1968. No. 232 [C]

CLEAN AIR

Alkali, &c. Works

ORDER*, DATED 24TH JULY 1968, MADE BY THE MINISTRY OF HEALTH AND SOCIAL SERVICES UNDER SECTION 18(9) OF THE CLEAN AIR ACT (NORTHERN IRELAND) 1964.

The Ministry of Health and Social Services after consulting with the local authorities and other interests concerned in exercise of the powers conferred upon it by section 18(9) of the Clean Air Act (Northern Ireland) 1964(a) and of every other power enabling it in that behalf, hereby makes the following Order:—

Citation and commencement

1. This Order may be cited as the Alkali, &c. Works Order (Northern Ireland) 1968 and shall come into operation on the 1st day of December 1968.

Noxious or offensive gases

2. For the list of noxious and offensive gases mentioned in section 27 of the Alkali, &c. Works Regulation Act 1906(b) (hereinafter referred to as "the Act of 1906") as amended by the Order hereby revoked there shall be substituted the list set out in Schedule 1.

Works

3. For the List of Works mentioned in the First Schedule to the Act of 1906 as amended by the Order hereby revoked there shall be substituted the List of Works set out in Schedule 2.

Revocation

4. The Alkali, &c. Works Order (Northern Ireland) 1965(c) is hereby revoked.

(a) 1964. c. 16. (N.I.).
(b) 6 Edw. 7. c. 14.
(c) S.R. & O. (N.I.) 1965, No. 130.

*This Order was affirmed by a Resolution of the Senate and by a Resolution of the House of Commons on the 22nd day of October 1968.

SCHEDULE 1

New List of Noxious and Offensive Gases in substitution for the one contained in Section 27 of the Act of 1906

The expression "noxious or offensive gas" includes the following gases and fumes:—

Muriatic acid;
Sulphuric acid;
Sulphurous acid, except that arising solely from the combustion of coal;
Nitric acid and acid-forming oxides of nitrogen;
Sulphuretted hydrogen;
Chlorine and its acid compounds;
Fluorine compounds;
Cyanogen compounds;
Bisulphide of carbon;
Chloride of sulphur;
Fumes from cement works;
Fumes containing copper, lead, antimony, arsenic, zinc, or their compounds;
Fumes from tar works;
Acetic acid;
Acetic anhydride;
Acetylene;
Aldehydes;
Amines;
Ammonia and its compounds;
Arsenic and its compounds;
Bromine and its acid compounds;
Carbon monoxide,
Fluorine;
Fumaric acid;
Fumes from benzene works;
Fumes from paraffin oil works;
Fumes containing aluminium, beryllium, *cadmium,* calcium, chlorine, chromium, iron, magnesium, manganese, molybdenum, phosphorous, potassium, selenium, silicon, sodium, titanium, tungsten, vanadium, uranium or their compounds;
Iodine and its acid compounds;
Maleic acid;
Maleic anhydride;
Phthalic acid;
Phthalic anhydride;
Picolines;
Products containing hydrogen from the partial oxidation of hydrocarbons;
Pyridine;
Sulphuric anhydride;
Sulphurous anhydride, except that arising solely from the combustion of coal;
Volatile organic sulphur compounds.

SCHEDULE 2

New List of Works in substitution for the List in the First Schedule to the Act of 1906

List of Works

(1) Sulphuric acid works, that is to say, works in which the manufacture of sulphuric acid is carried on by the lead chamber process, namely, the process by which sulphurous acid is converted into sulphuric acid by the agency of oxides of nitrogen and by the use of a lead chamber or by any other process involving the use of oxides of nitrogen.

(2) Sulphuric acid (Class II) works, that is to say, works in which the manufacture of sulphuric acid is carried on by any process other than the lead chamber process, and works for the concentration or distillation of sulphuric acid.

(3) Chemical manure works, that is to say, works in which the manufacture of chemical manure is carried on, and works in which any mineral phosphate is subjected to treatment involving chemical change through the application or use of any acid and works for the granulating of chemical manures involving the evolution of any noxious or offensive gas.

(4) Gas liquor works, that is to say, works (not being sulphate of ammonia works or muriate of ammonia works) in which sulphuretted hydrogen or any other noxious or offensive gas is evolved by the use of ammoniacal liquor in any manufacturing process, and works in which any such liquor is desulphurized by the application of heat in any process connected with the purification of gas.

(5) Nitric acid works, that is to say, works in which the manufacture of nitric acid is carried on and works in which nitric acid is recovered from oxides of nitrogen and works where in the manufacture of any product any acid-forming oxide of nitrogen is evolved.

(6) Sulphate of ammonia works, and muriate of ammonia works, that is to say, works in which the manufacture of sulphate of ammonia or of muriate of ammonia is carried on.

(7) Chlorine works, that is to say, works in which chlorine is made or used in any manufacturing process.

(8) Muriatic acid works, that is to say—

(*a*) Muriatic acid works, or works (not being alkali works as defined in this Act) where muriatic acid gas is evolved either during the preparation of liquid muriatic acid or for use in any manufacturing process or as the result of the use of chlorides in any chemical process.

(*b*) Tinplate flux works, that is to say, works in which any residue or flux from tinplate works is calcined for the utilization of such residue or flux, and in which muriatic acid gas is evolved; and

(*c*) Salt works, that is to say, works (not being works in which salt is produced by refining rock salt, otherwise than by the dissolution of rock salt at the place of deposit) in which the extraction of salt from brine is carried on, and in which muriatic acid gas is evolved.

(9) Sulphide works, that is to say, works in which sulphuretted hydrogen is evolved by the decomposition of metallic sulphides, or in which sulphuretted hydrogen is used in the production of such sulphides, or any works in which sulphuretted hydrogen is evolved as part of a chemical process.

(10) Alkali waste works, that is to say, works in which alkali waste or the drainage therefrom is subjected to any chemical process for the recovery of sulphur or for the utilization of any constituent of such waste or drainage.

(11) Venetian red works, that is to say, works for the manufacture of Venetian red, crocus or polishing powder, by heating sulphate or some other salt of iron.

(12) Lead deposit works, that is to say, works in which the sulphate of lead deposit from sulphuric acid chambers is dried or smelted.

(13) Arsenic works, that is to say, works for the preparation of arsenious acid, or where nitric acid or a nitrate is used in the manufacture of arsenic acid or an arseniate and works in which any volatile compound of arsenic is evolved in any manufacturing process and works in which arsenic is made.

(14) Nitrate and chloride of iron works, that is to say, works in which nitric acid or a nitrate is used in the manufacture of nitrate or chloride of iron.

(15) Bisulphide of carbon works, that is to say, works for the manufacture, use or recovery of bisulphide of carbon.

(16) Sulphocyanide works, that is to say, works in which the manufacture of any sulphocyanide is carried on by the reaction of bisulphide of carbon upon ammonia or any of its compounds.

(17) Picric acid works, that is to say, works in which nitric acid or a nitrate is used in the manufacture of picric acid.

(18) Paraffin oil works, that is to say, works in which crude shale oil is refined and works in which—

(*a*) crude petroleum is refined; or

(*b*) any product of the refining of crude shale oil or crude petroleum is treated so as to cause the evolution of gases containing any sulphur compound; or

(*c*) any such product as aforesaid is used in any subsequent chemical manufacturing process not being a process for the polymerisation or copolymerisation of such products for the manufacture of thermo-plastic materials.

(19) Bisulphite works, that is to say, works in which sulphurous acid is used in the manufacture of acid sulphites of the alkalis or alkaline earths and works for the manufacture of liquid sulphur dioxide or of sulphurous acid or of any sulphite and works (not being smelting works as defined in section 8(1) of this Act or other works defined elsewhere in this Schedule) in which oxides of sulphur are evolved in any chemical manufacturing process.

(20) Tar works, that is to say, works where gas tar or coal tar is distilled or is heated in any manufacturing process and works in which creosote or any other product of the distillation of gas tar or coal tar is distilled or is heated in any manufacturing operation involving the evolution of any noxious or offensive gas.

(21) Zinc works, that is to say, works in which by the application of heat, zinc is extracted from the ore, or from any residue containing that metal, and works in which compounds of zinc are made by dry processes giving rise to fume.

(22) Benzene works, that is to say, works (not being tar works as defined in paragraph 20 of this Schedule) in which—

(*a*) any wash oil used for the scrubbing of coal gas is distilled; or

(*b*) any crude benzol is distilled.

(23) Pyridine works, that is to say, works in which pyridine or picolines are made or recovered.

(24) Bromine works, that is to say, works in which bromine is made or is used in any manufacturing operation.

(25) Hydrofluoric acid works, that is to say, works in which hydrofluoric acid is evolved in the manufacture of liquid hydrofluoric acid or its compounds.

(26) Cement production works, that is to say, works in which—

(*a*) argillaceous and calcareous materials are used in the production of cement clinker; or

(*b*) cement clinker is ground; or

(*c*) cement is packed.

(27) Lead works, that is to say, works (not being works for the recovery of lead from scrap by direct liquation) in which—

(*a*) by the application of heat, lead is extracted from any material containing lead or its compounds; or

(*b*) compounds of lead are manufactured from metallic lead or its compounds by dry processes which give rise to dust or fume.