

Chemical and Fibres of India Ltd.

Vs

Union of India and Others

Collector of Central Excise

Vs

J. K. Synthetics Ltd., Kota

R. K. Audim, Asstt. Collector and Others

Vs

Nirlon Synthetic Fibres and Chemicals Ltd.

Civil Appeals No. 3495 of 1982 With No. 3507 of 1982

(CJI A. M. Ahmadi, Smt Sujata V. Manohar JJ)

07.01.1997

JUDGMENT

SMT SUJATA V. MANOHAR, J. -

1. These appeals and the transferred appeal raise a common question : Whether polymer chips manufactured by the assesseees and used by them in the manufacture of nylon yarn can be classified, for the purpose of levy of excise duty, under Item 15-A in Schedule I to the Central Excises and Salt Act, 1944, as it stood during the period 1962 to 1972 ? For the sake of convenience we are setting out the facts in relation to the transferred appeal pertaining to M/s. Nirlon Synthetic Fibres and Chemicals Ltd.
2. At all material times the company manufactured nylon yarn, a synthetic man-made fibre under an industrial licence granted by the Government of India. For the manufacture of nylon yarn, the company imported caprolactam monomer. The company paid customs duty as well as countervailing duty on its import of caprolactam monomer. This raw material was used by the company for manufacture of nylon yarn. In the course of processing of caprolactam monomer the company obtained at an intermediate stage a product called "polymer chips", also known as Nylon 6 Chips, which were consumed in the manufacture of the finished product, namely, nylon yarn. The question relates to the levy of excise duty on these polymer chips. The only question which now survives for our determination is whether these polymer chips can be classified under Item 15-A of Schedule I to the Central Excises and Salt Act, 1944 as it stood during the period 1962-1972, since this period covers all the appeals.
3. The assessee has described the process employed in its factory for polymerisation of caprolactam monomer. Once caprolactam is polymerised, it becomes nylon. In order to change the form of this substance and give it the required properties which enable textile yarn to be produced from it further

processing is required in the course of which, at an intermediate stage, polymer chips are produced. The chips are obtained for the purpose of removing the remnant monomer so that the subsequent processing becomes more convenient. These chips which are otherwise called Nylon 6 Chips, are then dried, melted and spun into continuous filament by the process of extrusion. The spun filament undergoes further processing in order to get yarn in a saleable form. Polymer chips which are produced by the assessee's companies have a relative viscosity of 2.22 to 2.30. The average molecular weight ranges from 10,000 to 18,000. These chips are suited only for the manufacture of textile fibres and are used exclusively for that purpose.

4. With this background, let us examine whether these polymer chips fall under Entry 15-A. Entry 15-A was amended on 28-2-1964. We, therefore, are required to consider Entry 15-A as it existed prior to 28-2-1964 and the entry as it existed after 28-2-1964.

15. Entry 15-A as it existed prior to 28-2-1964 was as follows : "15-A. Plastics, All Sorts : (i) Moulding powders, granules and 25% ad valorem flakes (thermosetting and thermoplastic). (ii) Polyethylene fixer, Layflat tubings and PVC sheets (that is to say, polyvinyl chloride sheets), (iii) Not otherwise specified."

6. The assessee contends that polymer chips or Nylon 6 Chips manufactured by the assessee are not known in the trade as plastics and hence they cannot be classified under Entry 15-A which deals with plastics of all sorts.

7. Encyclopaedia Britannica, Volume 18, while dealing with "plastics" has this to say on the subject :

"The articles called 'plastic' generally require shaping by heat during their fabrication by moulding or extrusion. Since the newer synthetic products can frequently be used interchangeably as coatings or as mouldings, the distinction between resins and plastics becomes less pronounced. Moreover modern technology shows that the materials which are designated as rubber, fibres, resins and plastics are of a similar molecular structure and by appropriate chemical and physical treatment, it is possible to interconvert any of these materials. It follows that certain structural features are common to all these products and being common they relate to similarity in physical properties between materials which are not necessarily chemically related. It might be argued that rubber is a plastic, since it can be fabricated by procedure similar to those employed in moulding plastics; but rubber is not generally considered to be a part of the plastics industry. ... Similarly the fibre industry is considered to be independent of the plastics industry and here again the same raw materials, polyamides (nylon) cellulose and cellulose acetate are used by both industries. Plastics are also divorced from the self-supporting type of film production such as the manufacture of photographic film and cellophane. The term plastic, therefore, is essentially a commercial classification to which no strictly scientific definition can be applied."

8. The term "plastic", therefore, is a commercial classification which covers various kinds of natural or synthetic materials which can be shaped by heat during their fabrication either by moulding or by extrusion and which will retain that shape during use. It is also made clear that normally, rubber or synthetic material which is used for the manufacture of fibres and yarn, or for the manufacture of photographic film and cellophane, is not commercially considered as plastic.

9. In the book *Polymers and Resins* by Brage Golding, 1959 Edn., "plastic" is defined as under :

"A plastic has been defined in a limited sense as any of a large group of organic substances, whether natural or synthetic, which can be moulded (Plastikos = fit for moulding). The noun 'Plastic' is usually applied to all polymers which are not considered to be elastomers or fibres; i.e. which exhibit neither the long range elasticity of elastomers nor the very high crystallinity of most fibres. In the engineering sense, however, a plastic is a mixture containing one or more resins compounded with fillers, plasticizers, lubricants, dyes etc. which has been subsequently fabricated.

Commercial nylon fibres are linear and have molecular weight averages of the order of 12,000 to 20,000. If the average molecular weight is below 6000 little or no fibre formation is possible; fibres formed from polymers with an average molecular weight of about 6000 to 10,000 are weak and brittle. As the average molecular weight increases above this range, the fibre becomes stronger. However, if the molecular weight runs much over 20,000 the polymer becomes too difficult to melt or dissolve. Therefore, the process of polymerisation must be stopped in the desired average molecular weight range."

10. Chamber's Dictionary defines "plastics" as "generic name for certain natural and synthetic substances which under heat and pressure become plastic and can then be shaped or cast".

11. In Webster's Third New International Dictionary "plastic" has been described as under :

"Plastic. - (1) A substance that at some stage in its manufacture or processing can be shaped by flow (as by application of heat or pressure) with or without fillers, plasticizers, reinforcing agents, or other compounding ingredients and that can retain the new solid often rigid shape under conditions of use;

(2) any of a large group of materials of high molecular weight that usually contain as the essential ingredient a synthetic or semi-synthetic organic substance made by polymerization or condensation (as polystyrene or a phenol-formaldehyde resin) or derived from a natural material by chemical treatment (as nitrocellulose from cellulose), that are moulded, cast, extruded, drawn, or laminated under various conditions (as by heat in the case of thermoplastic materials, by chemical condensation in the case of thermosetting materials or polyesters, or by casting during polymerization of monomers) into objects of all sizes and shapes including films and filaments."

12. Our attention is also drawn to the American Society for Testing Material Standard which makes a distinction between "nylon" and "nylon plastics" - including the former under the heading "Definition of Textile Terms" and the latter under the heading "Plastics Nomenclature". The Indian Standard Institute Glossary also makes a distinction between "nylon" and "nylon plastics" and similarly classifies "nylons" under the glossary of textile terms and "nylon plastics" under the glossary of terms used in plastic industry.

13. It is, however, urged on behalf of the Revenue that the chemical composition of the polymer chips (Nylon 6 Chips) which are produced by the assessee is similar to the chemical composition of

material used in plastic industry. And hence, going by the chemical composition of this material, it can be appropriately classified as a plastic. This contention will have to be examined in the light of the wording of Entry 15-A. Entry 15-A does not use any scientific or technical term. It deals with "plastics, all sons". As Encyclopaedia Britannica has described, the term "plastic" is a commercial classification. When this kind of a term in commercial use is used in an excise entry which deals with marketable commodities which are manufactured and which are subject to the levy of excise, we will have to examine that term in the light of how it is understood in the trade. If, however, strictly technical or scientific words are used, the approach for their interpretation may be different.

14. We will refer to only some of the authorities which have been cited before us in this connection. As far back as in 1891, in the case of *Unwin v. Hanson* [(1891) 2 QB 115 : 60 LJ QB 531] (QB at p. 119), the Court observed :

"If the Act is directed to dealing with matters affecting everybody generally, the words used have the meaning attached to them in the common and ordinary use of language : if the Act is one passed with reference to a particular trade, business, or transaction, and words are used which everybody conversant with that trade, business, or transaction, knows and understands to have a particular meaning in it then the words are to be construed as having that particular meaning, though it may differ from the common or ordinary meaning of the words."

15. In the case of *Ramavatar Budhaiprasad v. STO* [(1962) 1 SCR 279 : AIR 1961 SC 1325 : (1961) 12 STC 286] the Court was concerned with the scope of the word "vegetables" occurring in C.P. and Berar Sales Tax Act, 1947. The Court said that betel leaves cannot be classified as vegetables although botanically they may fall in that category, because betel leaves are not commonly understood as vegetables.

16. Again in the case of *CST v. Jaswant Singh Charan Singh* [AIR 1967 SC 1454 : (1967) 19 STC 469] the Court held that the entry "coal" under the Madhya Pradesh General Sales Tax Act would cover charcoal also. The Court said that while "coal" is technically understood as a mineral product while charcoal is manufactured by human agency from products like wood and other things, it is now well-settled that while interpreting items in statutes like the Sales Tax Acts, resort should be had, not to the scientific or the technical meaning of such terms, but to the meaning attached to them by those dealing in them. (See in this connection *South Bihar Sugar Mills Ltd. v. Union of India* [(1968) 3 SCR 21 : AIR 1968 SC 922] and *Dunlop India Ltd. v. Union of India* [(1976) 2 SCC 241 : (1976) 2 SCR 98].)

17. In the case of *Asian Paints India Ltd. v. CCE* [(1988) 2 SCC 470 : 1988 SCC (Tax) 201 : (1988) 35 ELT 3] Sabyasachi Mukharji, J. (as he then was) has summed up the rule of interpretation in the following words : (SCC p. 473, para 8)

"It is well settled that the commercial meaning has to be given to the expressions in tariff items. Where definition of a word has not been given it must be construed in its popular sense. Popular sense means that sense which people conversant with the subject-matter with which the statute is dealing, would attribute to it ... that in interpreting items in statutes like the Excise Act or Sales Tax Acts, whose primary object was to raise revenue and for which purpose to classify diverse products, articles and substances, resort should be had not to the scientific and technical meaning of the terms or expressions used but to their popular meaning, that is to say,

the meaning attached to them by those dealing in them."

18. In the present case, since Entry 15-A as it then stood, uses a commercial term "plastics" which is well known in the trade and is used in the trade, we should not go into the technical analysis of the composition and character of a plastic product. We should go by the meaning which is attached to the term "plastics" in the trade parlance. Plastics as understood in the trade covers all kinds of synthetic materials. As the Encyclopaedia Britannica sets out very clearly, there is a distinction made in commercial parlance between materials used in the production of plastics and materials used in the production of fibres, films or rubber although they may share certain structural features. The assessee has also filed affidavits from people in the trade to say that polymer chips of the kind manufactured by the assessee are not considered as plastics by those dealing in plastics.

19. Prior to the assessee's manufacturing these chips in its own plant, the assessee used to import similar chips for the purpose of manufacture of nylon yarn from BASE. The product imported was caprolactam Ultramid BS. Our attention is drawn to the catalogue of BASE products of July 1961, in which caprolactam Ultramid BS is shown under "Raw materials for synthetic fibres", while there is a separate head for "Plastics and auxiliaries for plastics" under which other material such as Ultramid A, Ultramid AK, Ultramid B and Ultramid BM are shown. This also indicates that material which is used for the production of nylon yarn is not considered in the trade as a plastic material. The assessee, therefore, is right when it contends that Item 15-A as it stood prior to 28-2-1964 does not cover polymer chips manufactured by it.

II20. Item 15-A, however, as amended after 28-2-1964 was as follows : "15-A. Artificial or synthetic resins and plastic materials, and articles thereof. - ad valorem.(1) Artificial or synthetic resins and plastic materials in any form, whether solid, liquid or pasty, or as powder, granules or flakes, or in the form of moulding powders, the following, namely : (i) Condensation, Poly-condensation and Poly-addition products, whether or not modified or polymerised; including Phenoplasts, Aminoplasts, Alkyds, Polyurethane, Polyallyl Esters and other Unsaturated Polyesters; (ii) Polymerisation and Co-polymerisation products including Polyethylene and Polytetrahaloethylene, Polyisobutylene, Polystyrene, Polyvinyl Chloride, Polyvinyl Acetate, Polyvinyl Chloroacetate and other Polyvinyl derivatives, Polyamides, Polyacrylic and Polymethacrylic derivatives and Coumarone-Indeneresins; and (iii) Cellulose Acetate (including di- or tri-acetate), Cellulose Acetate Butyrate and Cellulose Propionate, Cellulose Acetate-Propionate, Ethyl Cellulose, and Benzyl Cellulose whether plasticised or not, and plasticised Cellulose Nitrate. (2) Articles made of plastics, all sorts, including tubes, rods, sheets, foils, sticks, other rectangular or profile shapes, whether laminated or not, and whether rigid or flexible, including lay flat tubings and Polyvinyl Chloride sheets.##

Explanation. - For the purpose of sub-item (2), 'plastic' means the various artificial or synthetic resins or plastic material included in sub-item (1)."

21. The main heading of this item is now changed to read "Artificial or synthetic resins and plastic materials and articles thereof". Clause (1) refers to artificial or synthetic resins and plastic material in any form, "among them the following" which are described in sub-clauses (i), (ii) and (iii). These sub-clauses describe the technical process by which the end product is derived. Thus in sub-clause (i) for example, the processes which are referred to, inter alia, are condensation, poly-condensation and poly-addition and products resulting therefrom. Sub-clause (ii) refers, inter alia, to polyamides.

All these are technical and scientific terms and processes. The Revenue contends that in the strict sense of the term, polymer chips or Nylon 6 Chips which are manufactured by the assessee are artificial or synthetic resins as they fall in the category of polyamides in sub-clause (ii) of clause (1) of Item 15-A. The assessee, however, contends that artificial or synthetic resins which are covered by Item 15-A refer only to plastics and they do not refer to those artificial or synthetic materials which may be processed in the manner described in sub-clauses (i) to (iii), but which give rise to products used for the textile industry such as the polymer chips manufactured by the assessee.

22. The assessee has pointed out that the words "the following" in clause(1) of Item 15-A which precede sub-clauses (i) to (iii) clearly indicate enumeration or description of the kinds of artificial or synthetic resins and plastic materials in different forms in sub-clauses (i) to (iii). Therefore, all products covered by sub-clauses (i) to (iii) must answer the basic description of "Artificial or synthetic resins and plastic materials". These sub-clauses cannot cover materials not known as artificial or synthetic resins or plastic material. The assessee further contends that "synthetic resins" is a term used to describe basic material in plastic industry. It does not refer to basic raw material used in other industries.

23. The question, therefore, which we have to decide is whether artificial or synthetic resins should be confined only to those resins which ultimately produce material having plastic qualities or whether they would include within their scope other kinds of material derived by similar processes which are described in sub-clauses (i), (ii) and (iii), but which are suitable for use in other kinds of industries such as rubber industry, textiles or films.

24. Are the words "artificial or synthetic resins" interchangeable with or linked with the words "plastic material" ? Brage Golding in his treatise on "Polymers and Resins", in Chapter I, which deals with introductory concepts and definitions, after stating that it is unfortunate that there are no explicit definitions of the words resins and plastics, the meanings being understood by those who use them, has attempted to define these expressions as follows :

"Probably the closest one can come to a definition of resins is that it is a solid or semi-solid, natural or synthetic organic substance of relatively high molecular weight (not necessarily a polymer) which exhibits no sharp melting point, breaks with a conchoidal fracture, and usually (but not always) is predominantly amorphous in structure. A plastic has been defined in a limited sense as any of a large group of organic substances, whether natural or synthetic, which can be moulded (plastikos - fit for moulding)."

He goes on to observe :

"The term 'resin' originally referred to natural products (particularly of vegetable origin) but now includes the man-made substances. As will be seen from the physical descriptions of the polymers given in later chapters, the above definitions of both resin and plastic include many of these polymers, and the terms are now often used interchangeably."

25. Webster's Dictionary defines "Resins (synthetic)" as :

"Any of a large class of synthetic products (as alkyd resins or phenolic resins) usually of high molecular weight that have some of the physical properties of natural resins

but typically are very different chemically, that may be thermoplastic or thermosetting, that are made by polymerization or condensation, and that are used chiefly as plastics or the essential ingredients of plastics, in varnishes and other coatings, in adhesives, and in ion exchanges (when the resin itself is capable of being shaped into a finished article without a plasticizer, as polystyrene), the terms resin and plastic are interchangeable for that material - in industrial terminology the unfabricated material is sometimes called a resin and the fabricated article a plastic."

The reference to thermoplastic and thermosetting qualities of such resins is also a reference to their plastic qualities.

26. The British Plastics Year Book of 1967 describes synthetic resins as "resins produced by chemical reactions. They are of different chemical composition and behaviour from natural resins. The term is now generally applied to all polymeric plastic materials with the possible exception of cellulosic and casein materials. Synthetic resins are classified by the initial reacting materials, e.g., as phenolic amino, acrylic or vinyl resins, or on chemical composition, e.g., polyester and epoxy resins."

27. Sorenson and Campbell in their book Preparation Methods of Polymer Chemistry in Chapter 7 "Cross-linked Synthetic Resins" have said :

"Today, 'resin' covers a multitude of polymer types, including the classical phenol-formaldehyde condensation and the relatively recent epoxy resins, vinyl polymers such as polystyrene and poly methyl methacrylate and condensation polymers of the polyamide or polyester class. Most of the application of the term 'resin' is to those linear or cross-linked (or cross-linkable) polymers that are used in moulding, casting, or extruding operations and in surface coatings; and, to most cross-linked (or cross-linkable) polymers, no matter what the end use (as in adhesives, textile finishes, etc.). Thus poly methyl methacrylate and various polyamides, both essentially linear polymers, are termed moulding resins when directed to a moulding end use. However, polyamides would not be termed resins by the synthetic fibre industry in their usage of the material."

In other words, "synthetic resin" is a term used in plastic industry and possibly in other industries, but not in the textile industry to refer usually to unfabricated material out of which the end product is made.

28. While the first three descriptions/definitions of synthetic resins emphasise the plastic quality of synthetic resins, the last description clearly brings out the fact that in the synthetic fibre industry, polyamides which are used as raw material would not be termed as resins. The term "synthetic resins", therefore, appears to be used in connection with plastic materials. The British Plastics Year Book of 1967 quoted earlier also emphasises that the term "synthetic resins" is now generally applied to all polymeric plastic materials with the possible exception of cellulosic and casein materials. Webster's Dictionary (supra) has also described synthetic resins as those which may be thermoplastic or thermosetting - these being typical characteristics of plastic material and has clearly said that synthetic resins are used chiefly as plastics or essential ingredients of plastics as also in varnishes and other coatings and in adhesives and ion exchanges. There is no reference here to their being used in the manufacture of yarn. Webster's Dictionary also states that the terms "resin" and "plastic" are interchangeable and sometimes the unfabricated material is called resins and the

fabricated material is called a plastic. This perhaps explains why the words "artificial or synthetic resins" were added in Entry 15-A to "plastics" in order to refer to and cover the raw material which goes into the manufacture of plastic materials. Encyclopaedia Britannica also which was quoted earlier by us, states that while the designation "plastic" is broader generally than the term "resin", both terms are used indiscriminately with respect to synthetic products. Therefore, the reference material which is produced before us indicates that synthetic resins are used in connection with plastic material and that often the unfabricated material is referred to as resin while the fabricated article is referred to as a plastic. Polyamides which are used for the purpose of manufacture of yarn are not referred to as synthetic resin in the textile industry.

29. The term "synthetic resin or artificial resin", therefore, far from being scientifically precise, seems to be as elusive to define as the term "plastic". The preponderance of view appears to be, however, that the term "synthetic resin" is used in connection with material which is used for producing articles of plastic and is not used to refer at least to material used in the textile industry.

30. Our attention has been drawn to Concise Guide to Plastics by Simmonds and Church in which a passage under the heading "Polyester Resin" is as follows :

"In the broad sense of the term polyester resins include many types of resinous condensation products and collectively represent a broad and expanding field in the plastics industry As indicated in other section, alkyd resin are basically polyester. Saturated liner polyester resins can be film or fibre forming material, for example, polyethylene, terephthalate."

This passage, however, does not assist us in the sense that it does not tell us what the terms "synthetic resins" or "artificial resins" generally refer to. It does, however, indicate that the term "polyester resin" represents the broad and expanding field in the plastic industry and saturated liner polyester resins can be fibre forming. From the passage it is not clear whether the latter are commonly referred to as synthetic resins or not. By and large, therefore, one can come to the conclusion that the term "artificial and synthetic resin" is used in the plastic industry to refer to various materials derived by the processes which are referred to, in sub-clauses (i), (ii) and (iii) of Entry 15-A for the purpose of producing material or products which are suitable in the manufacture of plastics. The processes which are described in sub-clauses (i), (ii) and (iii) are undoubtedly technical, scientific or chemical processes and the products which are derived as a result of these processes are also described in technical terms in the said sub-clauses. Polyamides, for example, which are relevant in the present case, would cover, by themselves a wide range of products. However, these sub-clauses come under the main heading of artificial or synthetic resins or plastic materials. Polyamides, of textile grade are not plastic materials nor are they referred to as synthetic resins in the textile trade. Hence polyamides of textile grade would not fall under either "Artificial or synthetic resins" or under "plastic material". They would be outside the ambit of Entry 15-A. The polymer chips which are manufactured by the assessee would not, therefore, come under the category of artificial or synthetic resins also. Polyamides, however, which are capable of producing plastic materials are known in the plastic trade as synthetic resins and would be covered by Item 15-A.

31. Since the technical literature and dictionaries which have been cited by us have emphasised the conjunction of artificial or synthetic resins with plastics, it is not possible for us to ignore this association. Therefore, even if the term "Artificial or synthetic resin" is construed as covering products derived by processes technically described in sub-clauses (i), (ii) and (iii) of clause (1) of

Entry 15-A, that product must answer the basic description as "artificial or synthetic resin". Polyamides in the form of polymer chips of textile grade are not known as synthetic resins. They are also not plastics. Hence Entry 15-A does not cover them. The assessee is, therefore, entitled to succeed.

32. The appeal of the assessee in CA No. 3495 of 1982 is allowed and the appeals of the Revenue in Transferred Case No. ... of 1996 [arising out of TP (C) No. 188 of 1983 being OA No. 84 of 1970 of the Bombay High Court] and Civil Appeal No. 3507 of 1982 are dismissed. In the circumstances of the case, there will be no order as to costs.