# UNITED STATES OF AMERICA BEFORE FEDERAL TRADE COMMISSION

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In the Matter of

**The Dow Chemical Company**, a corporation.

File No. 971-0105

# AGREEMENT CONTAINING CONSENT ORDER

The Federal Trade Commission ("the Commission"), having initiated an investigation of the proposed acquisition by The Dow Chemical Company ("Dow"), through its wholly-owned subsidiary, Dow South Africa Holdings (Pty) Ltd., of the entire issued share capital of Sentrachem Limited ("Sentrachem"), which in turn owns Hampshire Chemical Corporation ("Hampshire"), and it now appearing that Dow, hereinafter sometimes referred to as "proposed respondent," is willing to enter into an agreement containing an order to divest certain assets and providing for other relief:

**IT IS HEREBY AGREED** by and between the proposed respondent, by its duly authorized representative and its outside counsel, and counsel for the Commission that:

1. Proposed respondent Dow is a corporation organized, existing and doing business under and by virtue of the laws of the state of Delaware, with its office and principal place of business located at 2030 Dow Center, Midland, Michigan 48674.

2. The proposed respondent admits all the jurisdictional facts set forth in the draft of

d. any claim under the Equal Access to Justice Act.

4. This agreement shall not become part of the public record of the proceeding unless and until it is accepted by the Commission. If this agreement is accepted by the Commission, it, together with the draft of complaint contemplated thereby, will be placed on the public record for a period of sixty (60) days and information with respect thereto will be publicly released. The Commission thereafter may either withdraw its acceptance of this agreement and so notify the

becomes final.

## ORDER

Ι

IT IS ORDERED that, as used in this Order, the following definitions shall apply:

A. "Commission" means the Federal Trade Commission.

B. "Respondent" or "Dow" means The Dow Chemical Company, its directors, officers, employees, agents and representatives, its predecessors, successors, and assigns; subsidiaries, divisions, and groups and affiliates controlled by Dow, and the respective directors, officers, employees, agents, representatives, successors and assigns of each.

C. "Sentrachem" means Sentrachem Limited, a South African company, with its principal

or sold by Hampshire in the United States or Canada, including, but not limited to, all projects in research and development by Hampshire that relate to improving existing or developing new Chelant Products, or improving processes for manufacturing Chelant Products.

J. "Hampshire Non-Chelant Products" means any product other than Hampshire Chelant Products, that have been, at any time in the two (2) years preceding the Acquisition, researched, developed, manufactured, distributed, or sold at the Lima Facility or Other Hampshire Facilities, including, but not limited to, all projects in research and development by Hampshire that relate to improving existing or developing new Hampshire Non-Chelant Products, or improving processes for manufacturing Hampshire Non-Chelant Products.

K. "Hampshire Products" means Hampshire Chelant Products and Hampshire Non-Chelant Products.

L. "Lima Facility" means Hampshire's Lima, Ohio manufacturing facility.

M. "Other Hampshire Facilities" means Hampshire's facilities located at Deer Park, Texas and Nashua, New Hampshire.

N. "Akzo Lima Expansion" means such improvements, additions, and expansions to the Lima Facility to produce no less than 175 million pounds per annum (on a solution pound basis) of Chelant Products and to provide sufficient hydrogen cyanide ("HCN"), nitrile, and other raw material storage, Chelant Products warehouse space and related facilities, to enable the Hampshire Chelant Business to operate at sustained levels of output no less than 175 million pounds per annum (on a solution pound basis) of Chelant Products.

O. "Akzo Lima Expansion Milestones" means: (i) the submission by Akzo of complete applications for any and all federal, state, and local governmental permits that may be required to complete the Akzo Lima Expansion, within twelve (12) months after the date this Order becomes final; (ii) the receipt by Akzo of all federal, state, or local governmental permits that are required to complete the Akzo Lima Expansion, within eighteen (18) months after the date this Order becomes final; provided, however that if Akzo has not received approval or final disapproval of its permit application(s) within eighteen (18) months after the date this Order becomes final, this second milestone shall be extended until Akzo receives approval or final disapproval for a period up to, but in no event longer than, twelve (12) months; (iii) the completion by Akzo of the structural steel installation required for the Akzo Lima Expansion, within twelve (12) months after permitting.

Q. "Dow's Contract Manufacturing Services" means the Dow business unit engaged in the contract manufacture of chemical and polymer products and services for independent firms.

R. "Hampshire Chelant Business" means all assets, properties, business and goodwill, tangible and intangible, of Hampshire relating to the research, development and manufacture in the United States, and the distribution and sale in North America, of Hampshire Chelant Products, including, but not limited to:

1. all rights, title and interest in and to owned or leased real property at the Lima Facility (including completion of the current nitrile expansion project underway), together with its appurtenances, licenses and permits; but excluding real property at (i) the Other Hampshire Facilities; (ii) Hampshire's Lexington, Massachusetts facility; and (iii) Hampshire's Teeside, United Kingdom facility;

2. all machinery, fixtures, equipment, vehicles, transportation facilities, furniture, tools and other tangible personal property located at the Lima Facility, but excluding machinery, fixtures, equipment, transportation facilities located at (i) the Other Hampshire Facilities; (ii) Hampshire's Lexington, Massachusetts facility; and (iii) Hampshire's Teeside, United Kingdom facility;

3. all intangible assets associated with Hampshire Chelant Products, including, but not limited to, processes, process improvements projects, production projects, permits, supporting data and documents, patents, patent applications and other intellectual property relating to any Hampshire Chelant Product;

4. all intellectual property used by Hampshire at the Lima Facility and all intellectual property used for the research, development, manufacture or sale of Hampshire Chelant Products, including, but not limited to, trade secrets, test data, technology and know-how (including, but not limited to, manufacturing know-how and application know-how), and all patents, patent applications, patent rights, licenses, registrations, submissions and approvals;

5. all books, records and files, customer lists, customer records and files, vendor lists, catalogs, sales promotion literature, advertising materials, specifications, designs, drawings, and quality control data;

6. all right, title and interest in and to contracts and agreements entered into in the ordinary course of business with customers (together with associated bid and performance bonds), joint ventures, suppliers, sales representatives, distributors, agents, personal

existing Hampshire contracts for railcars used in the transport of Hampshire Chelant Products;

7. all projects in research and development by Hampshire as of the date of the Acquisition that relate to improving existing Chelant Products, or developing Chelant Products, including, but not limited to, all research materials, technical information, inventions, trade secrets, intellectual property, patents, technology, know-how (including,

3. all inventory and storage capacity;

4. all intangible assets associated with Hampshire Products, including, but not limited to, processes, process improvements projects, production projects, permits, supporting data and documents, patents, patent applications and other intellectual property relating to any Hampshire Product;

5. all intellectual property used for the research, development, manufacture or sale of Hampshire Products, including, but not limited to, trade secrets, test data, technology and know-how (including, but not limited to, manufacturing know-how and application know-how), and all patents, patent applications, patent rights, licenses, registrations, submissions and approvals;

6. all books, records and files, customer lists, customer records and files, vendor lists, catalogs, sales promotion literature, advertising materials, specifications, designs, drawings, and quality control data;

7. all right, title and interest in and to contracts and agreements entered into in the ordinary course of business with customers (together with associated bid and performance bonds), joint ventures, suppliers, sales representatives, distributors, agents, personal property lessors, personal property lessees, licensors, licensees, consignors and consignees including, but not limited to, all existing contracts with BP Chemicals Inc. for the supply of liquid hydrogen cyanide and the related service agreements and land lease; and all existing contracts for railcars used in the transport of Hampshire Products;

8. all projects in research and development as of the date of the divestiture required by this Order pursuant to Paragraph IV.B. that relate to improving existing, or developing new, Hampshire Products, including, but not limited to, all research materials, technical information, inventions, trade secrets, intellectual property, patents, technology, know-how (including, but not limited to, manufacturing know-how and application know-how), specifications, designs, drawings, processes, quality control data, and formulas, as well as licenses thereto, relating to all such projects in research and development;

9. all research materials and inventions and intellectual property used for research and development relating to Hampshire Products, including, but not limited to, trade secrets, test data, technology and know-how, and all patents, patent applications, patent rights, licenses, registrations, submissions and approvals;

10. all rights under warranties and guarantees, express or implied;

- 11. all items of prepaid expense;
- 12. all rights, titles and interests in registrations or other governmental approvals for

manufacture and sale of any Hampshire Non-Chelant Products, or research and development efforts for Hampshire Non-Chelant Products; and

13. all Hampshire (including Hampshire UK) brand names and trademarks for Hampshire Products worldwide, including the Hampshire corporate name and any brand names or trademarks that include the full word "Hampshire".

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#### IT IS FURTHER ORDERED that:

A. Respondent shall divest, absolutely and in good faith, as an ongoing business, simultaneously with consummation of the Acquisition, the Hampshire Chelant Business to Akzo pursuant to the agreement between Dow and Akzo dated as of November 15, 1997. Provided, however, that Respondent may retain (i) a non-exclusive, fully-paid and global license from Akzo to intangible assets and intellectual property used by the Hampshire Chelant Business in the research, development or manufacture of Hampshire Chelant Products to make, have made, use and sell Hampshire Non-Chelant Products; and (ii) a non-exclusive, fully-paid and global license relating to the manufacture of ED3A to make, have made, use and sell ED3A for use as a precursor for surfactants; and (iii) a non-exclusive, fully-paid, and global license to intellectual property used in the manufacture of PDTA to make, have made, use and sell PDTA in any part of the world.

B. The purpose of the divestiture of the Hampshire Chelant Business is to ensure the continuation of the Hampshire Chelant Business as an ongoing, viable business engaged in the research, development, manufacture, distribution and sale of Chelant Products independent of Dow, and in competition with Dow, and to remedy the lessening of competition resulting from the Acquisition as alleged in the Commission's Complaint.

C. On reasonable notice to Respondent, Respondent shall provide technical assistance and know-how to Akzo with respect to the Hampshire Chelant Business. Such technical assistance shall include, without limitation, consultation with knowledgeable employees of Hampshire and training at the manufacturing facilities of Hampshire. Respondent may charge the reasonable costs incurred in providing such technical assistance, including reimbursement (commensurate with the salary and benefits of Hampshire personnel involved) for the time plus expenses of Hampshire personnel providing the technical assistance. Hampshire shall continue to provide such technical assistance until Akzo is satisfied that it is capable of producing, and of developing for production, commercially saleable Chelant Products utilizing the assets of the Hampshire Chelant Business; provided, however, Hampshire shall not be required to continue providing such technical assistance and training after the earlier of (i) one (1) year after the Akzo Lima Expansion is fully operational and released to production; or (ii) three (3) years after the date this Order becomes final.

#### IT IS FURTHER ORDERED that:

A. Respondent shall exclusively toll manufacture for Akzo Hampshire Chelant Products at the Other Hampshire Facilities, at no more than Hampshire's historical cost as provided for in the agreement between Dow and Akzo dated as of November 15, 1997, in order to provide Akzo with sufficient time to accomplish the Akzo Lima Expansion for such period as Akzo may request, but in no event to extend beyond the earlier of (i) the date the Akzo Lima Expansion is fully operational and released to production or (ii) four (4) years after the date this Order becomes final. Upon the Akzo Lima Expansion being released to production, Respondent shall not manufacture at the Other Hampshire Facilities any Chelant Products for a period of one (1) year.

В.

B. Upon its acquisition of the Hampshire Chelant Business pursuant to Paragraph IV.A., above, Respondent shall divest, absolutely and in good faith, within sixty (60) days after Respondent has obtained from Akzo all assets pursuant to Paragraph IV.A. the Hampshire Business Unit as a viable and competitive business. Provided, however, Respondent may seek

B. If a trustee is appointed by the Commission or a court pursuant to Paragraph V.A. of this Order, Respondent shall consent to the following terms and conditions regarding the trustee's powers, duties, authority, and responsibilities:

and terms available in each contract that is submitted to the Commission, subject to Respondent's absolute and unconditional obligation to divest expeditiously at no minimum price. The divestiture shall be made in the manner, and to the acquirer or acquirers, as set out in Paragraph IV of this Order; provided, however, if the trustee receives bona fide offers from more than one acquiring entity, and if the Commission approves more than one such acquiring entity, then the trustee shall divest to the acquiring entity or entities selected by Respondent from among those approved by the Commission.

7. The trustee shall serve, without bond or other security, at the cost and expense of Respondent, on such reasonable and customary terms and conditions as the Commission or a court may set. The trustee shall have authority to employ, at the cost and expense of Respondent, such consultants, accountants, attorneys, investment bankers, business brokers, appraisers, and other representatives and assistants as are necessary to carry out the trustee's duties and responsibilities. The trustee shall account for all monies derived from the divestiture and all expenses incurred. After approval by the Commission (and, in the case of a court-appointed trustee, by the court) of the account of the trustee, including fees for his or her services, all remaining monies shall be paid at the direction of Respondent and the trustee's power shall be terminated. The trustee's compensation shall be based at least in significant part on a commission arrangement (based on sales price) contingent on the trustee's accomplishing the divestiture required by this Order.

8. Respondent shall indemnify the trustee and hold the trustee harmless against any losses, claims, damages, liabilities, or expenses arising out of, or in connection with, the performance of the trustee's duties, including all reasonable fees of counsel and other expenses incurred in connection with the preparation for, or defense of any claim, whether or not resulting in any liability, except to the extent that such liabilities, losses, damages, claims, or expenses result from misfeasance, gross negligence, recklessness, willful or wanton acts, or bad faith by the trustee.

9. If the trustee ceases to act or fails to act diligently, a substitute trustee shall be appointed in the same manner as provided in Paragraph V.A. of this Order.

10. The Commission (or, in the case of a court-appointed trustee, the court) may on its own initiative or at the request of the trustee issue such additional orders or directions as may be necessary or appropriate to accomplish the divestiture required by this Order.

11. The trustee shall have no obligation or authority to operate or maintain the Hampshire Business Unit.

12. The trustee shall report in writing to Respondent and the Commission every thirty (30) days concerning the trustee's efforts to accomplish the divestiture.

IT IS FURTHER ORDERED that within thirty (30) days after the date this Order becomes final, and every ninety (90) days thereafter until Respondent has fully complied with the provisions of Paragraphs II and III of this Order, Respondent shall submit to the Commission verified written reports setting forth in detail the manner and form in which Respondent intends to comply, is complying, and has complied with Paragraphs II and III of this Order. Provided, however, that within ten (10) days of Akzo's failure to meet any of the Akzo Lima Expansion Milestones, and every thirty (30) days thereafter until Respondent has fully complied with the provisions of Paragraphs IV and V of this Order, Respondent shall submit to the Commission verified written reports setting forth in detail the manner and form in which Respondent intends to comply, is complying, and has complied with Paragraphs IV and V. Respondent shall include in its compliance reports, among other things that are required from time to time, a full description of the efforts being made to comply with Paragraphs II, III, IV and V of the Order, including a description of all substantive contacts or negotiations for any divestiture required under Paragraph IV and the identity of all parties that have contacted Respondent or that have been contacted by Respondent. Respondent shall include in its compliance reports copies of all written communications to and from such parties, all internal memoranda, and all reports and recommendations concerning divestiture.

#### VII

**IT IS FURTHER ORDERED** that Respondent shall notify the Commission at least thirty (30) days prior to any proposed change in the corporate Respondent, such as dissolution, assignment, sale resulting in the emergence of a successor corporation, or the creation or dissolution of subsidiaries or any other change in Dow that may affect compliance obligations arising out of the Order.

#### VIII

#### **IT IS FURTHER ORDERED**

Signed this \_\_\_\_ day of November, 1997.

# FEDERAL TRADE COMMISSION

By:

Morris A. Bloom Attorney Bureau of Competition

Approved:

M. Howard Morse Assistant Director Bureau of Competition

George S. Cary Deputy Director Bureau of Competition

William J. Baer Director Bureau of Competition

# UNITED STATES OF AMERICA BEFORE FEDERAL TRADE COMMISSION

In the Matter of

THE DOW CHEMICAL COMPANY, a corporation.

Docket No.

## **COMPLAINT**

Pursuant to the provisions of the Federal Trade Commission Act and the Clayton Act, and by virtue of the authority vested in it by said Acts, the Federal Trade Commission, having reason to believe that the Dow Chemical Company's proposed acquisition of the South African company, Sentrachem Limited (Sentrachem"), including its U.S. subsidiary, Hampshire Chemical Corporation ("Hampshire"), would violate Section 5 of the Federal Trade Commission Act, as amended, 15 U.S.C. § 45, and would violate Section 7 of the Clayton Act, as amended, 15 U.S.C. § 18, and it appearing to the Commission that a proceeding in respect thereof would be in the public interest, hereby issues its complaint stating its charges as follows:

### I. THE RESPONDENT

### The Dow Chemical Company

1. Respondent Dow is a corporation organized, existing and doing business under and by virtue of the laws of Delaware, with its office and principal place of business located at 2030 Dow Center, Midland, Michigan. In 1996 Dow had worldwide sales of approximately \$20 billion.

2. Dow produces chemicals, plastics, and agricultural and consumer products. Through its Chemical Division, it is the leading producer in the U.S. of aminopolycarboxylic chelating agents, also known as chelants.

3. At all times relevant herein, Dow has been, and is now, a corporation as "corporation" is defined in Section 4 of the Federal Trade Commission Act, 15 U.S.C. § 44; and at all times relevant herein, Dow has been, and is now, engaged in commerce as "commerce" is defined in Section 4 of the Federal Trade Commission Act, 15 U.S.C. § 44, and Section 1 of the Clayton Act, 15 U.S.C. § 12.

# II. THE ACQUIRED COMPANY

4.. Sentrachem, a South African company, develops, manufactures, and markets a number of different commodity and specialty chemical products. In 1996 Sentrachem had worldwide sales of approximately \$1 billion. Sentrachem competes in the U.S. chelant market through its U.S. subsidiary, Hampshire, a Delaware corporation, with its principal place of business in Lexington, Massachusetts. In 1996, Hampshire's sales were approximately \$200 million.

# **III. THE ACQUISITION**

5. On or about August 5, 1997, Dow announced a cash tender offer to acquire all of the shares of Sentrachem for approximately \$425 million.

# IV. THE RELEVANT MARKET

6. One relevant line of commerce in which to analyze the proposed aqu cs,t y, Tc 0.1f

# VI. ENTRY CONDITIONS

9. Entry into the chelant market would not be timely, likely, or sufficient to deter or offset the adverse effects of the proposed acquisition on competition. A new entrant would have to build both a chelant production plant and a plant to produce hydrogen cyanide ("HCN"), a key input in the production of chelants, which would take over two years and entail large fixed, and mostly sunk, costs. In addition to the time to construct these facilities, a new firm must secure the environmental permits to produce HCN, a toxic substance. In order to recoup its investment, a new entrant would need to obtain a market share at least as large as that held by any of the current domestic producers, which would be difficult because of the significant amount of chelant sales that are subject to long term supply agreements. All these factors make entry into the U.S. chelant market unlikely.

### VII. EFFECT OF THE PROPOSED MERGER ON COMPETITION

10. The proposed acquisition would substantially lessen competition or tend to create a monopoly in the U.S. chelant market, because, among other things:

a. it increases concentration substantially in a highly concentrated market;

b. it eliminates actual, direct, and substantial, competition between Dow and Hampshire;

c. it facilitates the unilateral exercise of market power by the merged firm; and

d. it will likely result in increased prices for chelants.

## VIII. VIOLATIONS CHARGED

11. The proposed acquisition by Dow of all the shares of Sentrachem, described in paragraph 5, would violate Section 5 of the Federal Trade Commission Act, as amended, 15 U.S.C. § 45, and Section 7 of the Clayton Act, as amended, 15 U.S.C. § 18.

WHEREFORE, THE PREMISES CONSIDERED, the Federal Trade Commission on this \_\_\_\_\_\_ day of \_\_\_\_\_\_, 1998, issues its complaint against said respondent.

By the Commission.

Seal

Donald S. Clark Secretary

Issued:

## ANALYSIS OF PROPOSED CONSENT ORDER TO AID PUBLIC COMMENT

The Federal Trade Commission ("Commission") has accepted, subject to final approval, an Agreement Containing Consent Order ("Agreement") from The Dow Chemical Company.

The proposed Order has been placed on the public record for sixty (60) days for reception of comments by interested persons. Comments received during this period will become part of the public record. After sixty (60) days, the Commission will again review the Agreement and the comments received and will decide whether it should withdraw from the Agreement or make final the Agreement's proposed Order.

The Dow Chemical Company, a Midland, Michigan based company and producer of chemicals, plastics, and agricultural and consumer products, announced on August 5, 1997, a cash tender offer to acquire all of the share of Sentrachem Limited, a South African chemical company that operates in the U.S. through its wholly-owned subsidiary, Hampshire Chemical Company. Hampshire and Dow, through its Chemical Division, produce aminopolycarboxylic chelating agents, also known as chelants. Hampshire produces chelants in Nashua, New Hampshire and Deer Park, Texas, and chelant intermediates in Lima, Ohio. Dow produces chelants in Freeport, Texas.

The proposed administrative complaint alleges that the proposed acquisition may substantially lessen competition in the research, development, manufacture, and sale of chelants, which are chemicals used in cleaners, pulp and paper, water treatment, photography, agriculture, and food and pharmaceutical applications to neutralize and inactivate metal ions. The proposed complaint alleges that the United States is the relevant geographic market for evaluating the acquisition's effect on chelants because the shipping costs of chelants, which are sold mostly in a liquid solution, are high and there are too many uncertainties and delays inherent in long distance

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shipping.

The proposed complaint alleges that Hampshire and Dow are the two leading of only three producers of chelants in the United States, with a combined market share of over 70 percent. With only one other competitor, the acquisition would likely lead to a unilateral price increase, 1992 Horizontal Merger Guidelines § 2.22.

Entry into the chelant market would not be timely, likely, or sufficient to deter or offset the adverse effects of the acquisition on competition because a new entrant would have to build both a chelant production plant and a plant to produce hydrogen cyanide ("HCN"), a key input in the production of chelants, which would take over two years and entail large fixed, and mostly sunk,

permits for the additional capacity within one year after the Order becomes final, and the installation of the structural steel within one year after the additional capacity is permitted. In the event any of the Milestones has not been achieved, Dow must reacquire the Hampshire Chelant Business from Akzo. The proposed Order further requires that upon its reacquisition of the business, Dow or a trustee will divest the Hampshire Business Unit, which, in addition to the Hampshire Chelant Business, includes other Hampshire businesses and Hampshire facilities at Nashua, New Hampshire and Deer Park, Texas. The proposed Order requires Dow to maintain the viability and marketability of the Hampshire Business Unit in the interim. This crown jewel provision provides an incentive for realizing the additional chelant capacity at the Lima, Ohio facility in a timely manner. The crown jewel also ensures that the Order will result in effective relief by requiring a divestiture of all of Hampshire in the event that any Milestone is not achieved.

The proposed Order requires Dow to toll manufacture chelants for Akzo from Hampshire's Nashua and Deer Park facilities while Akzo builds additional chelant capacity at Lima. The proposed Order also contains a firewall provision that requires Dow to maintain the confidentiality of the Hampshire Chelant Business form Dow's Competing Chelant Business.

The purpose of this analysis is to facilitate public comment on the proposed Order. This analysis is not intended to constitute an official interpretation of the Agreement or the proposed Order or in any way to modify the terms of the Agreement or the proposed Order.

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