



Water for All: Conserve, Value, Enjoy

Our Ref: PUB (CW) 100/14/009

E-mail Add: Tan_Nguan_Sen@pub.gov.sg

6 Sept 2012

Tel: 67313210

(Please see distribution list)

Dear Sir/Madam

**CHECKLIST FOR SUBMISSION OF DEVELOPMENT CONTROL PLANS TO
PUB CATCHMENT & WATERWAYS DEPARTMENT**

In order to enhance the completeness in Development Control (DC) plan submission by Qualified Person (QP) to PUB, we will be publishing a new checklist to guide the QP to comply with PUB drainage requirements.

2 For each DC application, the QP for the project is required to submit a signed copy of the completed checklist, together with the relevant plan for submission. A copy of the checklist is attached in this letter (refer to Annex A) and will be made available in the official website of PUB and NEA. PUB will commence the implementation of this checklist from 1 Oct 2012. Any DC submission made after 1 Nov 2012 without this checklist will be rejected.

3 We will be organising a sharing session on the 6th edition of Code of Practice on Surface Water Drainage and the submission requirements on 24 Sept 2012. Please register with Miss Ng Zhi Ying (email: Ng_Zhi_Ying@pub.gov.sg) by 19 Sept 2012. All QPs are encouraged to attend this sharing session. More details of the sharing session could be found in Annex B.

4 We would appreciate it if you could convey the contents of this circular to relevant members of your organization. If you have any queries concerning this circular, please do not hesitate to contact Mr Chow Siew Hung (Tel: 67313921) or Miss Ng Zhi Ying (Tel: 67313481). The circular is also available from our website.

Yours faithfully,

A handwritten signature in black ink, appearing to be 'TAN NGUAN SEN', with a long horizontal flourish extending to the right.

TAN NGUAN SEN
DIRECTOR (CATCHMENT & WATERWAYS)
PUB

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PUBLIC UTILITIES BOARD
CATCHMENT & WATERWAYS DEPARTMENT
CHECKLIST FOR DC PLANS

Proposal: _____

Name of Qualified Person: _____

<u>GENERAL</u>	<u>YES</u>	<u>NOT APPLICABLE</u>
1 Applied and obtained Drainage Interpretation Plan (DIP)	<input type="checkbox"/>	<input type="checkbox"/>
2 Site boundary lines indicated	<input type="checkbox"/>	<input type="checkbox"/>
3 Proposed internal drains are able to discharge into roadside/ outlet drain as shown on plan	<input type="checkbox"/>	<input type="checkbox"/>
4 Proposed discharge point of internal drains are highlighted on plan	<input type="checkbox"/>	<input type="checkbox"/>
5 If the proposed development site area exceeds 0.4 ha, hydraulic calculations for the proposed internal drainage facilities, including sub-catchment plan of the proposed development site endorsed by a Professional Engineer (Civil) to be submitted for Public Utilities Board (PUB) record at Detailed Plan submission stage	<input type="checkbox"/>	<input type="checkbox"/>
6 All addition and alteration works highlighted	<input type="checkbox"/>	<input type="checkbox"/>
7 For JTC, HDB, URA developments, the overall drainage masterplan of the development site shall be attached together with the submission	<input type="checkbox"/>	<input type="checkbox"/>
 <u>DRAINAGE RESERVE</u>		
8 Drainage Reserve lines and lot boundaries indicated, dimensioned and highlighted	<input type="checkbox"/>	<input type="checkbox"/>
 <u>COMMON DRAIN</u>		
9 Alignment, size and flow of existing common drain within the development lot indicated	<input type="checkbox"/>	<input type="checkbox"/>
10 If there is common drain within the development site, the following shall be endorsed on the plan: <i>"Surface runoff from the site and all neighbouring lots shall continue to be allowed to discharge through the common drain within the site."</i>	<input type="checkbox"/>	<input type="checkbox"/>
11 There is no permanent structure erected above and over the common drain	<input type="checkbox"/>	<input type="checkbox"/>
12 If the proposal involves the reconstruction of common drain, the proposed common drain shall be at least 450mm wide as stipulated in Section 4.5 of Code of Practice on Surface Water Drainage or any other sizes as directed by PUB	<input type="checkbox"/>	<input type="checkbox"/>
13 Details of the proposed common drain to be submitted by Professional Engineer (Civil) separately to PUB for approval. This is to be annotated on the plan	<input type="checkbox"/>	<input type="checkbox"/>
14 The position of the existing/proposed boundary wall/fence clearly indicated	<input type="checkbox"/>	<input type="checkbox"/>

<u>MINIMUM PLATFORM LEVEL (MPL)</u>		(Indicate the MPL)	
15	MPL of development	_____	
		<u>YES</u>	<u>NOT APPLICABLE</u>
16	All proposed/existing platform levels shall be clearly indicated on plan	<input type="checkbox"/>	<input type="checkbox"/>
17	The proposed platform levels and road/ground levels adjacent to the internal drain outlet discharge point clearly indicated	<input type="checkbox"/>	<input type="checkbox"/>
18	For addition and alteration works submission, the existing platform levels indicated	<input type="checkbox"/>	<input type="checkbox"/>
19	Linkage (direct/indirect)* to special underground facilities and basements indicated and complied with the latest Code of Practice on Surface Water Drainage (*Delete appropriately)	<input type="checkbox"/>	<input type="checkbox"/>
 <u>OPENING LEADING TO BASEMENT LEVEL</u>			
20	Crest level of access ways and openings leading into the basement indicated and complied with the latest Code of Practice on Surface Water Drainage	<input type="checkbox"/>	<input type="checkbox"/>
21	Cut off drain indicated	<input type="checkbox"/>	<input type="checkbox"/>
 <u>PUMPED DRAINAGE SYSTEM</u>			
22	Pumped drainage system complied with the latest Code of Practice on Surface Water Drainage. Details of pumped drainage system and design computations duly endorsed by PE shall be submitted separately to PUB for record	<input type="checkbox"/>	<input type="checkbox"/>
23	Source catchment area with surface runoff leading into the pumped drainage system clearly indicated	<input type="checkbox"/>	<input type="checkbox"/>
24	The location, size, inlet and outlet connections of the rainwater pump sump for the proposed pumped drainage system clearly indicated	<input type="checkbox"/>	<input type="checkbox"/>
 <u>PROPOSED DRAINAGE WORKS</u>			
25	Proposed/ existing drains and drains to be deleted clearly indicated using different colour	<input type="checkbox"/>	<input type="checkbox"/>
26	Alignment, summit point, flow direction, type & size and outlet discharge points of the proposed/existing internal drains clearly indicated	<input type="checkbox"/>	<input type="checkbox"/>
27	Connection point to existing drain indicated	<input type="checkbox"/>	<input type="checkbox"/>
28	Sump size indicated	<input type="checkbox"/>	<input type="checkbox"/>
29	Vertical grating at internal drain outlet discharge point provided	<input type="checkbox"/>	<input type="checkbox"/>
30	External drainage works (including culvert details) to be submitted separately. This shall be clearly annotated on plan	<input type="checkbox"/>	<input type="checkbox"/>

	<u>YES</u>	<u>NOT APPLICABLE</u>
<u>RETAINING WALL</u>		
31	<input type="checkbox"/>	<input type="checkbox"/>
If a retaining wall is erected to raise the ground level of the development site above adjacent premises, adequate internal drainage system provided to effectively intercept and drain away runoff including the sub-soil flow from the development site		
32	<input type="checkbox"/>	<input type="checkbox"/>
If a retaining wall is erected to lower the ground level of the development site, adequate internal drainage system provided to effectively intercept and drain away existing sub-soil and overland flows discharging through the development site from the adjacent premises		
<u>DRAINAGE AFFECTING OTHER PREMISES</u>		
33	<input type="checkbox"/>	<input type="checkbox"/>
Minimum 600mm high solid boundary wall around development site is erected to prevent surface runoff from overflowing into adjacent premises on lower ground		

I hereby confirm that the above items have been complied with and endorsed on the plans.

I hereby also certify that (the standard endorsement below will also be certified on the plans):-

- (a) The planning, design, construction activities and procedures for plan submission shall comply fully with the requirements as stipulated in the latest edition of the Code of Practice on Surface Water Drainage and The Sewerage and Drainage (Surface Water Drainage) Regulations 1999.
- (b) The capacity of internal drains shall be sufficient to intercept and discharge all runoff from the development site.
- (c) The runoff within, upstream of and adjacent to the development lot can be effectively drained away without causing flooding within the lot or in areas outside the lot.

Name & Signature of Qualified Person

Date

PE Registration No: _____

Public Utilities Board (PUB) reserves the right to report any false declaration of information to the relevant professional bodies for action in accordance to the Act/ethnics governing all the Qualified Professional.

ANNEX B

Sharing Session on the 6th Edition of Code of Practice on Surface Water Drainage & Submission Requirements

Date: 24 Sept 2012 (Monday)

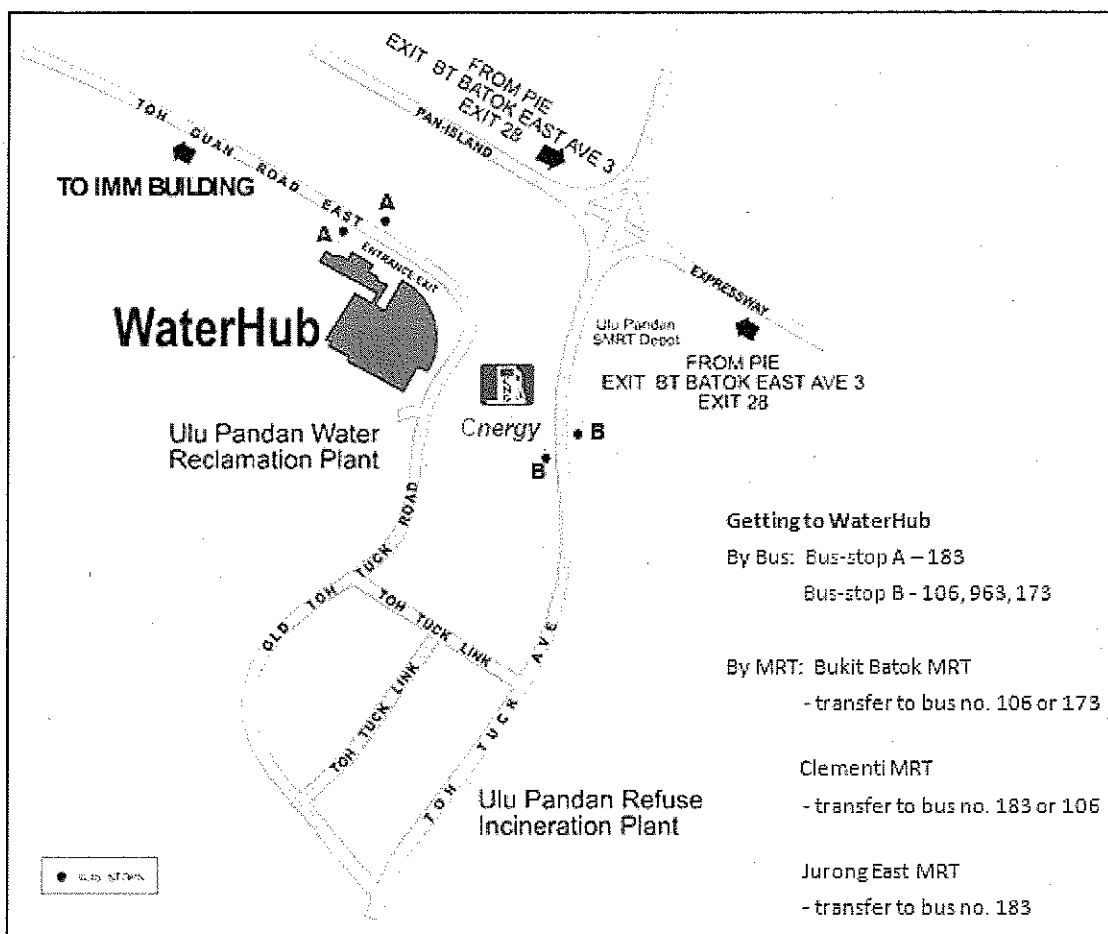
Time: Session 1 (8:45am to 12 noon) Session 2 (1:15pm to 5:00pm)

QP is only required to attend one session. Detailed programme could be found at Page 2 of Annex B

Venue: Auditorium, Waterhub
80 Toh Guan Road East
Singapore 608575

Registration Deadline: 19 Sept 2012

Please register with Miss Ng Zhi Ying (email: Ng_Zhi_Ying@pub.gov.sg) / Tel: 67313481 with your full name, IC number, profession if you wish to attend the sharing session.



Sharing Session on the 6th Edition of Code of Practice on Surface Water Drainage & Submission Requirements

Time	Activity
Session 1: 0845 Session 2: 1345	Registration
Session 1: 0915 Session 2: 1415	Opening Address by Director of Catchment & Waterways, Mr Tan Nguan Sen / Chief Engineer (Drainage Planning), Mr Ridzuan Ismail
Session 1: 0930 Session 2: 1430	Sharing Session on the 6 th Edition of Code of Practice on Surface Water Drainage
Session 1: 1030 Session 2: 1530	Tea Break
Session 1: 1045 Session 2: 1545	Sharing Session on the Implementation of PUB Drainage Checklist for Development Control (DC) Plans
Session 1: 1100 Session 2: 1600	Sharing Session by Water Reclamation (Network) Department
Session 1: 1145 Session 2: 1645	Q&A Session
Session 1: 1200 Session 2: 1700	End