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Environment Protection Act 1970 (No. 8056)
STATE ENVIRONMENT PROTECTION POLICY No. W-28
(THE WATERS OF WESTERN PORT BAY AND CATCHMENT)

*At the Executive Council Chamber, Melbourne, the
sixth day of February, 1979*

PRESENT:

His Excellency the Governor of Victoria	
Mr. Hunt	Mr. Rafferty
Mr. Maclellan	Mr. Austin

Whereas section 16 of the *Environment Protection Act 1970* provides that the Governor in Council may, on the recommendation of the Environment Protection Authority, declare the environment protection policy to be observed with respect to the environment generally or in any portion or portions of Victoria or with respect to any element or elements or segment or segments of the environment;

And whereas section 17 (1) of the said Act provides that in and by any Order made under section 16 the Governor in Council may, for securing the observance of State environment protection policy declared by the Order—

- (a) classify any area or any segment or element of the environment in any area for the purposes of the Order;
- (b) set aside any area or areas or any segment or segments of the environment within which the discharge, emission, or deposit of wastes or the emission of noise is prohibited or restricted as specified in the Order;
- (c) make rules to be observed for carrying any such prohibition or restriction into effect; and
- (d) delegate to any protection agency such of the powers of the Authority as are necessary for securing the observance of the Order;

And whereas section 18 of the said Act provides that State environment protection policy declared in any Order under section 16 shall establish the basis for maintaining environmental quality sufficient to protect existing and anticipated beneficial uses in the area affected by the Order and in particular shall include in terms sufficiently clear to give an adequate basis for planning and licensing functions—

- (a) the boundaries of any area affected;
- (b) identification of the beneficial uses to be protected;
- (c) selection of the environmental indicators to be employed to measure and define the environmental quality;
- (d) a statement of the environmental quality objectives (where practicable); and
- (e) the programme (if any) by which the stated environmental quality objectives are to be attained and maintained;

And whereas in accordance with section 19 of the said Act the Authority caused the publication of its notice of intention to declare State environment protection policy in respect of the waters of Western Port Bay and catchment in the *Sun News-Pictorial* newspaper on 18th September, 1976, the *Age* newspaper on 25th September, 1976, and 13th October, 1976, the *Westernport News* newspaper on 22nd September, 1976 and 29th October, 1976, and the *Koo-wee-rup Courier* newspaper on 13th October, 1976;

And whereas the Authority has now considered the information submitted by various persons;

And whereas more than two months have elapsed since the publication of the last notice published in the aforementioned newspapers;

Now therefore His Excellency the Governor of Victoria by and with the advice of the Executive Council thereof and on the recommendation of the Environment Protection

Authority doth by this Order declare the following to be the State environment protection policy to be observed for the area referred to in the Order and with respect to the elements and segments of the environment referred to in the Order (that is to say):

STATE ENVIRONMENT PROTECTION POLICY
(WATERS OF WESTERN PORT BAY AND CATCHMENT)
No. W-28

1. This Order may be cited as the State environment protection policy (Waters of Western Port Bay and catchment) No. W-28 (hereinafter referred to as the policy), and shall come into operation upon publication in the *Government Gazette*.

2. This Order is divided into parts as follows:

- Part I.—Preliminary
- Part II.—Boundaries of the Area Affected
- Part III.—Beneficial Uses to be Protected
- Part IV.—Water Quality Indicators and Objectives
- Part V.—Attainment Programme

PART I.—PRELIMINARY

3. In this Order, unless inconsistent with the context or subject matter:

“The Act” means the *Environment Protection Act 1970* as amended.

“The Authority” means the Environment Protection Authority constituted under the Act.

“Background Level” means the level of an indicator measured at a point and in a manner specified by the Authority which is upstream of the discharge of all wastes possessing a measurable level of that indicator, to the surface waters of the policy area.

“Beneficial Use” means a use of the environment or any element or segment of the environment that is conducive to public benefit, welfare, safety, or health and which requires protection from the effects of waste discharges, emissions and deposits, or of the emission of noise.

“Delegated Agency” means a protection agency to which the Authority has delegated powers or functions under section 68 of the Act with respect to the grant, refusal and enforcement of licences.

“Licence” means a licence issued by the Authority or by a protection agency on behalf of the Authority being a licence in writing in the prescribed form authorising the person to whom it is issued to discharge, emit, or deposit wastes into the environment.

“Licensing Provisions” means sections 20 to 31 inclusive in the Act.

“Mixing Zone” means an area contiguous to a licensed waste discharge point where reasonable allowance is made in a licence for the mixing of wastes with receiving waters and where the water quality objectives applicable in this policy do not apply unless otherwise specified.

“Organoleptic” denotes any method of systematically testing or assessing the effects of a substance on the human senses, particularly taste or smell.

“Policy Area” means the area in which this policy shall be observed as specified in clause 5.

“Segment” in relation to the environment means any portion or portions of the environment expressed in terms of volume, space, area, quantity, quality, or time or any combination thereof.

“Sewered Property” means any sewered land or premises and any land or premises which have been declared by a sewerage authority in the manner prescribed by statute to be a sewered property.

“Sewerage” means works for the collection, treatment and disposal of waste water.

“Surface waters” includes any river, stream, reservoir, billabong, creek, anabranch, canal, spring, open drain, swamp, channel, lake, lagoon, natural or artificial water course, bay, tidal waters or coastal waters excluding lagoons or pondages used exclusively for the purpose of waste treatment, waters within water supply distribution systems, farm dams, private ponds, and the interstitial waters of sediments.

“Waste” includes any matter prescribed to be waste and any matter, whether liquid, solid, gaseous, or radioactive which is discharged, emitted, or deposited in the environment in such volume, constituency or manner as to cause an alteration of the environment.

4. For the purpose of section 17 (1) (a) of the Act, the element of the environment to which this policy applies is hereby classified as water.

PART II.—BOUNDARIES OF AREA AFFECTED

5. This policy shall be observed with respect to all surface waters and groundwaters contained within Western Port Bay, its islands and catchment lying north of a line drawn between West Head and Point Grant, and north of a line drawn at a 45° angle in a north-easterly direction from Cape Woolamai to the Coast, excluding the Cardinia Reservoir and that part of its catchment draining to the reservoir, as shown by the map (Schedule A). This area shall hereinafter be referred to as the policy area.

6. For the purpose of this policy, the following areas are hereby classified as segments of the environment in accordance with section 17 (1) (a) of the Act.

(a) Potable Water Supply Segments—

(i) Tarago Segment—those surface waters contained within the Tarago Reservoir and its catchment.

(ii) Candowie Segment—those surface waters contained within the Candowie Reservoir and its catchment.

(iii) Bellview Creek Segment—those surface waters contained within the Korumburra Waterworks Trust Reservoir and its catchment on Bellview Creek.

(iv) Little Bass Segment—those surface waters contained within the Little Bass Reservoir and its catchment.

(v) Bunyip River Water Supply Segment—those surface waters contained within the catchment of the Bunyip River and its tributaries upstream of the Bunyip Diversion Weir.

(vi) Drouin Water Supply Segment—those surface waters contained within the catchment of the Labertouche Creek upstream of the Drouin Waterworks Trust diversion weir, and the catchments above the three proposed weirs on Lawson, Ryson and Bullock Creeks.

(vii) Beaconsfield Segment—those surface waters contained within the Beaconsfield Reservoir and its catchment.

(viii) Upper Lang Lang Segment—those surface waters contained within the catchment of the Lang Lang River upstream of the confluence with Pheasant Creek.

(b) Bay Segment—those surface waters of Western Port Bay north of a line drawn between West Head and Point Grant, and north of a line drawn at a 45 degree angle in a north-easterly direction from Cape Woolamai to the coast, bounded by the high water mark and downstream of a line drawn across the mouth of each river and stream adjoining the high water mark of the Bay on each side of the mouth, excluding the Island Segments.

(c) Island Segments—

(i) French Island Segment—those surface waters located on French Island above the high water mark.

(ii) Phillip Island Segment—those surface waters located on Phillip Island above the high water mark.

(iii) Churchill Island Segment—those surface waters located on Churchill Island above the high water mark.

(iv) Elizabeth Island Segment—those surface waters located on Elizabeth Island above the high water mark.

(v) Quail Island Segment—those surface waters located on Quail Island above the high water mark.

(vi) Sandstone Island Segment—those surface waters located on Sandstone Island above the high water mark.

- (d) Eastern Catchment Segment—those surface waters of the catchment of Western Port Bay east of and including the Cardinia Creek catchment above the high water mark and upstream of a line drawn across the mouth of each river and stream adjoining the high water mark of the Bay on each side of the mouth, excluding the Cardinia Reservoir and that part of its catchment draining to the reservoir, areas contained within the Potable Water Supply Segments and the Island Segments. (The surface waters of the tributaries intercepted by the Melbourne and Metropolitan Board of Works drainage system on the northern side of Cardinia Reservoir are included).
- (e) Peninsula Segment—those surface waters of the catchment of Western Port Bay west of the Cardinia Creek catchment, above the high water mark of Western Port Bay and upstream of a line drawn across the mouth of each river and stream adjoining the high water mark of the Bay on each side of the mouth, excluding the Potable Water Segments and the Island Segments.
- (f) Groundwater Segment—those waters contained within all groundwater aquifers beneath the policy area.

PART III.—BENEFICIAL USES TO BE PROTECTED

7. The following beneficial uses shall be protected with respect to the water quality of the Potable Water Supply Segments:—

- (a) maintenance and conservation of freshwater ecosystems and wildlife habitats;
- (b) domestic potable water supply;
- (c) industrial water supply (food processing, steam generation, cooling and other industrial uses);
- (d) agricultural water supply (irrigation, stock watering, domestic and dairy washing and other agricultural uses);
- (e) recharging of aquifers;
- (f) watering of public parks and gardens;
- (g) passive recreation (aesthetic enjoyment);
- (h) water replenishment and flushing of downstream segments;
- (i) secondary contact recreation (fishing, boating, wading);
- (j) production of edible fish and other aquatic life.

8. The following beneficial uses shall be protected with respect to the water quality of the Bay Segment:—

- (a) maintenance and conservation of marine ecosystems and wildlife habitats;
- (b) primary contact recreation (bathing, water-skiing, diving);
- (c) secondary contact recreation (boating, fishing and wading);
- (d) passive recreation (aesthetic enjoyment);
- (e) production of edible fish, crustacea, shellfish and other aquatic life;
- (f) navigation and shipping;
- (g) industrial water supply (cooling and other industrial uses);
- (h) maintenance and preservation of littoral zones, foreshores, salt-marshes, mangroves, seagrasses and other vegetation;
- (i) scientific and educational studies of natural marine environments;
- (j) water replenishment, circulation and flushing.

9. The following beneficial uses shall be protected with respect to the Island Segments and the Peninsula Segment:—

- (a) maintenance and conservation of freshwater ecosystems and wildlife habitats;

- (b) secondary contact recreation (fishing);
- (c) passive recreation (aesthetic enjoyment);
- (d) production of edible fish and other aquatic life;
- (e) agricultural water supply (irrigation, stock watering, domestic and dairy washing);
- (f) industrial water supply;
- (g) recharging of aquifers;
- (h) watering of public parks and gardens;
- (i) maintenance and preservation of stream banks and dependent vegetation;
- (j) water replenishment and flushing for the Bay Segments;
- (k) scientific and educational studies of freshwater environments.

10. The following beneficial uses shall be protected with respect to the water quality of the Eastern Catchment Segment:—

- (a) maintenance and conservation of freshwater ecosystems and wildlife habitats;
- (b) domestic water supply with partial treatment for the Township of Koo-Wee-Rup;
- (c) primary contact recreation (bathing);
- (d) secondary contact recreation (boating, fishing, wading);
- (e) passive recreation (aesthetic enjoyment);
- (f) production of edible fish and other aquatic life;
- (g) industrial water supply (steam generation, cooling and other industrial uses);
- (h) agricultural water supply (irrigation, stock watering, domestic and dairy washing);
- (i) recharging of aquifers;
- (j) watering of public parks and gardens;
- (k) maintenance and conservation of stream banks and dependent vegetation;
- (l) water replenishment and flushing for the Bay Segments;
- (m) scientific and educational studies of freshwater environments.

11. The following beneficial uses shall be protected with respect to the water quality of the Groundwater Segment:—

- (a) domestic potable water supply for the Township of Lang Lang;
- (b) domestic water supply (washing, cleaning, watering of gardens);
- (c) agricultural water supply (irrigation, stock watering, domestic and dairy washing);
- (d) industrial water supply (cooling, steam generation, extractive industries and other industrial uses);
- (e) watering of public parks and gardens.

PART IV.—WATER QUALITY INDICATORS AND OBJECTIVES

12. (a) Unless otherwise specified in this policy, the water quality indicators and objectives shall apply to all surface waters in each segment respectively; except in such mixing zones as may be designated in licences granted by the Authority or Delegated Agency.

(b) In the designation of mixing zones for the purpose of sub-clause (a), the Authority or Delegated Agency may make a reasonable allowance for the mixing of wastes with receiving waters provided that no protected beneficial use is significantly affected adversely and that such mixing zones are kept to a minimum size.

13. The water quality indicators and objectives for the Bay Segment shall be those prescribed by Schedule B.

14. The water quality indicators and objectives for the Eastern Catchment Segment shall be those prescribed by Schedule C.

15. The water quality indicators and objectives for the Potable Water Supply Segments shall be those prescribed by Schedule D.

16. The water quality indicators and objectives for the Island Segments and the Peninsula Segment shall be those prescribed by Schedule E.

PART V.—ATTAINMENT PROGRAMME

17. In the implementation of this policy, special attention should be given to the relevant Statements of Planning Policy, and the development and implementation of such Statements of Planning Policy should give special attention to this policy.

18. Planning and waste management activities in the policy area should have special regard to the sensitivity of the Bay Segments to additional inputs of nutrients, with particular reference to phosphorus and nitrogen.

Provision of Sewerage

19. (a) After the declaration of this policy, no new subdivisions of land into lots of such size, slope, shape or soil type that domestic waste waters cannot be retained within the curtilage of the individual lot, should be sealed in the policy area without the provision of an adequate sewage collection, treatment, and disposal system, unless such sub-division will be consistent with the objectives of this policy.

(b) (i) Adequate sewage collection, treatment and disposal systems should be extended to all existing subdivisions of the type referred to in Clause 19 (a) as soon as possible, so as to eliminate or minimize the discharge of waste to the environment.

(ii) In sewered areas, appropriate steps should be taken to ensure that all premises are connected to sewer.

(c) Detailed consideration should be given to the reclamation and re-use of waste water, and in particular to the discharge of sewage effluent to land.

(d) Consideration should be given to the disposal of sewage effluent outside the policy area by ocean outfall, where practicable.

Waste Discharge Management

20. Subject to clause 22, in considering any application for a waste discharge licence the Authority or Delegated Agency shall have regard to the effect of the discharge, together with the collective effort of other waste discharges, on the protected beneficial uses of this policy so that the licence if granted and any conditions to which it is subject shall be consistent with the attainment and maintenance of the policy objectives.

21. The discharge of waste to the policy area from any sewered property, or area where sewerage reticulation is available if that waste is acceptable to the appropriate Sewerage Authority with or without pre-treatment, should generally be discouraged.

22. (a) For the purpose of section 17 (1) (b) of the Act the surface waters of the policy area are hereby set aside as an area of the environment in which the discharge, emission or deposit of wastes is prohibited or restricted as hereafter specified:

No discharges other than urban runoff uncontaminated by domestic, industrial or construction wastes, or agricultural stormwater runoff shall be made to the surface waters of the Potable Water Supply Segments.

(b) Where, subject to the Act and this policy, wastes may be discharged directly to the waters of Western Port Bay, the point of discharge shall possess each of the following characteristics:

- (i) It shall terminate below the low water mark;
- (ii) It shall be so situated or constructed as to ensure adequate mixing and dispersion of the waste in the waters of the Bay;
- (iii) It shall be so situated as to cause no or minimal damage to mangroves, salt marshes, seagrass beds, or other areas of major ecological significance.

23. For the purposes of section 17 (1) of the Act, the Groundwater Segment of this policy is hereby set aside as an area of the environment in which the discharge, emission or deposit of wastes is prohibited or restricted as hereafter specified:

There shall be no direct injection of waste to the groundwater by means of a bore or the like, except in the case of washings from industries operating under the *Extractive Industries Act 1966*, or for the

purposes of artificially recharging the aquifer to control saltwater intrusion, or to improve the quality of the groundwater, or to increase its yield, provided that no protected beneficial use is significantly affected adversely.

24. Licences granted by the Authority or Delegated Agency may be subject to conditions designed to prevent spillages by requiring the development of contingency plans. Such plans should include:

- (a) Actions to minimize the adverse environmental effects of breakdowns or spillages;
- (b) Emergency holding and clean-up procedures to be implemented in the event of a breakdown or spillage.

25. Appropriate action shall be taken by the Authority as necessary, under section 31 of the Act, to ensure that the aggregate effects of all waste discharges are consistent with the objectives of this policy.

Monitoring

26. (a) The Authority shall as soon as practicable implement a water quality monitoring programme for the stated indicators in each segment of the policy area, consistent with monitoring being done by other agencies, in order to ensure that sufficient data is available to assist in the implementation of this policy, and to assess the attainment and maintenance of the policy objectives. Biological monitoring shall also be conducted where appropriate.

(b) The results of such monitoring will be published from time to time.

Land Disturbance and Soil Erosion

27. Land disturbance, soil erosion and bank erosion should be carefully controlled, and appropriate soil conservation measures should be encouraged to minimize the input of suspended and settleable matter to the surface waters of the policy area.

Solid Waste and Sludge Disposal

28. The disposal of solid wastes and sludges shall be carried out in such a manner and at such locations as will prevent the contamination of groundwaters or surface waters or damage to mangroves and salt marshes.

Public Education

29. In co-operation with other public and private bodies, the Authority shall promote public education in water quality management, waste disposal and pollution control in the policy area particularly with respect to the input of waste from diffuse sources.

Dredging, Spoil Disposal and Other Works

30. Dredging, reclamation, building of port facilities and other works should be carried out in a manner which causes minimal disturbance of plant and animal habitats, particularly in the case of salt marshes, mangroves and seagrass meadows. Where practicable, the disposal of dredged spoil shall be at external marine sites or on land above the salt-marsh zones.

Oil Spillage

31. All necessary precautions should be taken to ensure that no oil or grease is discharged or spilled into the surface waters of the policy area, including mixing zones. Appropriate action shall be taken under the *Environment Protection Act* and the *Navigable Waters (Oil Pollution) Act* to prevent, deter and detect any such discharges or spillage, and to enforce the provision of these Acts if oil spillage occurs. Any spillage should be physically reclaimed or if this is not possible dealt with expeditiously using methods which cause a minimum of damage to both marine and littoral biota. Dispersants should be used only if all other methods are inappropriate, and shall be of minimal toxicity to avoid an even greater environmental hazard. Sinking or burning of oil should be discouraged, but in any case used only in an emergency and when other methods would be more detrimental to the environment.

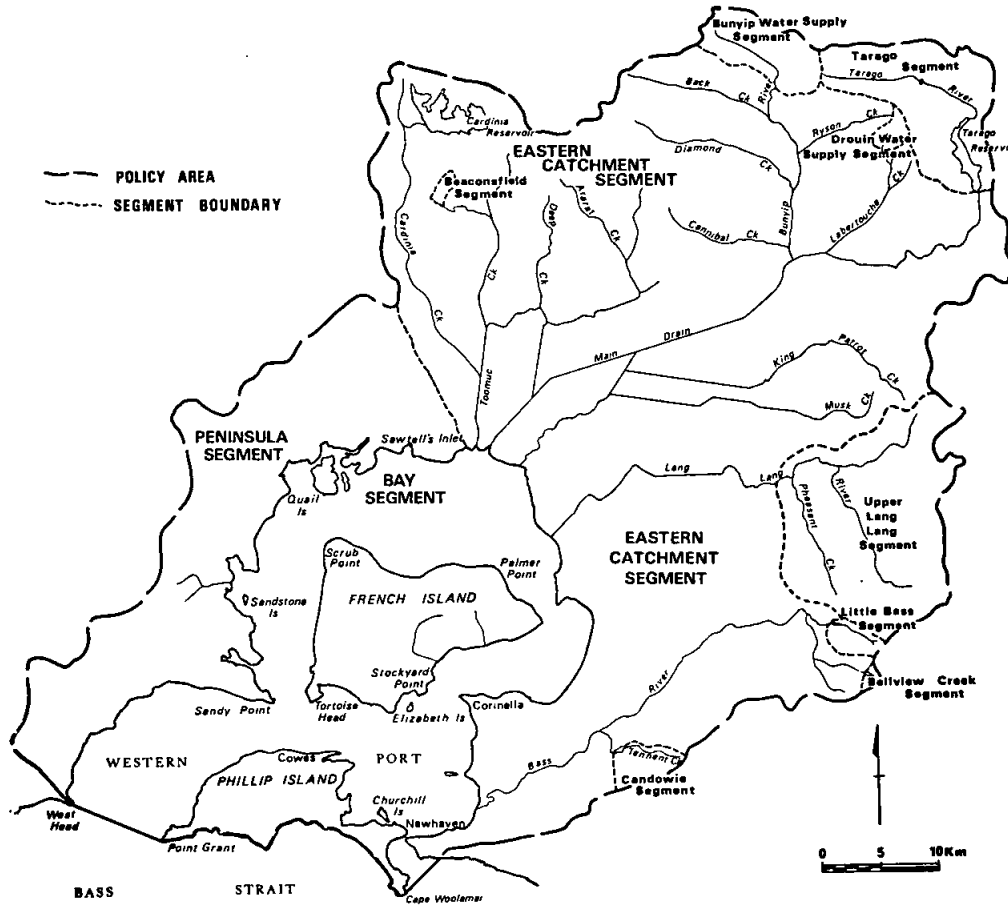
Water Quality Implementation Plan

32. The Authority, with the assistance of the Ministry for Conservation, the Delegated Agencies and other public bodies, will progressively develop suitable plans for the implementation of this policy.

Review

33. This policy is subject to review and amendment as new information and circumstances warrant, particularly with respect to the need to control additional inputs of nutrients.

Schedule A
STATE ENVIRONMENT PROTECTION POLICY No W-28
(THE WATERS OF WESTERN PORT BAY AND CATCHMENT)



SCHEDULE B

WATER QUALITY INDICATORS AND OBJECTIVES FOR THE BAY SEGMENT

Indicator	Objective	Indicator	Objective
1. Dissolved Oxygen	Waste discharges shall not cause the concentration of dissolved oxygen in surface waters of this segment to be less than 6 mg/l or 90 per cent of saturation (whichever is the higher).	4. Temperature	more than ± 0.1 pH units, nor cause such range to be outside the limits of 7.8 to 8.5 pH units. Thermal discharges of any artificial origin shall not cause the temperature of surface waters in this segment to vary by more than two degrees Celsius above or below ambient water temperatures.
2. Bacteria	Waste discharges shall not cause the total coliform median M.P.N. (Most Probable Number) in surface waters of this segment to exceed 70 per 100 ml, based on not less than 5 water samples taken within a 42-day period, nor shall more than 20 per cent of samples so taken exceed a total coliform median M.P.N. of 230 per 100 ml.	5. Salinity	Waste discharges shall not cause changes or more than 0.25 of the standard deviation from ambient data of the naturally occurring annual variation of salinity in surface waters of this segment.
3. pH	Waste discharges shall not cause the normal pH range in surface waters of this segment to be extended by	6. Light Penetration	Waste discharges shall cause no changes in turbidity, colour, suspended solids or other factors which reduce light transmission from the ambient level measured over the same pathlength in surface waters of this segment.

Indicator
7. Toxicants

Objective

(a) Waste discharges shall not cause the level of toxicants in surface waters of this segment to exceed levels for which there is substantiated evidence of lethal or sub-lethal toxic effects or undesirable physiological responses in humans, plants, birds, animals, fish or other aquatic life, with due regard to biologically cumulative effects in food chains and the combined effects of toxicant mixtures.

(b) Without limiting the generality of objective (a)—

Waste discharges shall not cause the level of any toxicant to exceed the value derived by multiplying the 96 hour LC₅₀ for the list of test species specified by the Authority by the appropriate application factors given for each toxicant respectively in Table 1, or in the absence of such bioassay data, to exceed the appropriate minimal risk concentration.

8. Nutrients and Biostimulants

(a) Waste discharges shall not add nutrients or other growth stimulants in quantities sufficient to cause excessive or nuisance algal, seagrass, or other plant growth in surface waters of this segment.

(b) Without limiting the generality of objective (a), waste discharges shall not cause the seasonal mean concentration of total chlorophyll in waters of this segment to increase by more than 20 per cent. above baseline levels measured prior to the declaration of this policy.

9. Aesthetic Appearance
 (a) Odours, Taints and Colours

Waste discharges shall not cause substances producing objectionable odours, taints or colours in surface waters or edible aquatic organisms of this segment including mixing zones, to be present in concentrations detectable by organoleptic tests.

(b) Floatable Matter

Waste discharges shall cause no visible floating foam, oil, grease, scum, litter or other objectionable matter to be present in surface waters of this segment, including mixing zones.

10. Settleable Matter

Waste discharges shall cause no bottom deposits or submerged objects which may significantly adversely affect benthic communities or seagrass meadows, significantly alter the basic geometry of the Bay or shipping channels, present any hazard to shipping or diving or otherwise adversely affect any other protected beneficial use of this segment.

TABLE 1
 MINIMAL RISK CONCENTRATIONS AND APPLICATION FACTORS FOR TOXICANT OBJECTIVES (SCHEDULE B)

Toxicant	Minimal Risk Concentration	Application Factor for LC ₅₀ *
Aluminium (as Al)	0.2 mg/l	0.01
Antimony (as Sb)	(x)	0.02
Arsenic (as As)	0.01 mg/l	0.01
Barium (as Ba)	0.5 mg/l	0.05
Beryllium (as Be)	0.1 mg/l	0.01
Bismuth (as Bi)	(x)	(x)
Boron (as B)	5.0 mg/l	0.1
Bromine (free molecular)	0.1 mg/l	(x)
Bromate ion	100 mg/l	(x)
Cadmium (as Cd)	0.2 µg/l	0.01
Chromium (as Cr)	0.05 mg/l	0.01
Copper (as Cu)	0.01 mg/l	0.01
Cyanide	0.005 mg/l	0.1
Fluoride	1.5 mg/l	0.1
Iron (as Fe)	0.05 mg/l	(x)
Lead (as Pb)	0.01 mg/l	0.02
Manganese (as Mn)	0.02 mg/l	0.02
Mercury (as Hg)	0.1 µg/l	(x)
Molybdenum (as Mo)	(x)	0.05
Nickel (as Ni)	0.002 mg/l	0.02
Selenium (as Se)	0.005 mg/l	0.01
Silver (as Ag)	1 µg/l	0.05
Sulphide	0.005 mg/l	0.1
Thallium (as Th)	0.05 mg/l (y)	
Total Residual Chlorine	0.01 mg/l	0.1
Undissociated Ammonia (as N)	0.01 mg/l	0.1
Uranium (as U)	0.1 mg/l	0.01
Vanadium (as V)	(x)	0.05
Zinc (as Zn)	0.02 mg/l	0.01
Petroleum hydrocarbons (as soluble aromatic derivatives)	1 µg/l	0.01
Toxic organic compounds (including pesticides, herbicides, insecticides, fungicides, oils, hydrocarbons, phenols and other cyclic intermediates) and all other toxicants not specified above	(x)	0.01

Notes :
 (x)—no data available
 (y)—20-day long term exposure test
 (*)—Application factors are multiplied by the appropriate 96-hour LC₅₀ and not the minimal risk concentration.

SCHEDULE C
 WATER QUALITY INDICATORS AND OBJECTIVES FOR SURFACE WATERS OF THE EASTERN CATCHMENT SEGMENT

Indicator	Objective
1. Dissolved Oxygen	Waste discharges shall not cause the concentration of dissolved oxygen in surface waters of this segment to be less than 6.5 mg/l or 85 per cent. of saturation (whichever is the higher).
2. Bacteria	Waste discharges shall not cause the geometric mean of the number of E.coli organisms in surface waters of this segment to exceed 200 organisms per 100 ml, based on not less than 5 water samples taken within a 42-day period, nor shall more than 20 per cent. of the samples so taken exceed 400 organisms per 100 ml.
3. pH	Waste discharges shall not cause the background level pH range in surface waters of this segment to be extended by more than ±0.5 units, nor cause such range to be outside the limits of 6.5 to 8.5.
4. Temperature	Thermal discharges of any artificial origin shall not cause the temperature of

Indicator	Objective	Indicator	Objective
	surface waters in this segment to vary by more than two degrees Celsius above or below background level temperatures.		excessive or nuisance algae, or other plant growth in surface waters of this segment or the Bay segment.
5. Total Dissolved Solids	Waste discharges shall not cause the level of total dissolved solids in surface waters of this segment to vary from background level to the extent that biological communities characteristic of particular habitats are significantly changed. In waters used for irrigation or stock watering, waste discharges shall not cause the level of total dissolved solids to exceed 1,000 mg/l at any time.	9. Aesthetic Appearance (a) Odours, Taints and Colours	Waste discharges shall not cause substances which may produce objectionable odours, taints or colours in waters or edible aquatic organisms of this segment, including mixing zones to be present in concentrations detectable by organoleptic tests.
		(b) Floating Matter	Waste discharges shall cause no visible floating oil, grease, scum, litter or other objectionable matter in surface waters of this segment, including mixing zones.
6. Light Penetration	Waste discharges shall not cause changes in suspended solids, turbidity or colour sufficient to reduce light transmission by more than 10 per cent. of the background level measured over a standard pathlength in surface waters of this segment.	10. Settleable Matter	Waste discharges shall cause no bottom deposits or submerged objects which may significantly adversely affect benthic communities, present any hazard to boating or diving, or otherwise adversely affect any other protected beneficial use of this segment, including mixing zones.
7. Toxicants	(a) Waste discharges shall not cause the level of toxicants in waters of this segment to exceed levels for which there is substantiated evidence of lethal or sublethal toxic effects or undesirable physiological responses in humans, plants, birds, animals, fish or other aquatic life, with due regard to biologically cumulative effects in food chains and the combined effects of toxicant mixtures. (b) Without limiting the generality of objective (a)— (i) waste discharges shall not cause the level of any toxicant other than pesticides in waters of this segment to exceed the value derived by multiplying the 96-hour LC ₅₀ for the list of test species specified by the Authority by the appropriate application factor given for each toxicant respectively in Table 2, or in the absence of such toxicity test data to exceed the appropriate minimal risk concentrations as shown in Table 2. (ii) in relation to pesticides, the minimal risk concentrations and application factors given in Table 2 shall be used as guidelines to indicate levels which, if exceeded, would cause further investigation to be made followed by appropriate action including possible amendment of the policy to provide specific limits if warranted.		
8. Nutrients and stimulants	Bio- Waste discharges shall not add nutrients or other growth stimulants in quantities sufficient to cause		

TABLE 2
MINIMAL RISK CONCENTRATIONS AND APPLICATION FACTORS FOR TOXICANT OBJECTIVES (SCHEDULES C, D AND E)

Toxicant	Minimal Risk Concentration	Application Factor for LC ₅₀ *
A. Metals		
Aluminium (as Al)	(x)	0.01
Cadmium (as Cd)	0.4 µg/l	0.01
Chromium (as Cr)	0.05 mg/l	0.01
Copper (as Cu)	(x)	0.1
Lead (as Pb)	0.03 mg/l	0.01
Mercury (as Hg)	0.2 µg/l	0.01
Nickel (as Ni)	0.1 mg/l	0.02
Zinc (as Zn)	0.03 mg/l	0.005
Other Metals	(x)	0.01
B. Pesticides		
Aldrin	0.01 µg/l	0.01
Allethrin	0.002 µg/l	0.01
Azinphosmethyl	0.001 µg/l	0.01
Carbaryl	0.02 µg/l	0.01
Chlordane	0.04 µg/l	0.01
Coumaphos	0.001 µg/l	0.01
Diazinon	0.009 µg/l	0.01
Dicamba	200 µg/l	0.01
Dichlobenil	37.0 µg/l	0.01
Dichlone	0.2 µg/l	0.01
Dichlorvos	0.001 µg/l	0.01
DDT	0.02 µg/l	0.01
Dieldrin	0.05 µg/l	0.01
Dioxathion	0.09 µg/l	0.01
Diquat	0.5 µg/l	0.01
Diuron	1.6 µg/l	0.01
Endosulfan	0.003 µg/l	0.01
Endrin	0.002 µg/l	0.01
Ethion	0.02 µg/l	0.01
Fenac	45.0 µg/l	0.01
Fenthion	0.006 µg/l	0.01
Heptachlor	0.01 µg/l	0.01
Lindane	0.05 µg/l	0.01
Methoxychlor	0.005 µg/l	0.01
Mevinphos	0.002 µg/l	0.01
Naled	0.004 µg/l	0.01
Parathion	0.0004 µg/l	0.01
Pyrethrin	0.01 µg/l	0.01
Rotenone	10.0 µg/l	0.01
Simazine	10.0 µg/l	0.01
TDE	0.006 µg/l	0.01
Trichlorophon	0.002 µg/l	0.01

Toxicant	Minimal Risk Concentration	Application Factor for LC ₅₀ *
<i>C. Miscellaneous</i>		
Undissociated Ammonia (as N) ..	0.02 mg/l	0.05
Cyanide (free ion) ..	0.005 mg/l	0.05
Phenolic Compounds ..	0.1 mg/l	0.05
Polychlorinated Biphenyls ..	0.002 µg/l	0.01
Sulphides (total) ..	0.002 mg/l	0.01
Surfactants (A.B.S.) ..	0.2 mg/l	0.05
Total Residual Chlorine ..	0.01 mg/l	0.01
Other toxicants ..	(x)	0.01

Notes :

(x)—insufficient data available

(*)—application factors are multiplied by the appropriate 96-hour LC₅₀ and not the minimal risk concentration.

SCHEDULE D

WATER QUALITY INDICATORS AND OBJECTIVES FOR THE POTABLE WATER SUPPLY SEGMENTS

Indicator	Objective
1. Dissolved Oxygen	Waste discharges shall not cause the concentration of dissolved oxygen to be less than 7 mg/l or 90 per cent. of saturation in surface waters of these segments (whichever is the higher).
2. Bacteria	(a) Waste discharges shall not cause the level of total coliform organisms to exceed 100/100 ml in more than 5 per cent. of the total number of samples taken in any one year from raw surface waters of these segments. (b) Waste discharges shall not cause the level of <i>E. coli</i> organisms to exceed 10/100 ml in more than 5 per cent. of the total number of samples taken in any one year from raw surface waters of these segments.
3. pH	Waste discharges shall not cause the background level pH range to be outside the limits of 6.5 to 8.5 in surface waters of these segments.
4. Temperature	Thermal discharges of any artificial origin shall not cause the temperature of surface waters in these segments to vary by more than one degree Celsius above or below background level temperatures.
5. Filterable Residue	Waste discharges shall not cause the level of filterable residue in surface waters of these segments to vary from background levels to the extent that biological communities characteristic of particular habitats are significantly changed.
6. Light Penetration	Waste discharges shall not cause changes in suspended solids, turbidity or colour sufficient to reduce light transmission by more than 10 per cent. of the background level measured over the same pathlength in surface waters of these segments.
7. Toxicants	(a) Waste discharges shall not cause the level of toxicants in waters of these segments to exceed levels for which there is substantiated evidence of lethal or
8. Nutrients and Biostimulants	Waste discharges shall not add nutrients or other growth stimulants in quantities sufficient to cause excessive or nuisance algae or other plant growth in surface waters of these segments or any other segment.
9. Aesthetic Appearance	(a) Potability Criteria Waste discharges shall not cause substances which may produce objectionable odours, tastes, taints or colours in surface waters of these segments to be present in concentrations detectable by organoleptic tests, and in particular shall not cause the level of any indicator to exceed the levels given in Table 4. (b) Floating Matter Waste discharges shall cause no visible floating oil, grease, scum, litter or other objectionable matter to be present in surface waters of these segments, including mixing zones.
10. Settleable Matter	Waste discharges shall cause no bottom deposits or submerged objects which may significantly adversely affect benthic communities, present any hazard to boating or diving, or otherwise adversely affect any other protected beneficial use of these segments, including mixing zones.

Indicator

Objective

sub-lethal toxic effects or undesirable physiological responses in humans, plants, birds, animals, fish or other aquatic life, with due regard to biologically cumulative effects in food chains and the combined effects of toxicant mixtures.

(b) Without limiting the generality of objective (a)—

(i) waste discharges shall not cause the levels of any toxicant other than pesticides to exceed the value derived by multiplying the 96-hour LC₅₀ for a list of test species specified by the Authority, by the appropriate application factor given for each toxicant respectively in Table 2 or in the absence of such toxicity test data, to exceed the appropriate minimal risk concentrations as shown in Table 2 or the Public Health levels given in Table 3 (whichever is the lower).

(ii) in relation to pesticides, the minimal risk concentrations and application factors given in Table 2 shall be used as guidelines to indicate levels which, if exceeded, would cause further investigation to be made followed by appropriate action including possible amendment of the policy to provide specific limits if warranted.

TABLE 3
PUBLIC HEALTH OBJECTIVES FOR TOXICANTS

Toxicant	Objective
Arsenic (as As)	0.05 mg/l
Barium (as Ba)	1.0 mg/l
Copper (as Cu)	0.05 mg/l
Cyanide (as CN)	0.05 mg/l
Fluoride (as F)	1.5 mg/l
Nitrate (as NO ₃)	45 mg/l
Organic compounds (carbon-chloroform extractables) and carbon-alcohol extractables)	0.2 mg/l
Phenolic compounds (as phenol)	0.001 mg/l
Selenium (as Se)	0.01 mg/l
Silver (as Ag)	0.05 mg/l
Zinc (as Zn)	5.0 mg/l
Cadmium (as Cd)	0.01 mg/l
Chromium (as Cr)	0.05 mg/l
Lead (as Pb)	0.05 mg/l
Mercury (as Hg)	0.001 mg/l

TABLE 4
POTABILITY CRITERIA

Indicator	Objective
Calcium (as Ca)	75 mg/l
Chloride (as Cl)	200 mg/l
Colour (pt-Co units)	50 units
Filterable residue	200 mg/l*
Foaming Agents (as MBAS)	0.5 mg/l
Hardness (as CaCO ₃)	100 mg/l
Iron (as Fe)	1.0 mg/l
Magnesium (as Mg)	150 mg/l
Manganese (as Mn)	0.1 mg/l
Oil and grease	0.01 mg/l
Sodium (as Na)	20 mg/l
Sulphate (as SO ₄)	200 mg/l
Total Dissolved Solids	200 mg/l
Turbidity	25 F.T.U.

*Note: Where there is an inconsistency between objectives filterable residue at 200 mg/l shall become the limiting factor.

SCHEDULE E

WATER QUALITY INDICATORS AND OBJECTIVES FOR THE ISLAND SEGMENTS AND THE PENINSULA SEGMENT

Indicator	Objective
1. Dissolved Oxygen	Waste discharges shall not cause the concentration of dissolved oxygen in surface waters of these segments to be less than 6 mg/l or 80 per cent. of saturation (whichever is the higher).
2. Bacteria	Waste discharges shall not cause the geometric mean of the number of <i>E. coli</i> organisms in surface waters of these segments to exceed 1,000 organisms per 100 ml, based on not less than 5 water samples taken within a 42-day period, nor shall more than 20 per cent. of samples so taken exceed 2,000 organisms per 100 ml.
3. pH	Waste discharges shall not cause the background level pH range in surface waters of these segments to be extended by more than ± 0.5 units, nor cause such range to be outside the limits of 6.5 to 8.5 at any time.
4. Temperature	Thermal discharges of any artificial origin shall not cause the temperature of surface waters in these segments to vary by more than two degrees Celsius above or below background level temperatures.

Indicator
5. Filterable Residue

Objective
Waste discharges shall not cause the level of filterable residue in surface waters of these segments to vary from background levels to the extent that biological communities characteristic of particular habitats are significantly changed.

6. Light Penetration

Objective
Waste discharges shall not cause changes in suspended solids, turbidity or colour sufficient to reduce light transmission by more than 10 per cent of the background level measured over the same pathlength in surface waters of these segments.

7. Toxicants

(a) Waste discharges shall not cause the level of toxicants in surface waters of these segments to exceed levels for which there is substantiated evidence of lethal or sub-lethal toxic effects or undesirable physiological responses in humans, plants, birds, fish or other aquatic life, with due regard to biologically cumulative effects in food chains and the combined effects of toxicant mixtures.

(b) Without limiting the generality of objective (a)—

(i) waste discharges shall not cause the level of any toxicant other than pesticides to exceed the value derived by multiplying the 96-hour LC₅₀ for the list of test species specified by the Authority by the appropriate application factor given in Schedule C, Table 2 for each toxicant respectively, or in the absence of such toxicity test data, to exceed the appropriate minimal risk concentration given in Table 2.

(ii) In relation to pesticides, the minimal risk concentrations and application factors given in Table 2 shall be used as guidelines to indicate levels which, if exceeded, would cause further investigation to be made followed by appropriate action including possible amendment of the policy to provide specific limits if warranted.

8. Nutrients and Biostimulants

Objective
Waste discharges shall not add nutrients or other growth stimulants in quantities sufficient to cause excessive or nuisance algae or other plant growth in the surface waters of these segments or any other segment.

9. Aesthetic Appearance
(a) Odours, Taints and Colours

Objective
Waste discharges shall not cause substances which may produce objectionable odours, taints or colours in surface waters or edible aquatic organisms of these segments, including mixing zones, to be present in concentrations detectable by organoleptic tests.

<i>Indicator</i>	<i>Objective</i>
(b) Floating Matter	Waste discharges shall cause no visible floating oil, grease, scum, litter or other objectionable matter in surface waters of these segments, including mixing zones.
10. Settleable Matter	Waste discharges shall cause no bottom deposits or submerged objects which may significantly adversely affect benthic communities, present any hazard to boating or diving, or otherwise adversely affect any other protected beneficial use of these segments, including mixing zones.

And the Honorable William Archibald Borthwick, Her Majesty's Minister for Conservation for the State of Victoria, shall give the necessary directions herein accordingly.

TOM FORRISTAL,
Clerk of the Executive Council

Environment Protection Act 1970

STATE ENVIRONMENT PROTECTION POLICY No. W-28
(THE WATERS OF WESTERN PORT BAY AND CATCHMENT)

EXPLANATORY NOTES

On Tuesday, 6th February, 1979, the Governor in Council declared a State Environment Protection Policy for the waters of Western Port Bay and Catchment. This declaration was made under Section 16 of the *Environment Protection Act 1970*, on the recommendation of the Environment Protection Authority. The policy covers surface waters and groundwaters in the Western Port region, as shown on the map (Schedule A).

The purpose of this policy is to preserve the existing high levels of water quality in the region, and to prevent pollution. The policy protects these waters for a range of specific beneficial uses in designated segments such as recreation, commercial and amateur fishing, and domestic, agricultural and industrial water supplies.

Background

The policy is substantially based upon information and data provided by the Westernport Regional Environment Study carried out by the Ministry for Conservation. The need for a comprehensive environmental study of the Western Port region was first identified by the interdepartmental Westernport Water Pollution Committee in 1971.

The Westernport Bay Environment Study Phase I. was a two year multi-disciplinary study consisting of some 48 individual research projects, co-ordinated by the Ministry for Conservation. The first phase of the study was jointly funded by industry and the Victorian Government at a total cost of \$1.5 million. Its purpose was to develop guidelines for the future management of the bay for use in both the environment protection and planning processes.

The Study was managed in Phase I. by an Executive Committee, initially responsible to the Environment Protection Authority, later directly to the Minister for Conservation. The Committee consisted of representatives of the Ministry for Conservation, local industry, the Westernport Regional Planning Authority, and the Ports and Harbors Division, Public Works Department. Directed by Professor M. A. Shapiro, Phase I. of the study involved over 100 research staff and consultants from the chemical, biological and social sciences, together with engineers and planners.

Following the publication of the Shapiro Report in October 1975, an inter-departmental committee (the Westernport Action Committee) chaired by the Secretary of the Premier's Department, Mr. K. D. Green, was established to examine the legislative and administrative measures available for implementing the findings of the Report. This Committee identified State Environment Protection Policy as a major instrument for the implementation of the Report, and the Environment Protection Authority was accordingly requested to proceed with the formulation of such a policy for the waters of Westernport Bay and its catchment.

The Environment Protection Authority completed the first draft of the policy in April, 1976, in consultation with the Environment Protection Council and other key Government agencies. The Draft Environment Protection Policy (No. 1) was advertised and placed on exhibition from September to December 1976. Approximately 800 copies of the Draft Environment Protection Policy and associated

explanatory notes were distributed to interested organizations and individuals, including local authorities, local community groups and State agencies.

After consideration of the 41 submissions and discussions with many of the contributors, the Authority prepared a revised Draft Environment Protection Policy (No. 2) which incorporated several significant changes, particularly with respect to the control of nutrient inputs to the Bay. It became apparent to the Authority that the strict and widespread controls on nutrients in Draft No. 1 were unwarranted, having regard to the possible socio-economic effects on the area. Draft No. 2 was circulated again to members of the State Co-ordination Council and other agencies, resulting in a further 22 submissions.

Purpose and function of State Environment Protection Policy

The purpose of a State Environment Protection Policy (SEPP) is to provide a blueprint for future decisions related to the management of environmental quality with respect to a given element or segment of the environment.

The Environment Protection Act states that SEPP shall establish the basis for maintaining environmental quality sufficient to protect existing and anticipated beneficial uses in the area affected, and in particular that it shall include, in terms sufficiently clear to give an adequate basis for planning and licensing functions:

- (a) the boundaries of the area affected.
- (b) identification of beneficial uses to be protected.
- (c) selection of the environmental indicators to be employed to measure and define the environmental quality.
- (d) a statement of the environmental quality objectives.
- (e) the programme by which the stated environmental quality objectives are to be attained and maintained.

Statutory procedures are laid down for the formulation of SEPP, and place special emphasis on opportunities for public participation. Before declaration by the Governor in Council, a draft policy, based upon thorough environmental study is advertised and issued for public review and comment.

Once declared, SEPP forms the basis for waste management decision-making in the area affected, and becomes a guide for the community including Government departments and agencies. Waste discharge licensing decisions must be consistent with the policy objectives, and the public has a statutory right of appeal on the grounds that a licence is inconsistent with the policy. Regulations may be enacted to implement the policy to control certain sources of waste which are exempted from the licensing system. Policies are subject to review and revision in the light of further research and studies.

The cornerstones of SEPP are the beneficial uses of the environment identified for protection. This is the area of the policy where public input is most valuable, since the selection of beneficial uses determines the policy objectives and subsequent management programmes. A "beneficial use" is defined as a use of the environment or any element or segment of the environment that is conducive to public benefit, welfare, safety or health, and which requires protection from the effects of waste discharges or deposits.

It should be noted that the sole purpose of identifying beneficial uses for protection is to provide the basis for the formulation of water quality objectives, and not to specify permissible uses as in land-use planning. The actual uses to which a given body of water can be put, are largely determined separately by the appropriate water authority responsible for the regulation of water usage.

The Policy in General

The basic aim of the SEPP for Westernport Bay and catchment is to allow no further deterioration in the water quality of the Bay, its input streams, or the groundwater. This means that growth and development can now proceed in the catchment area provided that adequate waste treatment and disposal facilities are installed, so that overall waste loads on the bay are consistent with the policy objectives. The policy contains a series of guidelines designed to assist in the assessment of licence applications and the exercise of other control measures over waste discharges.

The policy divides the waters of the bay and its catchment (including groundwater) into eighteen segments according to the beneficial uses to be protected in each case. Included amongst these beneficial uses are domestic potable water supply, agricultural water supply (irrigation, stock watering, &c.), industrial water supply, recreation and the maintenance and conservation of ecosystems and wildlife habitats.

Each segment or group of segments has been assigned various water quality indicators and objectives (Schedules B to E), which are designed to ensure that the water quality is suitable at all times for the designated beneficial uses. With the exception of nutrient controls, the objectives are consistent with the recommendations of the Shapiro Report, and are based upon internationally recognised criteria developed over many years of research. In most cases, the water quality objectives are already being achieved.

The attainment programme is a broad statement of the means by which the stated water quality objectives are to be achieved and maintained.

Within the bounds of the policy, a certain amount of flexibility and discretion is provided. It is considered desirable that in the exercise of this discretion, special attention should be given to the requirements of Statements of Planning Policy (Clause 18).

A key factor in the implementation of the policy will be the provision of adequate sewage collection, treatment and disposal systems to urban areas. In most cases, this will involve reticulated sewerage but alternative technologies could be appropriate in some areas. The connection of properties to existing sewers is encouraged. Unsewered development is potentially a major cause of water pollution, in the form of bacteria, nutrients and detergents from septic tank effluents and sullage.

The policy calls for the siting of effluent outfalls to be undertaken so as to enable adequate mixing and dispersion of wastes, with minimal damage to ecologically sensitive areas.

With the existing use of the bay as a port area, the possibility of accidental spills of oil and other hazardous materials is enhanced. The policy calls for prevention of such spills and includes a requirement to review present contingency plans and clean-up technologies.

A major source of data and feedback information for the implementation of the policy will be the commencement of the complete and systematic water quality monitoring programme of the bay and its catchment. Each of the stated water quality indicators will be monitored for comparison with the water quality objectives. The data obtained from this programme will enable further "fine tuning" of the decision-making process.

The declaration of policy is only the beginning of a proper environmental management programme, and not all provisions of the policy can be implemented immediately. To this end, a series of implementation plans will be developed to ensure that the policy is actively implemented stage by stage, in co-operation with other public bodies having statutory responsibilities for the management of the region.

Environmental studies in Western Port Bay are continuing and the policy will be revised as may be warranted by the results of further research or changed conditions.

The Policy in Detail

The policy is preceded by the necessary legal preamble for an Order in Council.

Clause 1 gives the title of the Order and fixes the date that it shall come into operation (the day of publication in the *Government Gazette*).

Clause 2 divides the Order into five (5) parts.

Clause 3 gives specific interpretations of various words and terms used throughout the policy. The purpose of these interpretations is not to provide a glossary of technical terms but simply to give a specific meaning to a phrase which may be slightly limited or otherwise different to the meaning commonly accepted in every-day language. In particular the definition of "surface waters" has been included to identify those types of waters to be covered by the policy and to identify those which are excluded for the purposes of the policy. Where interpretations are given for words defined in the Act, the same definitions are used.

Clause 4 classifies the element of the environment to which this policy applies as water. Section 17 (1) (a) states that any Order may classify the element of the environment to which it applies.

Clause 5 defines the boundaries of the policy area, i.e. the area to which this policy applies.

Clause 6 divides the policy area into eighteen segments based on areas having similar beneficial uses for protection. The main implications of these segments are—

The potable water supply segments are those protected for drinking water supplies, the majority of which are untreated.

The bay is one segment (in contrast with the six bay segments outlined in draft No. 1). There is no need to have more than one segment for the bay since the beneficial uses to be protected are the same throughout the bay and there is no quantitative break-up of nutrient objectives.

The island segments are different from the other land segments in that their waters are not protected for swimming. There is generally insufficient water on the island to physically enable this use.

The eastern catchment segment differs from the Peninsula segment in that swimming is protected as a beneficial use. This is because the streams east of the Cardinia Creek catchment have much higher flows and are generally conducive to swimming.

The ground water segment covers the entire area.

Clauses 7 to 11 list the various beneficial uses for protection in each segment. A table comparing differences in beneficial uses between segments is shown in Appendix 1.

Clause 12 states that the water quality indicators and objectives shall apply in all surface waters except in mixing zones, and gives guidelines for the designation of mixing zones in licences. Unless these mixing zones are designated it would mean that all effluent would need to comply with the receiving water indicators and objectives at the point of discharge, making no allowance for dilution or dispersion. In many cases this would be impractical and unreasonable, and the mixing zone is a useful concept which has been introduced both here and overseas to overcome this problem.

Clauses 13–16 tie the various segments to their respective water quality indicators and objectives in Schedules B to E (see later).

Clause 17 outlines the relationship between State Environment Protection Policies and Statements of Planning Policy.

Clause 18 emphasises the need to consider the sensitivity of Western Port Bay to additional nutrient inputs. This is only a qualitative guideline at this stage.

Clause 19 gives guidelines on the need for sewerage in the policy area. It states that no new subdivisions which cannot retain their wastes on site should be subdivided in the policy area without the provision of adequate sewage collection, treatment and disposal systems. Provision is made for exemptions to be made in certain extenuating circumstances.

Sub-clause (b) encourages the extension of sewerage systems to all existing subdivisions which cannot retain their wastes on site and the connection of premises in sewered areas.

Sub-clause (c) encourages the re-use of waste water where possible, both for the purposes of protecting the bay and conserving valuable resources.

Sub-clause (d) outlines the need to consider the disposal of treated sewage effluent outside the policy area, e.g. to Bass Strait, where practical. This would be generally preferable to the discharge of sewage effluent to the bay, because of its poor flushing characteristics.

Clause 20 outlines the general relationship between the policy and waste discharge licensing activities and is generally consistent with the requirements of the Act.

Clause 21 encourages the discharge of wastes to sewerage systems for central treatment. This is a generally accepted principle in water quality management, provided the waste is acceptable to the appropriate sewerage authority. In cases of high hydraulic load and/or particular wastes from a large industry, this may not be the best solution.

Clause 22 (a) restricts the discharge of waste in Potable Water Supply Segments. It is generally considered far preferable for wastes to be treated at their source rather than having to install expensive water treatment plants to remove contamination caused by a small number of discharges.

Sub-clause (b) gives guidelines for the location and structure of effluent outfalls.

Clause 23 restricts the direct discharge of waste to ground waters except in certain cases, in order to protect the ground waters for their beneficial uses.

Clause 24 enables the Authority and delegated agencies to include conditions on licences designed to prevent and mitigate spillages.

Clause 25 foreshadows the need to use section 31 of the Act to rationalize existing discharges to levels consistent with the policy objectives. Under this section, the Authority may require existing licensees to upgrade their waste treatment where a number of discharges together cause the policy objectives to be exceeded.

Clause 26 outlines the requirements for a water quality monitoring programme.

Clause 27 stresses the need for the control of land disturbance or soil erosion, in minimizing levels of suspended solids and settleable matter in streams leading to the Bay.

Clause 28 gives guidelines for the location of tips and other solid waste disposal sites, in order to protect the waters of the Bay and its ecology.

Clause 29 emphasizes the need for public education in order to minimize waste input from sources not readily controlled by licences or regulations such as run-off from agricultural fertilizers, litter, sump oil, &c.

Clause 30 generally implements the recommendations of the Shapiro Report with respect to dredging, reclamation works and the dumping of spoil.

Clause 31 gives guidelines for the prevention and cleaning up of oil spillages.

Clause 32 foreshadows the need to develop plans for the implementation of the policy. These plans would be evolutionary in nature and would consist of non-statutory guidelines on the control of waste discharges in a manner consistent with the policy. If found necessary, aspects of these implementation plans could be incorporated as an amendment to the policy or as regulations at a later date.

Clause 33 foreshadows the need to review and if necessary amend the policy as new information becomes available particularly from phase 2 of the Westernport Regional Environmental Study. Particular emphasis should be given to the possible need to control additional inputs of nutrients as further data and information becomes available.

Schedules B to E outline the specific water quality indicators and objectives for each segment according to differences in the beneficial uses to be protected in each case. These objectives are generally consistent with the recommendations of the Shapiro Report but with the exception of nutrients. The Shapiro Report specifically recommended no net increase in the total load of phosphorus entering the Bay. The Authority felt that there was insufficient evidence at this time for this recommendation to be included in the policy and instead is recommending that a qualitative statement be included at this stage (see indicator 8 in each Schedule). In the case of the Bay segment, a total chlorophyll objective has been included. In areas not covered by the Shapiro Report, the Authority has largely drawn on internationally accepted criteria, primarily those of the U.S. E.P.A. Where an Australian standard is available, such as those of the National Health and Medical Research Council with respect to drinking water standards, this has been incorporated.

APPENDIX I

TABULAR SUMMARY OF SEGMENTS AND BENEFICIAL USES

BENEFICIAL USE \ SEGMENT	POTABLE WATER SUPPLY	BAY	ISLANDS	EASTERN CATCHMENT	PENINSULA	GROUND-WATER
Aquatic Ecosystems	X	X	X	X	X	
Drinking	X					X (Lang Lang)
Industrial	X	X	X	X	X	X
Agricultural	X		X	X	X	X
Recharging Aquifers	X		X	X	X	
Parks and Gardens	X		X	X	X	X
Primary Recreation (bathing)		X		X		
Secondary Recreation (fishing etc)	X	X	X	X	X	
Passive Recreation	X	X	X	X	X	
Water Replenishment	X	X	X	X	X	
Fish production	X	X	X	X	X	
Scientific Studies		X	X	X	X	
Stream banks			X	X	X	
Foreshores		X				
Navigation		X				



VICTORIA
GOVERNMENT GAZETTE

Published by Authority

No. 13]

TUESDAY, FEBRUARY 13

[1979

PROROGUING THE PARLIAMENT OF VICTORIA

PROCLAMATION

By His Excellency the Governor of the State of Victoria and its Dependencies in the Commonwealth of Australia &c., &c., &c.

Whereas the Parliament of Victoria stands adjourned until such day and hour as may be fixed by the President of the Legislative Council and the Speaker of the Legislative Assembly respectively: Now I, the Governor of the State of Victoria, in the Commonwealth of Australia, do by this my Proclamation prorogue the said Parliament of Victoria until Wednesday, 21st March, 1979.

Given under my Hand and the Seal of the State of Victoria aforesaid, at Melbourne, this thirteenth day of February in the year of Our Lord One thousand nine hundred and seventy-nine, and in the twenty-eighth year of the reign of Her Majesty Queen Elizabeth II.

(L.S.)

HENRY WINNEKE

By His Excellency's Command,

R. J. HAMER,
Premier

GOD SAVE THE QUEEN!

DISCHARGING MEMBERS OF THE LEGISLATIVE COUNCIL FROM ATTENDANCE AND
DISSOLVING THE LEGISLATIVE ASSEMBLY

PROCLAMATION

By His Excellency the Governor of the State of Victoria and its Dependencies in the Commonwealth
of Australia &c., &c., &c.

Whereas by the Constitution Act it was amongst other things enacted that it should be lawful for the Governor to fix such places within Victoria and, subject to the limitation therein contained, such times for holding the first and every other Session of the Council and Assembly, and to vary and alter the same respectively in such manner as he might think fit; and also from time to time to prorogue the said Council and Assembly, and to dissolve the said Assembly, by Proclamation or otherwise, whenever he should deem it expedient; And whereas the said Council and Assembly, called "The Parliament of Victoria", stand prorogued until Wednesday, 21st March, 1979. And whereas it is expedient to dissolve the Legislative Assembly: Now therefore I, the Governor of the State of Victoria, in the Commonwealth of Australia, in exercise of the power in me vested in this behalf, do by this my Proclamation discharge the Honorable the Members of the Legislative Council from their meeting and attendance on Wednesday, 21st March, 1979. And I do dissolve the Legislative Assembly, such dissolution to take effect on Thursday, 15th March, 1979. And I do hereby declare that I have this day given Order that Writs be issued in due form, and according to law, for the election of Members to be duly returned to serve in the Legislative Assembly: and (with the consent of the President of the Legislative Council) for the Periodical Election of Members to be duly returned to serve in the Legislative Council.

Given under my Hand and the Seal of the State of Victoria aforesaid, at Melbourne, this
thirteenth day of February in the year of Our Lord One thousand nine hundred and
seventy-nine, and in the twenty-eighth year of the reign of Her Majesty Queen
Elizabeth II.

(L.S.)

HENRY WINNEKE

By His Excellency's Command,

R. J. HAMER,
Premier

GOD SAVE THE QUEEN!

GENERAL ELECTION

Notice is hereby given that His Excellency the Governor will issue Writs for a General Election of Members to serve in the Legislative Assembly of Victoria, and (with the consent of the President of the Legislative Council) for the Periodical Election of Members to serve in the Legislative Council of Victoria, on the day first hereinafter mentioned, viz.:

Date of Issue of Writs	..	..	..	Tuesday, 20th March, 1979.
Day of Nomination (before or on which nominations are to be made)	..	..	..	Tuesday, 10th April, 1979.
Day of Polling	..	..	..	Saturday, 5th May, 1979.
Return of Writs	..	..	..	Monday, 21st May, 1979.

By His Excellency's Command,

TOM FORRISTAL,
Official Secretary

The Governor's Office,
Melbourne, 13th February, 1979