

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

### **Supplementary Information on 6GD – Immigration Service Training School and Perowne Immigration Centre at Castle Peak Road, Tuen Mun – stage 2**

#### **INTRODUCTION**

In considering PWSC(2002-03)39 on **6GD** at the Public Works Subcommittee meeting held on 5 June 2002, Members requested the Administration to provide the following information –

- (a) a detailed account, including the type, nature and quantity, of the construction and demolition (C&D) materials generated from implementation of the proposal; and
- (b) an assessment on whether it is possible to reduce the percentage of C&D materials to be disposed of at landfill.

#### **THE ADMINISTRATION'S RESPONSE**

2. Construction of the Immigration Service Training School and the Perowne Immigration Centre is carried out in two stages. In June 2001, Finance Committee approved the upgrading of part of **6GD** as **7GD**, entitled “Immigration Service Training School and Perowne Immigration Centre at Castle Peak Road, Tuen Mun – stage 1”, to Category A which covers the demolition, site formation and piling/foundation works for the project. The proposal in PWSC(2002-03)39 aims to upgrade the remainder of **6GD**, entitled “Immigration Service Training School and Perowne Immigration Centre at Castle Peak Road, Tuen Mun – stage 2”, to Category A for stage 2 of the project which covers construction works.

3. A summary of the estimated quantity of C&D materials to be generated from implementation of both stage 1 (**7GD**) and stage 2 (**6GD**) of the project is given below –

	<b>Stage 1 (7GD)</b>	<b>Stage 2 (6GD)</b>	<b>Total</b>
(a) C&D materials to be reused on site	2 400 m <sup>3</sup> (8.4%)	500 m <sup>3</sup> (6.6%)	<b>2 900 m<sup>3</sup></b> <b>(8.0%)</b>
(b) C&D materials to be disposed of at public filling areas	25 000 m <sup>3</sup> (87.4%)	4 500 m <sup>3</sup> (59.2%)	<b>29 500 m<sup>3</sup></b> <b>(81.5%)</b>
(c) C&D materials to be disposed of at landfills	1 200 m <sup>3</sup> (4.2%)	2 600 m <sup>3</sup> (34.2%)	<b>3 800 m<sup>3</sup></b> <b>(10.5%)</b>
<b>Total C&amp;D materials</b>	<b>28 600 m<sup>3</sup></b>	<b>7 600 m<sup>3</sup></b>	<b>36 200 m<sup>3</sup></b>

A detailed account of the C&D materials generated from the stage 2 works (**6GD**) is at Enclosure 1.

4. As indicated in the above summary, the main bulk of the C&D materials of the project is generated during stage 1 (i.e., demolition, site formation and piling/foundation works), and most of that has been reused on site or disposed of as public fill. Taking the project as a whole covering both stages 1 and 2, the percentage of C&D materials to be disposed of at landfills is around 10.5%, which is within reasonable range<sup>1</sup> for building projects.

5. We have considered ways of minimising the generation of C&D materials for the project at the planning and design stage. The Architectural Services Department (Arch SD) has designed the ground floor levels in such a way that the use of suitable excavated materials for filling within the site will be optimised to minimise off-site disposal. To further minimise the generation of /C&D .....

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<sup>1</sup> As quantities of C&D materials generated from any projects are subject to site or project specific variables, they are hardly comparable unless similar in all aspects. For reference, the percentage of C&D materials disposed of at landfills is about 15.9% for **173SC** “Centre for Youth Development” with similar construction floor areas, and is about 9.4% for **12NB** “Public Mortuary in Area 26E, Kwai Chung” which is a project of much smaller scale.

C&D materials, Arch SD will encourage the contractors to use non-timber formwork and recyclable materials for temporary works. In addition, under the contracts, the contractors will not be permitted to use hardwood for site accommodation, storage sheds, screens, hoardings, covered walkways, signboards and excavation supports, and will be required to use metal site hoardings and signboards so that these materials can be recycled or reused in other projects. Arch SD will also require the contractors to submit a waste management plan setting out mitigation measures to avoid, reduce, reuse and recycle C&D materials. Arch SD will ensure that the day-to-day operations on site comply with the approved waste management plan.

6. To further enhance the current system for management of C&D materials, Works Bureau will issue a new Technical Circular in July 2002 to require works departments to draw up C&D Material Management Plan at an early stage of a project in order to incorporate design measures to minimise generation of C&D materials, and to optimise the reuse/recycling of the materials generated. The Government's intention is to set up a high-level Departmental Vetting Committee chaired by an officer at the rank of D2 or above for vetting C&D Material Management Plans prepared by works departments in future.

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Security Bureau  
June 2002

**Enclosure 1 to PWSCI(2002-03)16**

**Estimated Quantity of C&D Materials for Stage 2 of the  
Construction of Immigration Service Training School and  
Perowne Immigration Centre**

A detailed account of the C&D materials generated from the implementation of **6GD** is as follows –

	<b>Type and nature</b>	<b>Estimated quantity (m<sup>3</sup>)</b>	<b>Percentage (%)</b>
(a)	C&D materials to be reused on site  These include excavated materials (such as earth, rocks and rubbles) that can be reused for general site levelling and as granular materials for paving, road sub-base, drainage layers, etc. for this project.	500	6.6
(b)	C&D materials to public filling areas  These include surplus excavated materials (such as earth, rock and rubbles), construction wastes (such as slurry, broken concrete and brick) and other inert materials that can be used as fill in public filling areas.	4 500	59.2
(c)	C&D materials to landfills  These include construction wastes of organic materials (such as timber, bamboo and plastics), food scraps and other wastes from the workforce and on-site activities. As most of these C&D wastes are mixed and contaminated, they are not suitable for reuse or recycling and will therefore be disposed of at landfills.	2 600	34.2
<b>Total :</b>		7 600	100.0