SkyPlaza, we plan to start the fitting out works in June 2005 for completion in  
July 2006.

## JUSTIFICATION

4. Since the opening of the Hong Kong International Airport at Chek Lap Kok, AA has been constantly reviewing the planning needs to meet forecast growth at the airport. AA's latest review in 2003 concluded that the growth in air passengers and the expected growth in passenger throughput are both higher than originally forecast. In 2004, the Hong Kong International Airport handled over 37 million passengers, representing a growth of 35.4% over 2003. Excluding the effect of SARS in early 2003, the traffic in the fourth quarter of 2004 still increased by 14.4% on a year on year basis. The passenger throughput would likely further increase to around 40 million in 2005. Some of the existing passenger processing facilities including departure kerb, bus and coach facilities and airline check-in counters would operate near capacity during peak periods. The details are as follows –

- (a) departure kerb – the original Master Plan drawn up in 1991 estimated that 43% of the users of the Passenger Terminal Building (PTB) would arrive by rail and the rest by road transport. The actual split in 2002-03 was 19% by rail and 81% by road. This has led to capacity shortage in ground transportation facilities, particularly at the departure kerb outside the PTB. AA has examined options for extending the kerb length, but they are costly and of limited effect;
- (b) bus and coach facilities – at present, about 7% of air passengers use cross-boundary coaches to commute between the airport and the Mainland. This type of cross-boundary traffic was not envisaged at the time of the design of the airport and there are no permanent passenger handling and coach staging facilities for such passengers. Cross-boundary passengers would further increase with the opening of Disneyland and the Hong Kong-Zhuhai-Macau Bridge. There is an urgent need to provide passenger handling facilities and additional coach staging area in the vicinity of the PTB; and
- (c) check-in counters – the demand for check-in counters has grown faster than originally planned, mostly as a

result of the overall accelerated growth in traffic. There is still some spare check-in capacity in the existing PTB, but AA envisages that additional check-in facilities would be required as we continue to expand our aviation network and attract more airlines to the airport.

5. A summary of the existing facilities and the estimated demand for facilities in 2005 and 2010 is at Enclosure 6.

6. To handle the increasing number of passengers at the airport, AA has started to construct a second passenger terminal building called the SkyPlaza. The SkyPlaza will initially include a new departure hall, 56 airline check-in counters, ground transportation facilities and some retail and office accommodation. On full development, AA envisages that the SkyPlaza will become an inter-modal transportation node, providing integrated transit services to passengers of air, land and sea transport. As an integral part of the new air passenger departure processing facilities, the Government would provide CIQ facilities to be manned by the C&ED, IMMD, HKPF and DH. We need to fit out the government accommodation required by these government departments for performing their functions.

## FINANCIAL IMPLICATIONS

7. We estimate the cost of the project to be \$40.7 million in MOD prices (see paragraph 8 below), made up as follows –

	<b>\$ million</b>
(a) Building	8.7
(b) Building services	8.5
(c) Furniture and equipment <sup>3</sup>	17.4
(d) Entrustment fees for the design and fitting out works <sup>4</sup>	2.8
(e) Contingencies	3.7
	<hr/>
	/Sub-total .....

<sup>3</sup> Based on an indicative list of furniture and equipment items and their estimated prices.

<sup>4</sup> Subject to further negotiation with AA, entrustment fees estimated at 16% of the value of the entrusted works would be paid to AA for carrying out the entrusted design and fitting out works for the CIQ facilities.

		<b>\$ million</b>	
	Sub-total	41.1	(in September 2004 prices)
(f)	Provision for price adjustment	(0.4)	
	Total	<u>40.7</u>	(in MOD prices)

The CFA of **172IC** is 2 000 m<sup>2</sup>. The estimated construction unit cost, represented by the building and the building services costs, is \$8,600 per m<sup>2</sup> of CFA in September 2004 prices. D Arch S considers the estimated project cost reasonable as compared with other similar fitting out works undertaken by the Government.

8. Subject to approval, we will phase the expenditure as follows –

<b>Year</b>	<b>\$ million (Sept 2004)</b>	<b>Price adjustment factor</b>	<b>\$ million (MOD)</b>
2005 – 06	5.0	0.99000	5.0
2006 – 07	24.0	0.98753	23.7
2007 – 08	12.1	0.99123	12.0
	<u>41.1</u>		<u>40.7</u>

9. We have derived the MOD estimates on the basis of the Government's latest forecast of trend rate of change in the prices of public sector building and construction output for the period 2005 to 2008. As the fitting out works for the CIQ facilities are integral to and inseparable from AA's SkyPlaza development, we intend to entrust the design and fitting out works for **172IC** to AA. AA will deliver the works of **172IC** through an instruction to carry out additional works under the construction contract for the SkyPlaza development.

10. We estimate the annual recurrent expenditure arising from this project to be \$6.6 million.

## **PUBLIC CONSULTATION**

11. AA has consulted the relevant parties involved in the SkyPlaza  
/development, .....

development, including the Airline Operators Committees and the Travel Industry Council of Hong Kong. They supported AA's SkyPlaza project and its plan to improve CIQ services for passengers by integrating air, land and sea transports within the SkyPlaza.

12. We consulted the Legislative Council Panel on Economic Services on 24 January 2005. Members generally supported this project.

## ENVIRONMENTAL IMPLICATIONS

13. The project is not a designated project under the Environmental Impact Assessment Ordinance. It will not cause any long-term environmental impact. During construction, the contractor is required to control noise, dust and site run-off nuisances to within established standards and guidelines through the implementation of mitigation measures in the relevant contracts. These include the use of silencers, mufflers, acoustic lining or shields for noisy construction activities, frequent cleaning and watering of the site, and the provision of wheel-washing facilities.

14. At the planning stage, we have considered measures to reduce the generation of construction and demolition (C&D) materials. We have introduced more prefabricated building elements into the fitting out works to reduce temporary formwork and construction waste. These include dry-wall partitioning and proprietary fittings and fixtures.

15. We will require the contractor to submit a waste management plan (WMP) for approval. The WMP will include mitigation measures to avoid, reduce, reuse and recycle C&D materials. We will require AA to ensure that the day-to-day operations on site comply with the approved WMP. We will control the disposal of public fill and C&D waste to designated public filling facilities and landfills respectively through a trip-ticket system. We will require the contractor to separate public fill from C&D waste for disposal at appropriate facilities. We will record the disposal, reuse and recycling of C&D materials for monitoring purposes. We estimate that the project will generate about 400 cubic metres (m<sup>3</sup>) of C&D materials. Of these, we will reuse about 40 m<sup>3</sup> (10%) on site, 160 m<sup>3</sup> (40%) as fill in public filling areas<sup>5</sup>, and dispose of 200 m<sup>3</sup>

/(50%<sup>6</sup>) .....

---

<sup>5</sup> A public filling area is a designated part of a development project that accepts public fill for reclamation purposes. Disposal of public fill in a public filling area requires a licence issued by the Director of Civil Engineering and Development.

(50%<sup>6</sup>) at landfills. The notional cost of accommodating C&D waste at landfill sites is estimated to be \$25,000 for this project (based on a notional unit cost<sup>7</sup> of \$125/m<sup>3</sup>).

## LAND ACQUISITION

16. This project does not require land acquisition.

## BACKGROUND INFORMATION

17. We upgraded **172IC** to Category B in October 2004.

18. The proposed fitting out works will not involve any tree removal or planting proposals.

19. We estimate that the project will create about 45 jobs (37 for labourers and another eight for professional/technical staff) providing a total employment of 500 man-months.

-----  
Economic Development and Labour Bureau  
February 2005

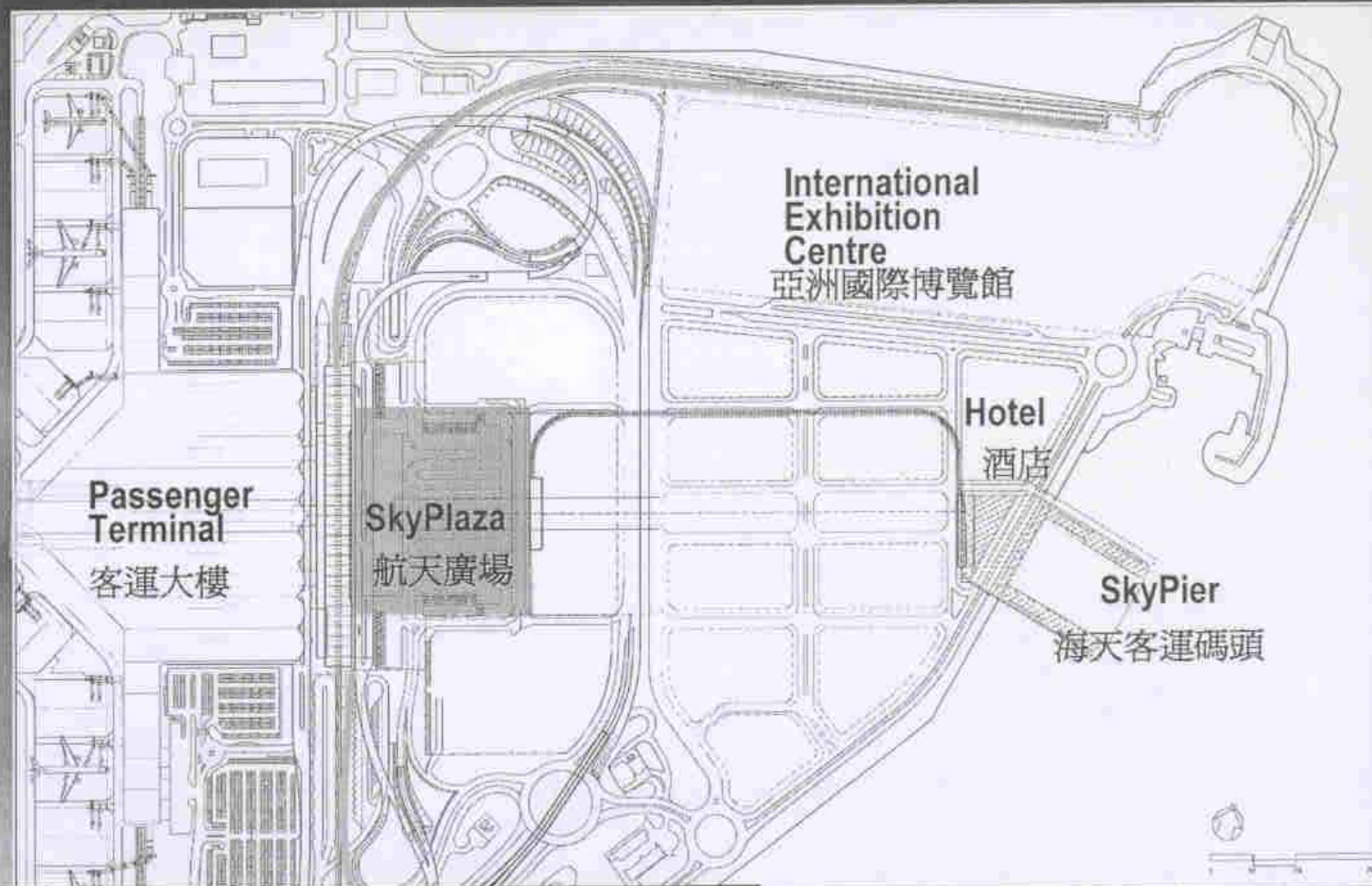
---

<sup>6</sup> There is a higher percentage of C&D wastes to be disposed of at landfills as the works of this project are for fitting out works in the building interior without involvement of any site formation works nor soil excavation for building construction works.

<sup>7</sup> This estimate has taken into account the cost for developing, operating and restoring the landfills after they are filled and the aftercare required. It does not include the land opportunity cost for existing landfill sites (which is estimated at \$90/m<sup>3</sup>), nor the cost to provide new landfills (which are likely to be more expensive) when the existing ones are filled. The notional cost estimate is for reference only and does not form part of this project estimate.

# SkyPlaza 航天廣場

附件一—Enclosure 1 to PWSC(2004-05)55



172IC

香港國際機場航天廣場內裝置海關，出入境，檢疫設施工程  
Fitting-out works for customs, immigration and quarantine facilities at the SkyPlaza of the Hong Kong International Airport

AIRPORT AUTHORITY HONG KONG





現有富豪機場酒店  
EXISTING REGAL HOTEL

現有多層停車場  
EXISTING  
MULTI-STOREY  
CAR PARK

現有客運大樓  
EXISTING PASSENGER TERMINAL BUILDING

現有地面運輸中心大樓  
EXISTING GROUND TRANSPORTATION CENTRE BUILDING  
擬建離境道路  
FUTURE DEPARTURE ROAD

航天廣場  
SKYPLAZA

機場路 AIRPORT ROAD

現有露天停車場  
EXISTING  
OPEN-AIR CAR PARK

航天廣場  
SKYPLAZA

香港國際機場  
HONG KONG  
INTERNATIONAL AIRPORT

大嶼山  
LANTAU ISLAND

位置圖 SITE LOCATION PLAN

SCALE : N.T.S.

1721C

香港國際機場航天廣場內裝置  
海關，出入境，檢疫設施工程

Fitting-out works for customs, immigration and  
quarantine facilities at the SkyPlaza of the  
Hong Kong International Airport.

drawn by

K.H. CHAN

date

11-2004

approved

K.C. MAK

date

11-2004

office

PROJECT MANAGEMENT BRANCH 2

drawing no.

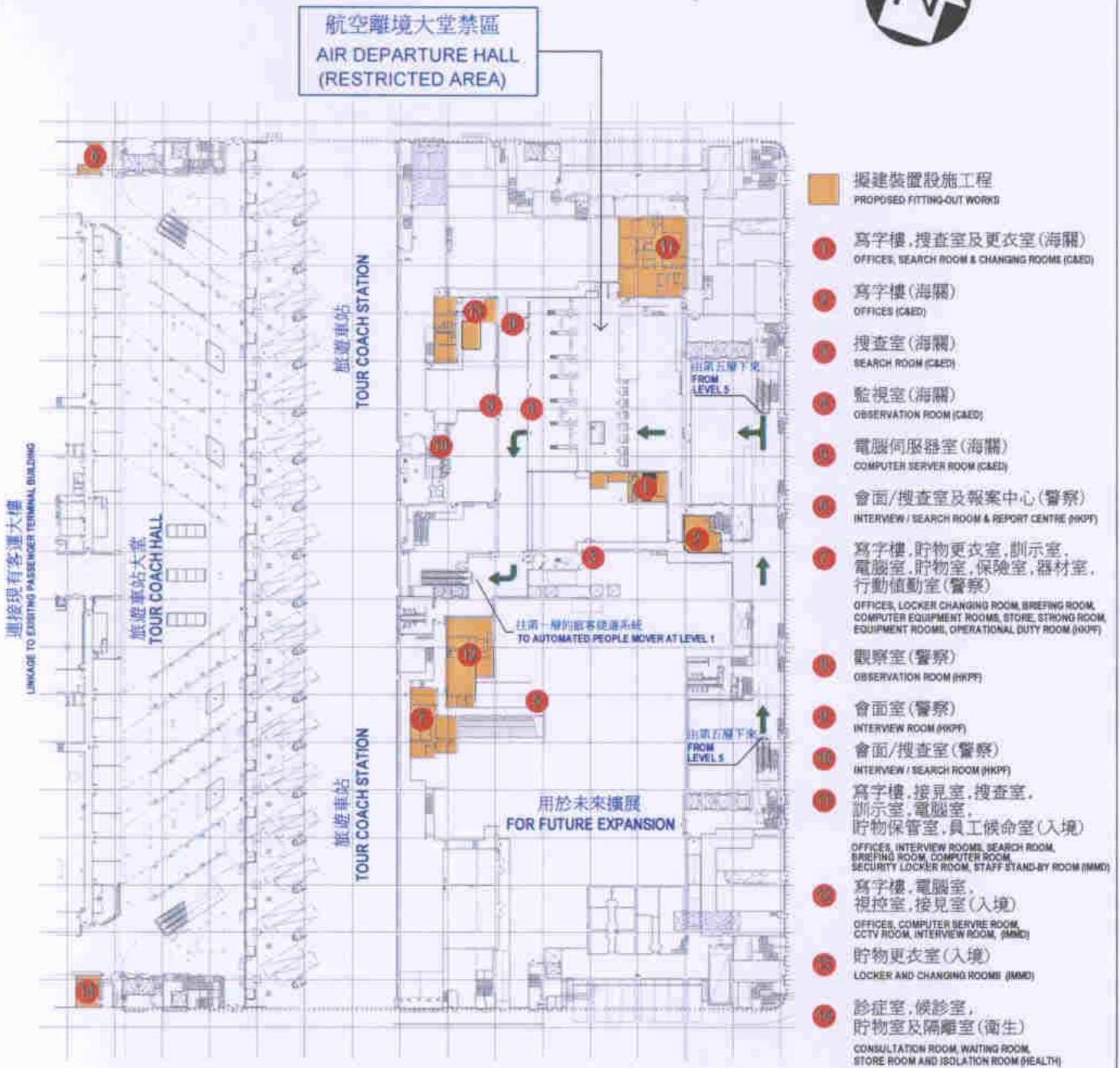
AB/6955/XA101

scale

N.T.S.




ARCHITECTURAL  
SERVICES  
DEPARTMENT



航天廣場建築工程 - 第三層平面圖  
 SKYPLAZA BUILDING WORKS - LEVEL 3 LAYOUT PLAN

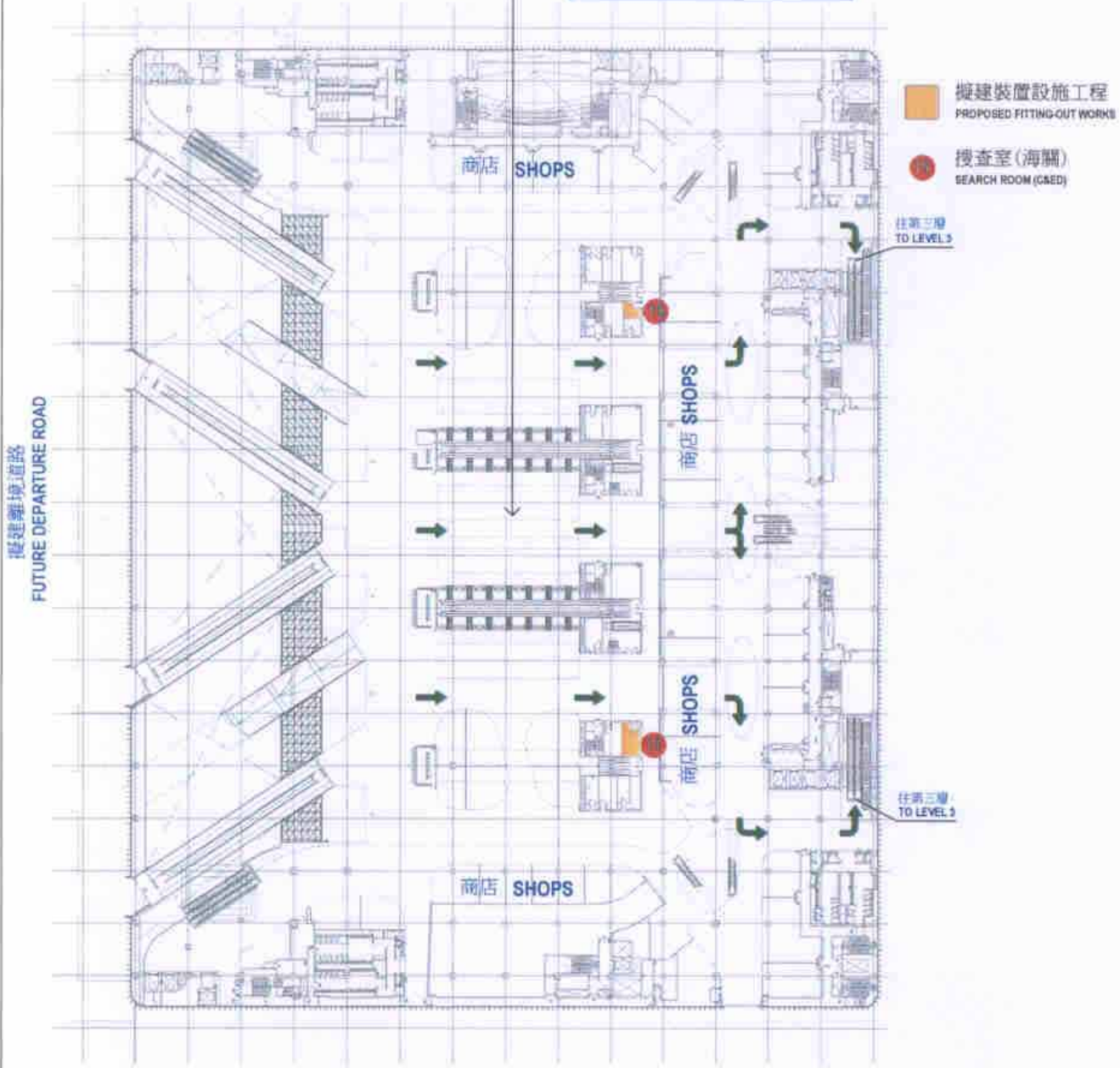
旅客流動方向指示  
 PASSENGER FLOW DIRECTION

\* 最後設計可能有所修訂  
 LAYOUT SUBJECT TO DESIGN DEVELOPMENT

1721C 香港國際機場航天廣場內裝置 海關, 出入境, 檢疫設施工程 Fitting-out works for customs, immigration and quarantine facilities at the SkyPlaza of the Hong Kong International Airport.	drawn by K.H. CHAN	date 11-2004	drawing no. AB/6955/XA102	scale N.T.S
	approved K.C. MAK	date 11-2004	 ARCHITECTURAL SERVICES DEPARTMENT	
office PROJECT MANAGEMENT BRANCH 2				



航空公司旅客登記區  
AIRLINES CHECK-IN AREA




航天廣場建築工程 - 第五層平面圖

SKYPLAZA BUILDING WORKS - LEVEL 5 LAYOUT PLAN

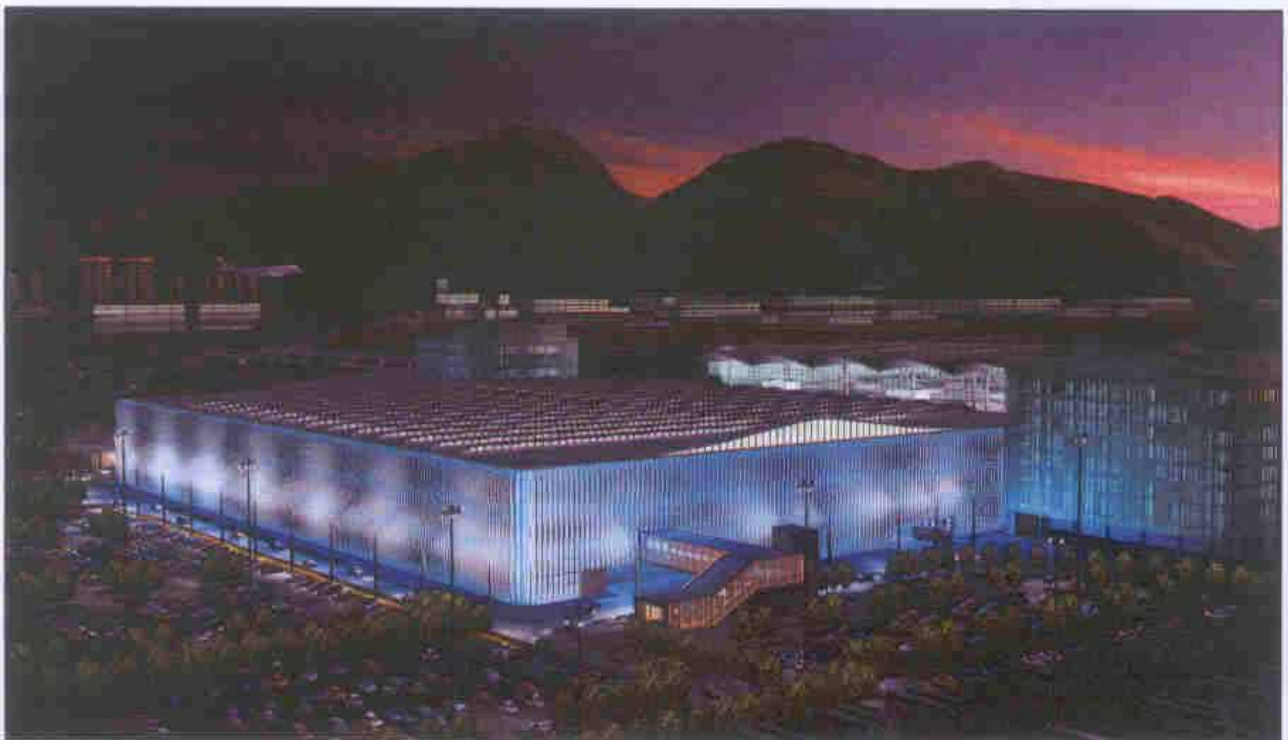
旅客流動方向指示  
PASSENGER FLOW DIRECTION

\* 最後設計可能有所修訂  
LAYOUT SUBJECT TO DESIGN DEVELOPMENT

1721C 香港國際機場航天廣場內裝置 海關，出入境，檢疫設施工程 Fitting-out works for customs, immigration and quarantine facilities at the SkyPlaza of the Hong Kong International Airport	drawn by K.H. CHAN	date 11-2004	drawing no. AB/6955/XA103	scale N.T.S
	approved K.C. MAK	date 11-2004	 ARCHITECTURAL SERVICES DEPARTMENT	
	office PROJECT MANAGEMENT BRANCH 2			



室內透視圖 INTERIOR PERSPECTIVE



透視圖(晚間) PERSPECTIVE VIEW (NIGHT)

172IC

香港國際機場航天廣場內裝置  
海關，出入境，檢疫設施工程

Fitting-out works for customs, immigration and  
quarantine facilities at the SkyPlaza of the  
Hong Kong International Airport.

drawn by K.H. CHAN

date  
11-2004

drawing no.  
AB/6955/XA104

scale  
N.T.S.

approved K.C. MAK

date  
11-2004

office  
PROJECT MANAGEMENT BRANCH 2



ARCHITECTURAL  
SERVICES  
DEPARTMENT

**Summary of Facilities Required at the SkyPlaza**

	<b>Year 2004</b>	<b>Year 2005</b>		<b>Year 2010</b>	
<b>Facilities</b>	<b>Existing (a)</b>	<b>Estimated demand (b)</b>	<b>Additional facilities required (b) - (a)</b>	<b>Estimated demand (c)</b>	<b>Additional facilities required (c) - (a)</b>
Departure kerb length (m)	600	620	<b>20</b>	720	<b>120</b>
Check-in counters	288	306	<b>18</b>	324	<b>36</b>
Franchise bus bays	17	18	<b>1</b>	20	<b>3</b>
Tour coach lounge (m <sup>2</sup> )	0	600	<b>600</b>	770	<b>770</b>
Mainland coach lounge (m <sup>2</sup> )	300	550	<b>250</b>	625	<b>325</b>