(1966) 12 AHC CK 0006

In the Allahabad High Court

Case No : Sales Tax Reference No. 614 of 1964

Commissioner, Sales Tax — APPELLANT

Vs

Banaras Chemicals — RESPONDENT

Date of Decision : 05-12-1966

Acts Referred:
Uttar Pradesh Sales Tax Act, 1948 — Section 11(1)

Citation : (1967) 20 STC 246

Hon'ble Judges : S.C. Manchanda, J;M.H. Beg, J

Bench : Division Bench

Advocate : Saran Behari Lal, Srivastava and J. Sarup, for the Respondent

Judgement

S.C. Manchanda, J.—This is a case stated u/s 11(1) of the U.P. Sales Tax Act (hereinafter referred to as the Act). The question referred is :

Whether sodium silicate, as used in the manufacture of soap, is included in ''chemicals of all kinds'' appearing as item No. 7 of the Notification No. ST-905/X dated 31st March, 1956?

2. The material facts are these : The assessee is a manufacturer and dealer in sodium silicate and washing soap. The short question for consideration is whether sodium silicate is a chemical within the meaning of item No. 7 of the aforesaid notification issued under the powers conferred by Section 3-A of the Act. The item reads : "Chemicals of all kinds." The assessing authority and the Judge (Appeals) considered sodium silicate (water glass) to be a chemical and therefore falling within the mischief of item No. 7 of the said notification. The Judge (Revisions), however, took the view that sodium silicate though in its widest connotation might be a chemical yet when considered by the use to which it is put in India, which according to him, was only as a filler in the manufacture of soap, it cannot be treated as a chemical Further, it was held, that sodium silicate is not a chemical compound but only a mixture. Hence this reference at the instance of the Commissioner of Sales Tax.

3. The assessee, as already observed, is a manufacturer of sodium silicate and, therefore, it hardly lies in its mouth to say that sodium silicate is not a chemical. The manufacture of sodium silicate or water glass is described in various books on industrial and advanced Organic Chemistry. In "Industrial Chemistry" by E. Riegel it is stated : "Sodium silicate is made by fusing together sand and soda ash in the proportions of 100 pounds of sand to 52 pounds of soda ash. Its formula is somewhat indefinite; it lies between Na2O. 3SiO2 and Na2O.4SiO2. It occurs chiefly as a thick syrup, a water solution of the solid." As regards its use, it is mentioned : "The uses of sodium silicate are surprisingly numerous; it is added in the crutching of soap; it serves to impregnate wood, to weight silk, as a mordant, as a heat resistant binding agent, to clarify juices and solutions, to render bricks and cements non-porous, as a detergent, and as an adhesive, particularly in making corrugated paper boxes." Therefore, according to this authority sodium silicate is a chemical compound but its formula is somewhat indefinite and may vary between 3 and 4 parts of silica. One of its uses is as a prop or filler but that is not the only use and'' its more important use in the manufacture of soap is that of a detergent.

4. Sneed and Maynard in "General Inorganic Chemistry" have given the formula for sodium silicate and its preparation where silica is heated with sodium hydroxide or by fusing sand with sodium carbonate. As regards its uses, it is stated. "It has many commercial uses, such as fire-proofing and water-proofing of textiles and timbers, as a filler in cheap soaps, and as an adhesive in the manufacture of cardboard shopping cases."

5. In Molinari''s "Inorganic Chemistry", Volume I, second edition, page 606, the following uses are given : "Soluble glass is used to render objects impregnated with it resistant to fire. It is used as adhesive for glass, porcelain, stone etc. It is much employed for adulterating (wading) soap...."

6. In Thorpe''s Dictionary of Applied Chemistry, Volume X, the uses of "sodium silicate" given are: "Sodium silicates have a wide variety of uses. The principal applications are connected with their adhesive properties, wetting powers for diverse materials and binding and detergent characteristics.... The use of sodium silicate in the soap industry is well established.... Silicates are incorporated in soaps to the extent of 1-25%. Water glass not only replaces the fat, but in some respects improves the quality of the soap. Sodium silicate is nearly always used, alone or in mixtures, whenever an inorganic detergent is required. Its power of deflocculation, wetting and emulsifying and of increasing and stablising foam, as well as precipitating calcium and magnesium from hard water, make sodium silicate a very effective cleaning agent."

7. Thorpe, at page 798, mentions that the detergent action is a mechanical process by which dirt is removed by detergent solution which becomes attached to the oil globules and helps to "float" them off the fibre.

8. In Encyclopaedia Britannica at page 859, the uses of sodium silicate given are :

The most important are sodium silicate (water glass) sodium carbonate (soda ash), and various phosphates. These materials give increased detergent action for conditions of usage, and are not to be thought of simply as fillers such as starch and barites, which are added to cheapen the soap. For saponification of the fats, large quantities of caustic soda are required by the industry, together with lesser quantities of caustic potash for soft soap manufacture.

9. From the above, it is clear, that "sodium silicate" occupies by no means an unimportant or insignificant part of inorganic chemistry. Prima jade, therefore, it is not possible to say that sodium silicate is not a chemical.

10. Reliance was, however, placed by the learned counsel for the assessee on the definition of the word "chemical" from Hackh''s Chemical Dictionary, Grant Third Edition, where "chemical" has been defined as "(1) pertaining to chemistry and (2) a substance of definite " and known composition." As the formula varies with the amount of silica it was contended that sodium silicate is not a substance of definite and known composition and therefore not a chemical. There is no force in this contention. The mere fact that there may be various compounds of sodium silicate with slightly varying formulae does not mean that there is no known composition. Each compound produced can be analysed and its formula determined. In "Encyclopaedia of Chemical Technology" by Kirk and Othmer, it is stated : "The soluble silicates are often described by referring them back to the hypothetical orthosilicic acid, Si(OH)4 or H4Si04, and the metasilicic acid, H2Si03; thus sodium orthosilicate has the formula Na4 SiO4, or 2Na2O.SiO2 and sodium matasilicate has the formula Na2Si03 or Na2O.SiO2. However, products of indefinite compositions are frequently encountered and it is convenient to specify them in terms of the ''ratio'', that is, the ratio by weight of SiO2 to R2O. (In the case of a sodium salt, the weight ratio is quite close to the mole, ratio).... Definite compounds are also referred to in terms of the relative numbers of formula weights of alkali and silica, thus sodium disilicate Na2O.2SiO2, potassium tetrasilicate K2O.4SiO2."

11. This clearly indicates that sodium silicate or water glass can be analysed and a definite formula for it can be established. Merely because sodium silicate when fused with silica does not invariably have the same chemical composition does not mean that it ceases to be a chemical.

12. The question, however, still remains as to whether sodium silicate is used in the manufacture of soaps as a chemical. The question referred has been framed very narrowly and on the mistaken notion of the Judge (Revisions) that water glass or sodium silicate in India is only used in the manufacture of soap and for no other purpose. The uses given in the various text-books and the Encyclopaedia referred to above clearly show that its uses are diverse and not restricted to its use as a filler in the manufacture of soap. Be that as it may, in the case of an ordinary soap manufacturer who just goes into the market and buys water glass without knowing its chemical composition, it might be possible to say that such a person is not buying a chemical but in the case of the

assessee who actually manufactures sodium silicate and calls itself "Banaras Chemicals" it becomes difficult, if not impossible, to say that it is not a chemical "as used in the manufacture of soap" by him. The two reasons given by the Judge (Revisions) for holding that sodium silicate is not a chemical, (1) that it is only used as a filler in the manufacture of cheap soap, and (2) it is not a chemical compound, are both incorrect for the reason that (1) its use as a filler is one of its uses and not the only use to which it can be put and further that its main purpose is as a detergent, and (2) it is certainly a chemical compound as is borne out by the text-books referred to hereinabove.

13. For the reasons given above we would answer the question referred in the affirmative and against the assessee. The assessee will pay the costs of Rs. 100 of this reference.

