

**LEGISLATIVE COUNCIL BRIEF**

**Water Pollution Control Ordinance  
(Chapter 358)**

**WATER POLLUTION CONTROL (NORTH WESTERN  
SUPPLEMENTARY WATER CONTROL ZONE) ORDER**

**WATER POLLUTION CONTROL (SECOND SOUTHERN  
SUPPLEMENTARY WATER CONTROL ZONE) ORDER**

**WATER POLLUTION CONTROL (NORTH WESTERN  
SUPPLEMENTARY WATER CONTROL ZONE) (APPOINTED DAYS) ORDER**

**WATER POLLUTION CONTROL (SECOND SOUTHERN  
SUPPLEMENTARY WATER CONTROL ZONE) (APPOINTED DAYS) ORDER**

**STATEMENT OF WATER QUALITY OBJECTIVES  
(NORTH WESTERN SUPPLEMENTARY WATER CONTROL ZONE)**

**STATEMENT OF WATER QUALITY OBJECTIVES  
(SECOND SOUTHERN SUPPLEMENTARY WATER CONTROL ZONE)**

**INTRODUCTION**

At the meeting of the Executive Council on 14 September 1999, the Council ADVISED and the Acting Chief Executive ORDERED that the following Orders and Statements should be made under sections 4, 5 and 7 of the Water Pollution Control Ordinance (WPCO) -

- (a) Water Pollution Control (North Western Supplementary Water Control Zone) Order (Annex A);
- (b) Water Pollution Control (Second Southern Supplementary Water Control Zone) Order (Annex B);
- (c) Water Pollution Control (North Western Supplementary Water Control Zone) (Appointed Days) Order (Annex C);

- (d) Water Pollution Control (Second Southern Supplementary Water Control Zone) (Appointed Days) Order (Annex D);
- (e) Statement of Water Quality Objectives (North Western Supplementary Water Control Zone) (Annex E); and
- (f) Statement of Water Quality Objectives (Second Southern Supplementary Water Control Zone) (Annex F).

to extend water pollution controls to these areas.

## **BACKGROUND AND ARGUMENT**

2. Areas of waters adjacent to the existing North Western Water Control Zone(WCZ) and Southern WCZ, which are shown as Areas A, B and C in Annex G, have become part of the HKSAR after the resumption of sovereignty in July 1997. They are not covered by any existing WCZs. To extend controls on water pollution in these areas, in line with the rest of Hong Kong, it is proposed that, in accordance with section 4 of the WPCO, the North Western Supplementary Water Control Zone (NWSWCZ) and the Second Southern Supplementary Water Control Zone (SSSWCZ) be declared. It is further proposed that, in accordance with section 5 of the WPCO, water quality objectives (WQOs) be established for these two proposed WCZs.

3. In accordance with sections 7(2) and (3) of the WPCO, a First Appointed Day (FAD) and a Second Appointed Day (SAD) will be declared for each of the NWSWCZ and the SSSWCZ. Any new discharge which commences after the FAD will have to obtain a licence from the Environmental Protection Department (EPD) before discharge is permitted. Discharges which have already existed before the FAD can continue after the FAD but have to obtain a licence from EPD before the SAD.

## **THE ORDERS AND STATEMENTS**

4. The Order at Annex A delineates the boundaries of the proposed NWSWCZ, which is shown on the map at Annex H. The Order at Annex B delineates the boundaries of the proposed SSSWCZ, which is shown on the map at Annex I.

5. The Orders at Annexes C and D stipulate the FAD and the SAD for the NWSWCZ and the SSSWCZ respectively, which are 1 November 1999 and 1 December 1999 for each of the WCZs.

6. The Statements at Annexes E and F set out the established WQOs of the various parts of the NWSWCZ and the SSSWCZ respectively. They are similar to those established for the marine waters and secondary contact recreation subzones of their adjacent WCZs.

## **PUBLIC CONSULTATION**

7. The Islands Provisional District Board was consulted on the proposal on 3 May 1999. No objection was raised. The Advisory Council on the Environment endorsed the proposal on 28 June 1999.

## **BINDING EFFECT OF THE LEGISLATION**

8. The proposed subsidiary legislation will not affect the current binding effect of the principal Ordinance.

## **HUMAN RIGHTS IMPLICATIONS**

9. The Department of Justice advises that the proposed Orders have no human rights implications.

## **FINANCIAL AND STAFFING IMPLICATIONS**

10. As the two proposed WCZs cover remote waters of Hong Kong and the areas adjacent to them are already covered by the existing WCZs, the number of licences to be issued by EPD for effluent discharges in the proposed WCZs will be small. No additional resources will be required by EPD for enforcing controls in those areas. The amount of revenue from licence fees will be insignificant.

## **ECONOMIC IMPLICATIONS**

11. As there are no commercial or industrial establishments within the two proposed WCZs, the declaration of those areas as WCZs is unlikely to have economic impact on any commercial and industrial activities.

## **ENVIRONMENTAL IMPLICATIONS**

12. The water quality of the areas to be covered by the two proposed WCZs is generally good at present. The declaration of the WCZs and the establishment of the WQOs would help protect and maintain the water quality there.

## **LEGISLATIVE TIMETABLE**

13. The Orders and Statements would be tabled at the Legislative Council on 6 October 1999.

## **PUBLICITY**

14. The Orders and Statements were gazetted and a press release was issued on 24 September 1999. A spokesman is available for answering media enquiries.

## **ENQUIRIES**

15. Enquiries may be directed to :

Mr. Eugene Fung  
Assistant Secretary for Planning, Environment and Lands (Environment)  
9/F, Murray Building  
Garden Road, Central  
Hong Kong  
Telephone : 2848 2833  
Fax No. : 2234 9106

or  
Mr. Anthony Fok  
Senior Environmental Protection Officer (Waste Policy & Services Group),  
Environmental Protection Department  
26/F, Southorn Centre,  
130 Hennessy Road, Wanchai,  
Hong Kong  
Telephone : 2835 1223  
Fax No. : 2318 1877

**Planning, Environment and Lands Bureau**  
**File Reference: PELB(E)55/04/141(99)Pt.2**

**WATER POLLUTION CONTROL (NORTH WESTERN SUPPLEMENTARY  
WATER CONTROL ZONE) ORDER**

(Made by the Chief Executive in Council under section 4 of the Water  
Pollution Control Ordinance (Cap. 358) after consultation  
with the Advisory Council on the Environment)

**1. Declaration of North Western Supplementary  
Water Control Zone**

That part of Hong Kong more particularly described in the Schedule is declared to be  
a water control zone and is to be known as the North Western Supplementary Water Control  
Zone.

**SCHEDULE**

[s. 1]

The area of Hong Kong bounded by grey edging on a map marked NWSWCZ and  
described as "NORTH WESTERN SUPPLEMENTARY WATER CONTROL ZONE",  
signed by the Secretary for Planning, Environment and Lands on 3 September 1999 and  
deposited in the Land Registry at Victoria.

Clerk to the Executive Council

COUNCIL CHAMBER

14 September 1999

### Explanatory Note

This Order declares a new water control zone known as the North Western Supplementary Water Control Zone for the purposes of the Water Pollution Control Ordinance (Cap. 358).

**WATER POLLUTION CONTROL (SECOND SOUTHERN SUPPLEMENTARY  
WATER CONTROL ZONE) ORDER**

(Made by the Chief Executive in Council under section 4 of the Water Pollution Control Ordinance (Cap. 358) after consultation with the Advisory Council on the Environment)

**1. Declaration of Second Southern Supplementary  
Water Control Zone**

That part of Hong Kong more particularly described in the Schedule is declared to be a water control zone and is to be known as the Second Southern Supplementary Water Control Zone.

**SCHEDULE**

[s. 1]

The area of Hong Kong bounded by grey edging on a map comprising 2 sheets marked SSSWCZ1 and SSSWCZ2 respectively and described as "SECOND SOUTHERN SUPPLEMENTARY WATER CONTROL ZONE", signed by the Secretary for Planning, Environment and Lands on 3 September 1999 and deposited in the Land Registry at Victoria.

Clerk to the Executive Council

COUNCIL CHAMBER

14 September 1999

### Explanatory Note

This Order declares a new water control zone known as the Second Southern Supplementary Water Control Zone for the purposes of the Water Pollution Control Ordinance (Cap. 358).



**WATER POLLUTION CONTROL (NORTH WESTERN SUPPLEMENTARY  
WATER CONTROL ZONE) (APPOINTED DAYS) ORDER**

(Made under section 7(2) and (3) of the Water Pollution  
Control Ordinance (Cap. 358) after consultation  
with the Executive Council)

**1. Application**

This Order applies to the North Western Supplementary Water Control Zone.

**2. Appointed days**

The day appointed -

- (a) under section 7(2) of the Ordinance is 1 November 1999; and
- (b) under section 7(3) of the Ordinance is 1 December 1999.

Chief Executive

17th September 1999

**Explanatory Note**

The object of this Order is to introduce the controls imposed by the Water Pollution Control Ordinance (Cap. 358) to the North Western

Supplementary Water Control Zone.

2. Section 7(2) of the Ordinance empowers the Chief Executive, after consultation with the Executive Council, to appoint a day by reference to which discharges or deposits shall be classified as existing discharges or existing deposits for the purposes of the Ordinance. Section 7(3) of the Ordinance empowers the Chief Executive, after consultation with the Executive Council, to appoint a day on and after which all existing discharges or existing deposits shall be prohibited unless licensed under the Ordinance.

3. Under section 7(1) (a) of the Ordinance, any discharge or deposit which is not an existing discharge or an existing deposit shall be prohibited from the day appointed under section 7(2) of the Ordinance unless licensed under the Ordinance.

**WATER POLLUTION CONTROL (SECOND SOUTHERN SUPPLEMENTARY  
WATER CONTROL ZONE) (APPOINTED DAYS) ORDER**

(Made under section 7(2) and (3) of the Water Pollution  
Control Ordinance (Cap. 358) after consultation  
with the Executive Council)

**1. Application**

This Order applies to the Second Southern Supplementary Water Control Zone.

**2. Appointed days**

The day appointed -

- (a) under section 7(2) of the Ordinance is 1 November 1999; and
- (b) under section 7(3) of the Ordinance is 1 December 1999.

Chief Executive

17th September 1999

**Explanatory Note**

The object of this Order is to introduce the controls imposed by the Water Pollution Control Ordinance (Cap. 358) to the Second Southern

Supplementary Water Control Zone.

2. Section 7(2) of the Ordinance empowers the Chief Executive, after consultation with the Executive Council, to appoint a day by reference to which discharges or deposits shall be classified as existing discharges or existing deposits for the purposes of the Ordinance. Section 7(3) of the Ordinance empowers the Chief Executive, after consultation with the Executive Council, to appoint a day on and after which all existing discharges or existing deposits shall be prohibited unless licensed under the Ordinance.

3. Under section 7(1) (a) of the Ordinance, any discharge or deposit which is not an existing discharge or an existing deposit shall be prohibited from the day appointed under section 7(2) of the Ordinance unless licensed under the Ordinance.

**STATEMENT OF WATER QUALITY OBJECTIVES (NORTH WESTERN  
SUPPLEMENTARY WATER CONTROL ZONE)**

(Made under section 5 of the Water Pollution Control  
Ordinance (Cap. 358) after consultation with  
the Advisory Council on the Environment)

1. The water quality objectives set out in column 1 of the Schedule are established for those parts of the North Western Supplementary Water Control Zone set opposite those water quality objectives in column 2 of the Schedule.

2. In this Statement -

"Map" (地圖) means the map marked NWSWCZ and described as "NORTH WESTERN SUPPLEMENTARY WATER CONTROL ZONE", signed by the Secretary for Planning, Environment and Lands on 3 September 1999 and deposited in the Land Registry at Victoria;

"Secondary Contact Recreation Subzone" (次級接觸康樂活動分區) means an area delineated as such on the Map.

**SCHEDULE**

[s. 1]

**Water Quality Objective**

**Part or Parts of Zone**

**A. AESTHETIC APPEARANCE**

- |   |            |
|---|------------|
| (a) Waste discharges should not cause any objectionable odour or discolouration of the water. | Whole zone |
|---|------------|

- |     |   |            |
|-----|---|------------|
| (b) | Tarry residues, floating wood, articles made of glass, plastic, rubber or of any other substances should be absent.   | Whole zone |
| (c) | Mineral oil should not be visible on the surface. Surfactants should not give rise to a lasting foam.   | Whole zone |
| (d) | There should be no recognizable sewage-derived debris.  | Whole zone |
| (e) | Floating, submerged and semi-submerged objects of a size likely to interfere with the free movement of vessels, or cause damage to vessels, should be absent. | Whole zone |
| (f) | Waste discharges should not cause the water to contain substances which settle to form objectionable deposits.  | Whole zone |

## B. BACTERIA

The level of <i>Escherichia coli</i> should not exceed 610 per 100 mL, calculated as the geometric mean of all samples collected in a calendar year.	Secondary Contact Recreation Subzones
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### C. DISSOLVED OXYGEN

Waste discharges should not cause the level of dissolved oxygen to fall below 4 mg per litre for 90% of the sampling occasions during the whole year; values should be calculated as the water column average (arithmetic mean of at least 3 measurements at 1 m below surface, mid-depth and 1 m above seabed). In addition, the concentration of dissolved oxygen should not be less than 2 mg per litre within 2 m of the seabed for 90% of the sampling occasions during the whole year.

Whole zone

### D. pH

Waste discharges should not cause the natural pH range of the water to be extended by more than 0.2 unit. In addition, the pH of the water should be in the range of 6.5 - 8.5 units.

Whole zone

### E. TEMPERATURE

Waste discharges should not cause the natural daily temperature range to change

Whole zone

by more than 2.0°C .

#### F. SALINITY

Waste discharges should not cause the natural ambient salinity level to change by more than 10%.

Whole zone

#### G. SUSPENDED SOLIDS

Waste discharges should not cause the natural ambient level to be raised by more than 30% or give rise to accumulation of suspended solids which may adversely affect aquatic communities.

Whole zone

#### H. AMMONIA

The un-ionized ammoniacal nitrogen level should not be more than 0.021 mg per litre, calculated as the annual average (arithmetic mean).

Whole zone

#### I. NUTRIENTS

- (a) Nutrients should not be present in quantities sufficient to cause excessive or nuisance growth of algae or other aquatic plants.

Whole zone



- |     |   |            |
|-----|---|------------|
| (b) | Without limiting the generality of objective (a) above, the level of inorganic nitrogen should not exceed 0.5 mg per litre, expressed as annual water column average (arithmetic mean of at least 3 measurements at 1 m below surface, mid-depth and 1 m above seabed). | Whole zone |
|-----|---|------------|

## J. TOXIC SUBSTANCES

- |     |  |            |
|-----|--|------------|
| (a) | Toxic substances in the water should not attain such levels as to produce significant toxic, carcinogenic, mutagenic or teratogenic effects in humans, fish or any other aquatic organisms, with due regard to biologically cumulative effects in food chains and to interactions of toxic substances with each other. | Whole zone |
| (b) | Human activity should not cause a risk to any beneficial use of the aquatic environment.   | Whole zone |

Secretary for Planning,  
Environment and Lands

17 Sept. 1999

#### Explanatory Note

This Statement sets out the established water quality objectives of various parts of the North Western Supplementary Water Control Zone.

**STATEMENT OF WATER QUALITY OBJECTIVES (SECOND SOUTHERN  
SUPPLEMENTARY WATER CONTROL ZONE)**

(Made under section 5 of the Water Pollution Control  
Ordinance (Cap. 358) after consultation with the  
Advisory Council on the Environment)

1. The water quality objectives set out in column 1 of the Schedule are established for those parts of the Second Southern Supplementary Water Control Zone set opposite those water quality objectives in column 2 of the Schedule.

2. In this Statement -

"Map" (地圖) means the map comprising 2 sheets marked SSSWCZ1 and SSSWCZ2 respectively and described as "SECOND SOUTHERN SUPPLEMENTARY WATER CONTROL ZONE", signed by the Secretary for Planning, Environment and Lands on 3 September 1999 and deposited in the Land Registry at Victoria;

"Secondary Contact Recreation Subzone" (次級接觸康樂活動分區) means an area delineated as such on the Map.

**SCHEDULE**

[s. 1]

**Water Quality Objective**

**Part or Parts of Zone**

**A. AESTHETIC APPEARANCE**

- |     |  |            |
|-----|--|------------|
| (a) | Waste discharges should not cause any objectionable odour or | Whole zone |
|-----|--|------------|

discolouration of the water.

- |     |   |            |
|-----|---|------------|
| (b) | Tarry residues, floating wood, articles made of glass, plastic, rubber or of any other substances should be absent.   | Whole zone |
| (c) | Mineral oil should not be visible on the surface. Surfactants should not give rise to a lasting foam.   | Whole zone |
| (d) | There should be no recognizable sewage-derived debris.  | Whole zone |
| (e) | Floating, submerged and semi-submerged objects of a size likely to interfere with the free movement of vessels, or cause damage to vessels, should be absent. | Whole zone |
| (f) | Waste discharges should not cause the water to contain substances which settle to form objectionable deposits.  | Whole zone |

## B. BACTERIA

The level of <i>Escherichia coli</i> should not exceed 610 per 100 mL, calculated as the geometric mean of all samples collected in a calendar year.	Secondary Contact Recreation Subzones
--	--

### C. DISSOLVED OXYGEN

Waste discharges should not cause the level of dissolved oxygen to fall below 4 mg per litre for 90% of the sampling occasions during the whole year; values should be calculated as the water column average (arithmetic mean of at least 3 measurements at 1 m below surface, mid-depth and 1 m above seabed). In addition, the concentration of dissolved oxygen should not be less than 2 mg per litre within 2 m of the seabed for 90% of the sampling occasions during the whole year.

Whole zone

### D. pH

Waste discharges should not cause the natural pH range of the water to be extended by more than 0.2 unit. In addition, the pH of the water should be in the range of 6.5 - 8.5 units.

Whole zone

### E. TEMPERATURE

Waste discharges should not cause the

Whole zone

natural daily temperature range to change by more than 2.0°C.

#### F. SALINITY

Waste discharges should not cause the natural ambient salinity level to change by more than 10%.

Whole zone

#### G. SUSPENDED SOLIDS

Waste discharges should not cause the natural ambient level to be raised by more than 30% or give rise to accumulation of suspended solids which may adversely affect aquatic communities.

Whole zone

#### H. AMMONIA

The un-ionized ammoniacal nitrogen level should not be more than 0.021 mg per litre, calculated as the annual average (arithmetic mean).

Whole zone

#### I. NUTRIENTS

- (a) Nutrients should not be present in quantities sufficient to cause excessive or nuisance growth of

Whole zone

algae or other aquatic plants.

- |     |   |            |
|-----|---|------------|
| (b) | Without limiting the generality of objective (a) above, the level of inorganic nitrogen should not exceed 0.1 mg per litre, expressed as annual water column average (arithmetic mean of at least 3 measurements at 1 m below surface, mid-depth and 1 m above seabed). | Whole zone |
|-----|---|------------|

## J. TOXIC SUBSTANCES

- |     |  |            |
|-----|--|------------|
| (a) | Toxic substances in the water should not attain such levels as to produce significant toxic, carcinogenic, mutagenic or teratogenic effects in humans, fish or any other aquatic organisms, with due regard to biologically cumulative effects in food chains and to interactions of toxic substances with each other. | Whole zone |
| (b) | Human activity should not cause a risk to any beneficial use of the aquatic environment.   | Whole zone |

Secretary for Planning,  
Environment and Lands

17 Sept. 1999

#### Explanatory Note

This Statement sets out the established water quality objectives of various parts of the Second Southern Supplementary Water Control Zone.



# Extensions of Hong Kong Waters

## 新增的香港水域

Annex G  
附件 G





