

Syllabus

IN THE MATTER OF
KALO INOCULANT COMPANYCOMPLAINT, FINDINGS, AND ORDER IN REGARD TO THE ALLEGED VIOLATION
OF SEC. 5 OF AN ACT OF CONGRESS APPROVED SEPT. 26, 1914*Docket 2745. Complaint, Mar. 14, 1936—Decision, Mar. 10, 1937*

Where a corporation engaged in the sale and distribution of legume seed inoculants consisting of nitrogen-fixing bacteria in a humus base, under trade name "Humogerm," to wholesalers, retailers, and jobbers of seed, and through them, ultimately, to growers of leguminous crops who mix such inoculants with legume seed to promote growth of said crops and enrich soil in which same were grown; in advertising its said "Humogerm" in national and State farm magazines and in circulars, pamphlets, price lists, and other advertising matter distributed and circulated among its customers and prospective customers and furnished to its wholesale and retail customers to be passed on to the purchasing public, and through its labels, as the case might be—

- (a) Represented to its said wholesale and retail customers, and supplied them with the means of representing to the ultimate purchaser, that its said containers were packed with a definite, ascertainable, minimum number of nitrogen-fixing bacteria, facts being that at time in question company from which it made its purchases and which mixed bacteria with humus base before shipping same in bulk to it, did not definitely ascertain definite number of such bacteria put in any given quantity of humus, and such numbers as were put in were subject to constant change during course of shipment, repackaging, and sale to ultimate purchaser;
- (b) Represented through words "Guaranteed packed with" that each and every can of its said product contained a specified, definite, minimum number of living legume bacteria throughout the entire course of the distribution of said product and up to expiration date appearing on label of can, facts being there is no way known to science by which exact number of legume organisms can be determined in a can of inoculant as of the time the same reaches the farmer and no concern can truthfully guarantee that its product will, at that time, contain a definitely specified minimum number of such bacteria, and it did not know that there were present in its containers number and type of nitrogen-fixing bacteria stated and represented on its labels, and such number had not been and could not accurately be ascertained;
- (c) Represented that its said product contained fifty percent more nitrogen-fixing bacteria than that of any other inoculant, and that its said product cost three and one-third cents per billion bacteria, facts being that number of bacteria in each can constantly varied, depending upon conditions to which can had been exposed, lack of uniformity in mixing, shipping in bulk and repackaging, and that, while use of a sufficient quantity of bacteria to produce adequate nodulation is essential, measurement of the relative values of competing commercial inoculants cannot truthfully be based on

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the respective number of bacteria contained therein in relation to the price charged and paid therefor; and

- (d) Represented that, through use of the patent lid on its container, its product reached the ultimate purchasers in such condition that the nitrogen-fixing bacteria therein contained were more virile or efficacious than those sold by competitors, and that, through use of aforesaid patent lid on its containers, molds or other contamination were effectively prevented, facts being that many of its competitors provide and maintain equal virility and efficacy in their legume inoculants through other and similar means, and that humus, in which the bacteria are mixed and packed, is nonsterile and may and does have many other kinds and strains of bacteria, including molds;

With effect of misleading and deceiving dealers and purchasing public, who were induced by reliance upon the truth of such representations to buy said "Humogerm" in preference to other legume inoculants which were competitive both as to price and quality, and of thereby diverting trade to it from its competitors, including those who do not, in their advertising or labels, misrepresent the quantity of bacteria contained therein or that such numbers can be ascertained accurately, or otherwise, by false and misleading statements, induce and promote the sale of said products, or in any manner misrepresent the kind, condition, character, cost or efficacy of such competitive products:

Held, That such acts and practices were to the prejudice of the public and competitors and constituted unfair methods of competition.

Before *Mr. John W. Norwood*, trial examiner.

Mr. PGad B. Morehouse for the Commission.

Mr. Joseph K. Moyer and *Mr. Craig L. Reddish*, of Washington, D. C., and *Mr. J. LeRoy Adair*, of Quincy, Ill., for respondent.

COMPLAINT ¹

Pursuant to the provisions of an Act of Congress approved September 26, 1914, entitled "An Act to create a Federal Trade Commission, to define its powers and duties, and for other purposes," the Federal Trade Commission, having reason to believe that Kalo Inoculant Company, a corporation, hereinafter referred to as respondent, has been and is using unfair methods of competition in commerce, as "commerce" is defined in said act, and it appearing to the said Commission that a proceeding by it in respect thereof would be in the public interest, hereby issues its complaint, stating its charges in that respect as follows:

PARAGRAPH 1. Respondent is a corporation, organized in September 1934, existing and doing business under and by virtue of the laws of the State of Illinois, with its principal office and place of

¹ Extended quotation in Par. 2 of the complaint, from respondent's advertising matter with respect to its said product, "Humogerm," is set forth in the findings, *infra*, at page 814, and is omitted from the complaint as published in the interest of brevity.

business in the city of Quincy, in said State. It now is, and since its organization has been engaged in the sale and distribution of nitrogen-fixing bacteria with a humus base, packed in tin cans, under the trade name "Humogerm," to wholesalers, retailers, and jobbers of seed, and through them, ultimately, to growers of leguminous crops who mix the contents of said cans with the legume seed for the purposes of promoting the growth of said crops and enriching the soil in which said crops are grown. The aforesaid bacteria are micro-organisms known as "bacilli," "radicicola" and "rhizobia," which when mixed and planted with the seed, form nodules on the roots of the growing legume, resulting in the extraction of nitrogen from the air instead of from the soil, and the fixation of such nitrogen in the plant and surrounding soil, thereby substantially stimulating the growth of the legume crop. Respondent purchases in bulk the humus containing such bacteria from the Earp-Thomas Laboratories Corporation of Bloomfield, N. J., repackages it in small tin containers and sells the same in constant course of trade and commerce between and among the various States of the United States. In the course and conduct of its business it causes the said product, when sold to be shipped from its place of business in the city of Quincy, State of Illinois, into and through various States of the United States to the purchasers thereof. In the course and conduct of its said business, respondent now is and since the date of its organization has been in substantial competition with other corporations and with individuals, partnerships, and firms engaged in the sale and distribution in interstate commerce of products used for similar purposes and of other commercial legume inoculators.

PAR. 2. In the course and conduct of its business as aforesaid, respondent, in soliciting the sale of and selling its said product "Humogerm" in interstate commerce, caused and causes the same to be advertised in national and state farm magazines and in circulars, pamphlets, price lists, and other advertising matter which it distributes and circulates among its customers and prospective customers. It also furnishes such advertising matter to its wholesale and retail customers to be passed on to the purchasing public to induce and promote the sales of its said product. In such advertising matter respondent makes the following representations and furnishes its wholesale and retail vendees with the means of making the same representations of fact as follows:²

²The extended quotation of respondent's advertising which follows at this point is set forth in Par. 3 of the findings, *infra*, at page 814, and is omitted from the complaint as published in the interest of brevity.

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Respondent's aforesaid product is packed in small round cans in six varieties, one variety for each type of legume seed with each variety in three sizes varying from four ounces to 2½ pounds. The size of each can is stated thereon in terms of the amount of seed which that particular can will inoculate. Each can is sealed with a small pinhole in the top to admit air. All cans are labelled in the same manner with the exception of the culture number, the amount of seed to be inoculated and the number of bacteria placed in the can as follows:

HUMOGERM Nitrogen Fixing Bacteria Prepared by Earp-Thomas Laboratories Exclusively for KALO INOCULANT CO., QUINCY, ILL.

On the reverse side of each can appears the following wording:

GUARANTEE

HUMOGERM is guaranteed packed with the number and type of high-bred nitrogen-fixing bacteria shown on the label, more than sufficient to inoculate the number of seeds specified. Because of conditions beyond our control field results can naturally not be guaranteed.

The top of each can contains the number of legume germs, the bushel size can being labelled as follows:

This Can Packed With Over 15 BILLION LEGUME GERMS

Each size can contains a similar statement as to the number of germs in proportion to the one bushel size. The culture numbers, size of the can, germ count and retail price appear in the following table:

Culture No.	Size	Germ count	Price
	<i>Bushel</i>	<i>Billion</i>	
1 and 2.....	½	7½	\$0.35
1 and 2.....	1	15	.50
1 and 2.....	2½	37½	1.00
3, 5, 7, and 9.....	1	7½	.35
3, 5, 7, and 9.....	2	15	.50
3, 5, 7, and 9.....	5	37½	1.00

PAR. 3. By means of the statements above set out in paragraph 2 hereof, respondent misrepresents to its wholesale and retail customers and furnishes them with the means of misrepresenting to the ultimate purchaser as follows:

(a) That its said containers are packed with a definite ascertainable minimum number of nitrogen-fixing bacteria when such is not the case, but in truth and in fact the Earp-Thomas Laboratories Corporation which mixed the bacteria with the humus base before shipping

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it in bulk to respondent, does not definitely ascertain the definite minimum number of such bacteria put in any given quantity of humus, and such numbers as are put in said humus are subject to constant change during the course of shipment and repackaging and sale to the ultimate purchaser.

(b) That each and every can of its said product contains a specified definite minimum number of living legume bacteria throughout the entire course of the distribution period of said product and up to the expiration date thereof appearing on the label of said can, when such is not the fact, and respondent does not know that its containers contain the number and type of nitrogen-fixing bacteria as stated and represented on its labels, the number of which bacteria has not been and can not be accurately ascertained.

(c) That its product contains 50% more nitrogen-fixing bacteria and that the bacteria count of each can of its product is 50% higher than that of any other inoculant when such is not the fact and such misrepresentation is a false disparagement of the products of respondent's competitors.

(d) That its said product costs $3\frac{1}{3}\phi$ per billion bacteria when such is not the fact, but the number of bacteria in each can constantly varies depending upon the conditions to which the can has been exposed, lack of uniformity in mixing, shipping in bulk and in repackaging, and when the measurement of the relative values of competing commercial inoculators can not truthfully be based on the respective number of bacteria contained therein in relation to the price charged and paid therefor.

(e) That by the use of the patent lid on its containers its product reaches the ultimate purchasers in such condition that the nitrogen-fixing bacteria therein contained are more virile or efficacious than those sold by competitors, when in truth and in fact many of its competitors by other and similar means provide for and maintain equal virility and efficacy in their legume inoculators.

(f) That by the use of the aforesaid patent lid on its containers, molds or other contamination is effectively prevented when in truth and in fact the humus in which the said bacteria are mixed and packed is non-sterile and may and does have many other kinds and strains of bacteria, including molds.

PAR. 4. There are among the competitors of respondent engaged in the sale and distribution of legume inoculators, as mentioned in paragraph 1 hereof, corporations, firms, partnerships and individuals who, in soliciting the sale of and selling their said products in interstate commerce, do not, in their advertising, or labels, misrepresent the

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quantity of bacteria contained therein, or that such numbers can be accurately ascertained; or otherwise, by false and misleading statements, induce and promote the sale of their said products.

PAR. 5. The representations by respondent as set forth in paragraphs 2 and 3 hereof and each of them have the capacity and tendency to and do mislead and deceive dealers and the purchasing public who, relying upon the truth of the said representations, are thereby induced to purchase "Humogerm" in preference to other legume inoculants which are competitive both as to price and quality, thus diverting trade to respondent from its competitors who do not in the aforesaid or in any other manner misrepresent the kind, condition, character, cost or efficacy of such competitive products.

PAR. 6. The acts and things above alleged to have been done and the false representations alleged to have been made by respondent, are to the prejudice of the public and the competitors of respondent and constitute unfair methods of competition in commerce within the intent and meaning of Section 5 of an Act of Congress entitled "An Act to create a Federal Trade Commission, to define its powers and duties, and for other purposes," approved September 26, 1914.

REPORT, FINDINGS AS TO THE FACTS, AND ORDER

Pursuant to the provisions of an Act of Congress approved September 26, 1914, entitled "An Act to create a Federal Trade Commission, to define its powers and duties, and for other purposes," the Federal Trade Commission, on March 14, 1936, issued and served its complaint in this proceeding upon respondent Kalo Inoculant Company, charging it with the use of unfair methods of competition in commerce in violation of the provisions of said act. After the issuance of said complaint, and the filing of respondent's answer thereto, testimony and other evidence in support of the allegations of said complaint were introduced by PGad B. Morehouse, attorney for the Commission, before John W. Norwood, an examiner of the Commission theretofore duly designated by it, and no testimony or other evidence was introduced on behalf of respondent in opposition thereto. Whereupon respondent, by its attorney J. LeRoy Adair submitted a motion for leave to withdraw its said answer and to substitute therefor an answer admitting all of the material allegations of the complaint to be true and waiving the taking of further evidence and all other intervening procedure, which said motion, by order entered herein, the Commission granted, and the said substitute answer and testimony and other evidence were duly filed in the office of the Commission. Thereafter, this proceeding regularly came on for final hearing before the Commission on the

said complaint, testimony, other evidence and the substituted answer, and the Commission having duly considered the same and being now fully advised in the premises, finds that this proceeding is in the interest of the public, and makes this its findings as to the facts and its conclusion drawn therefrom:

FINDINGS AS TO THE FACTS

PARAGRAPH 1. The respondent corporation, Kalo Inoculant Company, was organized in September 1934, under the laws of the State of Illinois, and has its principal office and place of business at 1007 Main Street, in the city of Quincy in said State. It is now, and since its organization, has been engaged in the sale and distribution of legume seed inoculants consisting of nitrogen-fixing bacteria in a humus base, under the trade name "Humogerm," to wholesalers, retailers, and jobbers of seed, and through them, ultimately, to growers of leguminous crops who mix such inoculants with legume seed for the purposes of promoting the growth of said crops and enriching the soil in which said crops are grown. The aforesaid bacteria are micro-organisms known to science as "bacilli radiculicola" and "rhizobia," which, when of proper virility and mixed with the seed in sufficient quantities to inoculate the same, form nodules on the roots of the growing legume, resulting in the extraction of nitrogen from the air, instead of from the soil, and the fixation of such nitrogen in the plant and surrounding soil, thereby substantially stimulating the growth of the legume crop.

From September 1934 until approximately July 1, 1935, the Kalo Company, an Illinois corporation of which this respondent is a wholly controlled subsidiary selling agent, purchased the aforesaid product in bulk from the Earp-Thomas Laboratories Corporation of Bloomfield, N. J., where it was produced in the following manner:

Mother cultures of each type of legume organism were grown in small bottles of agar jelly, these having been developed some twenty years ago by Doctor Earp-Thomas. From these small amounts of culture were introduced into a series of thirty-two ounce bottles, some containing liquid media, some solid media; the solid media being the standard agar jelly. These bottles and their contents were sterilized by being placed in an autoclave at high temperature, which kills all organisms. After the cultures were introduced the large bottles were permitted to incubate for a period of eight days to three months, depending on the amount of Humogerm to be produced. At this time the bacteria would have grown and multiplied to the highest number, and the contents of six of the bottles containing the agar media, and three of those containing the liquid media were introduced

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into each one hundred pounds of humus. From the examination of the laboratory and processes used it definitely appeared that the cultures were sterile and pure at the time they were mixed with the humus. The humus was then permitted to dry for several days, and when in moist condition was placed, prior to about April 1935 in "Bemis" or burlap bags, and for a time thereafter into waterproof airtight paper-lined bags and shipped to the Kalo Company. Tests were made by the Earp-Thomas Laboratories from time to time of sample thirty-two ounce bottles, and in that way an estimate was by Earp-Thomas Laboratories made of the number packed into each one hundred pounds of humus. The estimate therefrom being made as a definite amount of the humus was placed in each can by the Kalo Company. In addition to the tests on the thirty-two ounce bottles, the Kalo Inoculant Company returned one can from each batch of humus, consisting of from eight to twenty bags, to the Earp-Thomas Corporation for testing purposes. Then tests of those samples were made by the plate count method for the number of organisms, and by the Wilson test, to determine sufficient nodulation.

The Wilson test consists of an actual demonstration of the inoculating efficiency (or lack of it) on growing legume plants under controlled conditions, the alleged inoculant being mixed with the seeds, which are then planted, and the ensuing growth of the plants and the number of root nodules checked and recorded.

It took four days for the samples to reach the Earp-Thomas Laboratories, four to eight days to make the plate count, and two or more days to notify the distributor of the results. A period of over two weeks thus sometimes elapsed between the time the humus was received by the Kalo Inoculant Company and the time when the condition was made known by the tests. By that time most of the product might have been packed and sold by the Kalo Company. The Wilson test took from three to six weeks, so that the results of such test were not effective to prevent the sale of any humus found thereby to be unsatisfactory. During the season from the fall of 1934 to April 1935, a total of approximately thirty-eight thousand five hundred pounds of the product was shipped to the Kalo Company, and of this amount eleven hundred pounds were returned, as unsatisfactory as the result of the test made. This occurred during the time Bemis bags were in use.

In July 1935, the Earp-Thomas Laboratories Corporation employed an additional bacteriologist at Bloomfield, N. J., whose duties consisted chiefly of growing, checking, rechecking, and counting the bacteria which was shipped to the Kalo Company in sealed labora-

tory jars in which the bacteria continued to grow after leaving the laboratory. On September 1, 1936, respondent changed its entire method of obtaining and preparing its product for distribution and sale and employed a competent bacteriologist at its plant in Quincy, Ill., who is in complete charge of the production of bacteria for respondent's inoculant, and since that time respondent has not obtained such bacteria in any form from the aforesaid Earp-Thomas Laboratories Corporation in New Jersey.

Since September 1936, respondent's product has been prepared for distribution and sale at Quincy, Ill., under the complete supervision of such bacteriologist who first determines the type of the bacteria through original strains used for inoculating the agar cultures. An aqueous suspension is prepared from the agar cultures contained in thousands of thirty-two ounce bottles, and after the bacteria are washed off the agar into the said liquid suspension contained in five gallon cans, their number is by him ascertained by what is known as the Petroff-Hauser method. This method consists of a direct count and is a scientifically approved method of making a count of pure cultures of any type of bacteria, having been in use for several years. The liquid or aqueous suspension is thoroughly stirred, a sample removed, a proper dilution made, and the organisms, which are contained in a small chamber on a plate, directly counted under a microscope. Whereas the bacteriological plate count counts the colonies that develop from the organisms in solution after a necessary period of incubation, it is not necessary to wait for colonies to form to make the count by the Petroff-Hauser method. By such method, respondent, since its adoption, can and does ascertain with a reasonable degree of certainty the number of bacteria in each 5 gallon can of liquid suspension, two of which are thoroughly mixed with each 200 lbs. of humus, and respondent can therefrom compute with reasonable accuracy the minimum number of organisms with which the small 4 ounce to 2½ lb. cans are packed for sale and distribution. However, after packing, respondent cannot know with any certainty whatever, for the reasons below set out, the minimum number of such organisms at any other time than when packed.

PAR. 2. Legumes or Leguminosae are one of the plant families having separate visible structural characteristics. Consisting of thousands of plants, the ones of particular economic and agricultural importance are the alfalfa and sweet clover group, the common clover group, such as red mammoth, alsike, and white, the pea group, the field bean group, and the soy bean group. Legume crops are of value to the farmer by virtue of an ability to utilize free nitrogen

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resources of the air, and, if inoculated, will have a higher nitrogen content than otherwise, and thus both stimulate themselves and increase the fertility of the soil. Also such crops are valuable by reason of their ability to survive drouth and to grow under extremely unfavorable conditions.

It has been ascertained that about four-fifths of the air by volume is nitrogen and that this nitrogen may be transferred successfully from the air to the soil by what is known as nitrogen fixation.

There are thousands of micro-organisms in various soils. Some of such micro-organisms are *radicicola* bacillus, actinomycetes, azotobacter, fungi, molds, etc. One of these soil organisms was discovered in 1897 in Germany and a Mr. Reiche, in 1908, brought the knowledge of it to America. This bacterium is known to scientists as "*bacillus radicicola*", and "*rhizobium*".

These bacteria, when mixed with legume seed before sowing, have the peculiar property of being able to infect the root of the plant. When the root is so infected a rapid increase of cell structure takes place becoming visible in time and this is called a nodule. The physiological relationship then taking place between the plant and the nodule results in the stimulation of the plant and an increase in the nitrogen content of the plant and thus the farmer, who has an inoculated legume crop, is obtaining a very valuable chemical element for the soil instead of depleting the nitrogen resources of the soil. This is what is known as nitrogen fixation or symbiosis. Symbiosis means merely a mutual exchange of the plant's carbohydrates and sugar produced by rain, sunlight and air, for the nitrogen fixation produced by bacterial infection and sometimes this is called symbiotic nitrogen fixation.

For the different groups of legumes above enumerated, different species of *bacillus radicicola* have been isolated by the bacteriologists through experimentation, finally selecting the particular species best suited to growth upon the host plant of each particular group.

Owing to the non-sterile character of the media into which the *radicicola* or *rhizobium* are packed for commercial purposes, the inoculant when packed contains many other bacteria and micro-organisms foreign thereto, such as actinomycetes, azotobacter, fungi or molds which begin to absorb the food contained in the media, increasing in numbers very greatly during the first few weeks and thereafter, by reason of many factors such as depletion of food supplies, excreta, contaminating conflicts, etc., the *radicicola* or *rhizobium* begin rapidly to die so that after a period of approximately 23

weeks, even under proper conditions, the aforesaid increase is totally obliterated and the curve of viability or longevity of the proper germ content of the can is still decreasing. Therefore, according to the expert bacteriological testimony, one would not expect after a period of 105 to 160 days to find over ten per cent of the original number alive in an unsealed container.

The containers used by all concerns distributing commercial inoculants admit air either through a small pin hole or through the porous material of the container itself, and respondent's container has a patented air vent in the lid thereof for the purpose of preventing any outside contamination or molds entering the can after packing. There is no way known to science by which the exact number of legume organisms can be determined in a can of inoculants as of the time the same reaches the farmer, and no concern can truthfully guarantee that its product will at that time contain a definitely specified minimum number of such bacteria. Furthermore, while it is essential that there be a sufficient quantity of bacteria when used to produce adequate nodulation, the measurement of the relative values of competing commercial inoculants cannot truthfully be based solely upon the respective number of bacteria contained therein in relation to the price charged and paid therefor.

PAR. 3. Respondent causes its said product when sold to be shipped from its place of business in the city of Quincy, State of Illinois, into and through various States of the United States to the purchasers thereof. In the course and conduct of its said business, respondent now is and since the date of its organization has been in substantial competition with other corporations and with individuals, partnerships, and firms engaged in the sale and distribution in interstate commerce of products used for similar purposes and of other commercial legume inoculators.

In the course and conduct of its business as aforesaid, respondent, in soliciting the sale of and selling its said product "Humogerm" in interstate commerce, caused and causes the same to be advertised in national and state farm magazines and in circulars, pamphlets, price lists, and other advertising matter which it distributes and circulates among its customers and prospective customers. It also furnishes such advertising matter to its wholesale and retail customers to be passed on to the purchasing public to induce and promote the sales of its said product. In such advertising matter respondent makes the following representations and furnishes its whole-

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sale and retail vendees with the means of making the same representations of fact as follows:

(a) MAKE MORE PROFIT with HUMOGERM 50% MORE NITROGEN FIXING BACTERIA

The Bacteria count on each can of HUMOGERM is 50% higher than that of any other inoculant, FIFTEEN BILLION PER SMALL SEED BUSHEL.

AT A NEW LOW PRICE

The same high quality of culture which formerly sold for over \$1.00 per bushel is now sold at a popular low price to furnish to the farmer

HIGH-BRED SELECTED BACTERIA AT 3½ CENTS PER BILLION thus making HUMOGERM by far the greatest value on the market today, and the lowest priced inoculant to use.

In addition, HUMOGERM now comes in a new modern package, with a beautiful three color varnished label, retaining the exclusive Earp-Thomas patent lid which provides air, which nitrogen fixing bacteria must have to live and grow, also protects against molds and other outside contamination, and retains the necessary moisture.

PROTECT YOUR SEEDS, YOUR CUSTOMERS, YOUR PROFIT

Even poor seed inoculated with HUMOGERM may produce better than untreated good seed. Good seed inoculated with HUMOGERM builds more business and profit for you.

KALO INOCULANT COMPANY

Quincy, Illinois.

Sell HUMOGERM with each lot of legume seed, and increase your customers' satisfaction. Recommend this superior culture because it actually delivers more live virile bacteria to the grower at planting time.

HUMOGERM is fresh for your protection.

Each can is dated to insure the grower receiving fresh, live virile, NITROGEN FIXING BACTERIA and may be exchanged for new HUMOGERM when the dating expires.

It is furnished in the following culture groups

- No. 1. For Red, Mammoth, Alsike, Crimson and White Clovers.
- No. 2. For Alfalfa, all Sweet Clover, Hubam and Bur Clovers.
- No. 3. For all Vetches, Field and Garden Peas, Austrian Winter Peas, Broad Beans, Sweet Peas, Perennial Peas.
- No. 5. For Garden Peas and Beans, Sweet Peas, Field Beans, Navy Beans, Scarlet Runner Beans.
- No. 7. For Cow Peas, Peanuts, Lima Beans, Velvet Beans, Lespedeza.
- No. 9. For Soy Beans (any variety).
- GARDEN SIZE. For Sweet Peas, Garden Peas or Beans, Lupines.
- Now 50 Cents Per Bushel (small seeds)

(The price the farmer wants to pay:)

	<i>Dealer price dozen</i>	<i>Retail price each</i>
Cultures 1 & 2 (Small seeds)		
½ bu. (for 30 lbs. seed)-----	\$2. 80	\$0. 35
1 bu. (for 60 lbs. seed)-----	4. 00	. 50
2½ bu. (for 150 lbs. seed)-----	8. 00	1. 00
Cultures 3-5-7 & 9 (Large seeds)		
1 bu. (for 60 lbs. seed)-----	2. 80	. 35
2 bu. (for 120 lbs. seed)-----	4. 00	. 50
5 bu. (for 300 lbs. seed)-----	8. 00	1. 00
Garden Size-----	1. 20	. 15

ALL LEGUMES

SHOULD BE

INOCULATED

with

Earp-Thomas Process

Moist Powder

HUMOGERM

A Humus Base Legume Inoculant

With 50% More Nitrogen

Fixing Bacteria

(The bacteria count on each can of
HUMOGERM is 50% higher than that of
any other inoculant.)

Fifteen Billion Per Small Seed Bushel

AT NEW LOWER PRICE

You can now secure the same high quality of culture which formerly sold as high as \$1.40 per bushel at a new popular price so that your cost is only

31½ CENTS PER BILLION HIGH-BRED SELECTED BACTERIA which are in live, virile condition when received by you, having been packed in the patent Earp-Thomas package which admits air, which nitrogen fixing bacteria must have to live and grow, but prevents molds and other outside contamination while preserving the necessary moisture.

INOCULATE ALL LEGUMES

Even poor seed inoculated with HUMOGERM may produce better than good seed not inoculated. Good seed inoculated with this culture increase your crops and make you a handsome extra profit.

THERE IS NO ACCEPTABLE SUBSTITUTE FOR HUMOGERM

* * * * *

FRESH—for your protection. Each can of HUMOGERM is dated to insure you receiving fresh, live, virile Nitrogen Fixing Bacteria.

Respondent's aforesaid product is packed in small round cans in six varieties, one variety for each type of legume seed with each variety in three sizes varying from four ounces to 2½ pounds. The size of each can is stated thereon in terms of the amount of seed which that

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particular can will inoculate. Each can is sealed with a small pinhole in the top to admit the air. All cans are labelled in the same manner with the exception of the culture number, the amount of seed to be inoculated and the number of bacteria placed in the can as follows:

HUMOGERM Nitrogen Fixing Bacteria Prepared by Earp-Thomas Laboratories Exclusively for KALO INOCULENT CO., QUINCY, ILL.

On the reverse side of each can appears the following wording:

GUARANTEE

HUMOGERM is guaranteed packed with the number and type of high-bred nitrogen-fixing bacteria shown on the label, more than sufficient to inoculate the number of seeds specified. Because of conditions beyond our control field results can naturally not be guaranteed.

The top of each can contains the number of legume germs, the bushel size can being labelled as follows:

This Can Packed With Over 15 BILLION LEGUME GERMS

Each size can contains a similar statement as to the number of germs in proportion to the one bushel size. The culture numbers, size of the can, germ count and retail price appear in the following table:

Culture No.	Size	Germ count	Price
	<i>Bushel</i>	<i>Billion</i>	
1 and 2.....	1½	7½	\$0.35
1 and 2.....	1	15	.50
1 and 2.....	2½	37½	1.00
3, 5, 7, and 9.....	1	7½	.35
3, 5, 7, and 9.....	2	15	.50
3, 5, 7, and 9.....	5	37½	1.00

PAR. 4. Prior to September 1, 1936, by means of the statements above set out and other similar advertising matter and labelling which have not been discontinued, respondent misrepresented to its wholesale and retail customers and furnished them with the means of misrepresenting to the ultimate purchaser as follows:

(a) That its said containers were packed with a definite ascertainable minimum number of nitrogen-fixing bacteria when such, until July 15, 1935, was not the case, but in truth and in fact the Earp-Thomas Laboratories Corporation which mixed the bacteria with the humus base before shipping it in bulk to respondent, did not definitely ascertain the definite minimum number of such bacteria put in any given quantity of humus, and such numbers as were put in said humus were subject to constant change during the course of shipment, repackaging, and sale to the ultimate purchaser.

And by means of the foregoing statements and similar statements in its advertising on its cans, respondent has misrepresented and now misrepresents to its wholesale and retail customers and furnishes them with the means of misrepresenting to the ultimate purchaser as follows:

(b) That each and every can of its said product contains a specified definite minimum number of living legume bacteria throughout the entire course of the distribution period of said product and up to the expiration date hereof appearing on the label of said can, when such is not the fact, and respondent does not know that its containers contain the number and type of nitrogen-fixing bacteria as stated and represented on its labels, the number of which bacteria has not been and can not be accurately ascertained.

(c) That its product contains 50% more nitrogen-fixing bacteria and that the bacteria count of each can of its product is 50% higher than that of any other inoculant when such is not the fact and such misrepresentation is a false disparagement of the products of respondent's competitors.

(d) That its said product costs $3\frac{1}{3}\text{¢}$ per billion bacteria when such is not the fact, but the number of bacteria in each can constantly varies depending upon the conditions to which the can has been exposed, lack of uniformity in mixing, shipping in bulk and in repackaging, and when the measurement of the relative values of competing commercial inoculators cannot truthfully be based on the respective number of bacteria contained therein in relation to the price charged and paid therefor.

(e) That by the use of the patent lid on its containers its product reaches the ultimate purchasers in such condition that the nitrogen-fixing bacteria therein contained are more virile or efficacious than those sold by competitors, when in truth and in fact many of its competitors by other and similar means provide for and maintain equal virility and efficacy in their legume inoculators.

(f) That by the use of the aforesaid patent lid on its containers, molds or other contamination are effectively prevented when in truth and in fact the humus in which the said bacteria are mixed and packed is non-sterile and may and does have many other kinds and strains of bacteria, including molds.

PAR. 5. There are among the competitors of respondent engaged in the sale and distribution of legume inoculators, as above mentioned, corporations, firms, partnerships, and individuals who, in soliciting the sale of and selling their said products in interstate commerce, do not, in their advertising, or labels, misrepresent the quantity of

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bacteria contained therein, or that such numbers can be accurately ascertained; or otherwise, by false and misleading statements, induce and promote the sale of their said products.

PAR. 6. The representations by respondent as set forth above, and each of them have the capacity and tendency to and do mislead and deceive dealers and the purchasing public, who, relying upon the truth of the said representations, are thereby induced to purchase "Humo-germ" in preference to other legume inoculants which are competitive both as to price and quality, thus diverting trade to respondent from its competitors who do not in the aforesaid or in any other manner misrepresent the kind, condition, character, cost or efficacy of such competitive products.

CONCLUSION

The aforesaid acts and practices of the respondent, Kalo Inoculant Company, are to the prejudice of the public and of respondent's competitors, and constitute unfair methods of competition in commerce within the intent and meaning of Section 5 of an Act of Congress, approved September 26, 1914, entitled "An Act to create a Federal Trade Commission, to define its powers and duties, and for other purposes."

ORDER TO CEASE AND DESIST

This proceeding having been heard by the Federal Trade Commission upon the complaint of the Commission, testimony and other evidence in support of the allegations of the complaint introduced by PGad B. Morehouse, Attorney for the Commission, before John W. Norwood, an examiner of the Commission theretofore duly designated by it, and upon the answer of the respondent filed herein, dated February 1, 1937, admitting all the material allegations of the complaint to be true, and waiving the taking of further evidence and all other intervening procedure, and the Commission having made its findings as to the facts and its conclusion that said respondent has violated the provisions of an Act of Congress, approved September 26, 1914, entitled "An Act to create a Federal Trade Commission, to define its powers and duties, and for other purposes."

It is ordered, That the respondent, Kalo Inoculant Company, its officers, representatives, agents, and employees, in connection with the offering for sale, sale and distribution of Humo-germ, a nitrogen-fixing bacteria used as a legume inoculant in interstate commerce, do forthwith cease and desist from representing:

(a) That the containers in which said product is sold are packed with fifteen billion (15,000,000,000) legume germs, or any other

definitely specified quantity or number and type of such germs, unless and until such definitely specified quantity or number has been scientifically ascertained by a controlled bacteriological count made by a competent bacteriologist, using scientifically approved method or methods;

(b) By the words, "Guaranteed packed with," a definitely specified number and type of nitrogen-fixing bacteria, or words or phrases of like import, that such definitely specified number of such type of nitrogen-fixing bacteria is in the container at any time other than the time when said container was packed;

(c) That merely by reason of the germ count so specified being a higher count than that specified on any other legume inoculant, such other legume inoculant is inferior to respondent's product;

(d) That its product costs $3\frac{1}{3}$ cents per billion bacteria or any other definite statement of the cost thereof per billion, or any other similar unit, not based upon the ascertainment of the number of such bacteria in each container as of the time when packed; or advertising the cost per unit of germ count in such manner as to import or imply that the relative values of commercial legume inoculants are dependent entirely upon the said cost per unit.

(e) That competitive products not using the Earp-Thomas patented lid are thereby subject to molds or contamination, or that the use of such patented lid by respondent effectually prevents other than outside contamination or molds from entering the can after packing;

It is further ordered, That the respondent shall, within 60 days after service upon it of this order, file with the Commission a report in writing setting forth in detail the manner and form in which it has complied with this order.

IN THE MATTER OF
PIKE-HANSEN, INC.

COMPLAINT, FINDINGS, AND ORDER IN REGARD TO THE ALLEGED VIOLATION
OF SEC. 5 OF AN ACT OF CONGRESS APPROVED SEPT. 26, 1914

Docket 2938. Complaint, Oct. 2, 1936—Decision, Mar. 10, 1937

Where a corporation engaged in the offer and sale of men's clothing through some five hundred traveling salesmen whom it equipped with order blanks containing spaces for the individual measurements of each purchaser and with samples of materials for purchaser's selections as to color, weave, and quality of material from which the suit or other garment was to be made, and price of which varied according to quality of material selected, and who solicited and accepted orders for such clothing, taking purchaser's measurements and recording such and other information regarding his weight, height, etc., on the order blank, and forwarding same and collecting substantial part of agreed purchase price at time of acceptance of order, with balance payable upon delivery; and such agents or representatives, as case might be—

- (a) Represented and implied to prospective purchasers of its said clothing that it would make for and deliver to them made-to-measure or tailor-made garments made from material of the color, weave and quality selected from the samples exhibited, notwithstanding fact that garments delivered, in many instances, were not made-to-measure or tailor-made, as understood by purchasing public, did not fit in same manner as do such garments, due to lack of experience or skill on the part of its salesmen and its employees in making up the same, and, in some instances, did not fit at all or with any reasonable relation to individual to whom delivered, and, in many instances, were so cut and constructed that it was not possible for expert tailors to alter same so as to make them fit, and its failure and refusal to return purchase money received from such purchasers or to deliver to them garments that would fit;
- (b) Represented to purchasers of its said clothing that it would make for and deliver to them garments from materials of the color, weave, and quality selected by such purchasers from samples furnished to its salesmen or exhibited to such purchasers, notwithstanding fact, in many instances, it did not deliver to purchaser garment thus made, but delivered one made from material which it had substituted for that selected by purchaser and which was different in color and weave from and inferior in quality to material selected, and failure and refusal in such instances to return purchase money received or deliver garment made from material selected; and
- (c) Represented, in soliciting sale of its said clothing, to many prospective purchasers, that delivery would be made to them by salesmen or agent in person, so as to afford them opportunity to inspect the garment ordered as to material from which made and as to fit, prior to payment of balance of purchase money due it, notwithstanding fact garment was shipped to purchaser by parcel post, cash on delivery for balance of purchase money, no inspection was permitted, and its failure and refusal to return purchase price received or permit inspection before delivery;