

STATE OF WISCONSIN : CIRCUIT COURT : MILWAUKEE COUNTY
BRANCH 8

STROH DIE CASTING COMPANY,

Plaintiff,

VOLUME XXI (a.m.)

v.

Case No. 639-887

MONSANTO COMPANY,

Defendant.

May 14, 1991

Honorable Michael J. Barron
Circuit Judge Presiding

A-P-P-E-A-R-A-N-C-E-S

RIORDAN, DRIVELLO, CARLSON, MENTKOWSKI, STEEVES by
DONALD CARLSON AND JOHN PENDERGAST, appeared on behalf of the
Plaintiff.

BORGELT, POWELL, PETERSON, FRAUEN by JOSEPH McDEVITT
and KIRKLAND AND ELLIS by ANDREW RUNNING appeared on behalf
of the Defendant.

* * *

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I N D E X

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P-R-O-C-E-E-D-I-N-G-S

THE COURT: Good morning. Looks like we are ready to resume the cross-examination of Mr. Papageorge.

CROSS EXAMINATION (con't)

BY MR. CARLSON:

Q Good morning.

A Good morning.

Q Mr. Papageorge, I'd like to ask you a couple of questions about what happens to PCBs at elevated temperatures. Is it true, sir, that temperatures in a range of 600 to 650 degrees centigrade in the presence of oxygen PCBs may form polychlorinated dibenzofurans?

A That is my understanding under the right conditions of oxygen amount.

Q It is also true, sir, is it not, that PCBs in electrical equipment have been reported to produce chlorinated dioxins and furans during fire situations that the combustion products may result -- I'm sorry. These combustion products may result all or in part from non-PCBs components or the dielectric fluids or other combustible materials?

A Yes. The reference to the other materials in there

1 in addition to the PCBs.

2 Q Right. An appropriate way to handle spills or
3 leaks of PCBs would be -- one of the things
4 would be to have nonessential personnel leave the
5 area?

6 A Depending on the degree of the spill, the size of
7 the spill, and the area it covered, yes, sir.

8 Q And the area should be adequately ventilated?

9 A Certainly.

10 Q Personnel entering the spill or leak area should
11 be furnished with appropriate protective
12 equipment?

13 A Again, depending on the size, yes.

14 Q And all wastes and residues containing PCBs; that
15 is, wiping clothes, absorbent material used in
16 disposal, protective gloves, clothing, et cetera,
17 should be collected, placed in proper containers,
18 marked, and disposed in a manner described by
19 appropriate regulations?

20 A That is correct.

21 Q None of the information regarding how to handle
22 spills appropriately as we just discussed is on the
23 312 label, is it?

24 A No.

25 Q With regards to the letters -- And there's a series

1 of letters that you and Mr. Running and I have been
2 talking about over a number of days. Did I
3 understand correctly that you personally did not
4 gather the mailing labels and the letters that were
5 presented here during the testimony?

6 A Help me with the word "gather." At what time
7 and --

8 Q When the letters were first gathered for the
9 attorneys' use, did you gather them?

10 A No.

11 Q And did you gather the mailing labels?

12 A No.

13 Q Do you know who did?

14 A I do not.

15 Q Were you here when Mike Stroh testified about
16 correspondence he received from Mr. Craddock?

17 A I was not.

18 Q Mr. Craddock in correspondence to us had indicated
19 that a letter of February 27 of 1970 was sent. Do
20 you know anything about that?

21 A I remember a February, 1970, letter. The 27th I
22 don't recall that as relating to Pydrauls.

23 Q And then at least in the evidence that's in the
24 record from Mr. Stroh and the correspondence from
25 Mr. Craddock, there was an August 27th letter of

1 1970 that you folks I believe discussed in this
2 case. Mr. Craddock said it was not sent or at least
3 did not tell us it was sent. Do you know anything
4 about that?

5 MR. RUNNING: I object. The question is
6 compound, saying either it was sent or not mentioned
7 in the letter.

8 THE COURT: It is.

9 MR. CARLSON: It is.

10 Q Let me ask you this. Do you know what steps Mr.
11 Craddock took in order to write to Mike Stroh
12 telling Mr. Stroh what letters your company
13 sent?

14 A Mr. Craddock looked in his immediate personal files
15 for the type of letter that was being sent out at
16 that time, and those copies that he found he
17 forwarded to Mr. Stroh.

18 Q Was there a binder of letters set up or -- I'm going
19 to show you a copy -- on the bottom of some of
20 these letters there's a page number. For example,
21 you'll see page six referencing a January 31st of
22 '72 letter, and a page five on another one. Do you
23 know what those pages numbers reference?

24 A I do not.

25 Q Do you know how the letters that Mr. Running and you

1 discussed in your direct testimony were collected
2 for this litigation?

3 A No, I don't.

4 Q I'd like to switch subjects again for a second if we
5 could. Remember the procedures we discussed with
6 regards to the therminol customers and the telephone
7 calls and procedures that were used to insure that
8 they would drain their machines?

9 A I do.

10 Q Those kinds of procedures could also have been used
11 for your die cast companies customers if your
12 company had so chosen, isn't that true?

13 A Certainly. But the different kind of problem --

14 Q That's -- That's --

15 A Yes.

16 Q With regards to some of the large companies like
17 General Motors, your company did have direct
18 personal contact which resulted in the companies
19 draining their die cast machines, isn't that also
20 true?

21 A The personal contact existed for all customers. The
22 draining as it related to the example you gave was
23 a decision of that management. I don't know that
24 the contact with Monsanto was the key reason for
25 that decision.

1 Q It certainly played a role in that decision, didn't
2 it?

3 A We offered alternative materials, yes, sir.

4 Q And you explained to General Motors the problems
5 with the 312 hydraulic fluid having some of the
6 5 chlorinated PCBs in it, isn't that also true?

7 A That's part of the dialogue, yes.

8 Q I didn't check. I'm hopeful that the material that
9 is on your right that was there yesterday is still
10 there. And with any luck at all is Exhibit 461 is
11 at the top?

12 A 461?

13 Q Yes.

14 A It's the third one down. I found it.

15 Q I think you can safely take the other two off the
16 top and set them aside for the time being.

17 A All right.

18 Q You'll recognize this as a -- I'm sorry. You'll
19 recognize this a February 6th, 1970, memorandum?

20 A That's what it is.

21 Q And it references the pollution letter?

22 A That's the title of this memorandum.

23 Q And if we go to the bottom -- Strike that.

24 MR. CARLSON: I would offer Exhibit 461
25 into evidence, Your Honor. It's one of the

documents produced by Monsanto.

MR. RUNNING: No objection.

THE COURT: So received.

(Exhibit No. 461, previously marked for identification, was received into evidence.)

MR. CARLSON:

Q If you look to the bottom of that particular letter on the last paragraph -- I think what I'd like to do is direct your attention about a quarter of the way down the paragraph to the right-hand side beginning with the word "we." It continues, "We realize." Do you see where I'm referencing?

A I do believe I do, yes.

Q Would you be kind enough to read that for us?

A "We realize that most of your contacts will not receive the letter. This is both good and bad. Unfortunately, we have no alternative. A complete list will be retained of all companies receiving the letter. And should you decide you want to send this letter to certain specific people, you must send us a list of names. We would prefer you not send additional copies. One is enough."

Q Now, this is a memorandum that was going to what group of people?

A Since I haven't seen this letter before, let me read

1 it a bit.

2 Q I'm sorry. Sure.

3 MR. RUNNING: Just for clarification, I
4 think we should read the first sentence of the
5 second paragraph, "Attached is a copy of our letter
6 on Aroclors and PCBs which will be sent to all
7 therminol and industrial Aroclor customers." This
8 isn't related to Pydrauls.

9 MR. CARLSON: I don't have any problem
10 with that. That's -- Now he's read it to the
11 jury.

12 THE COURT: Do we have a question out or
13 not?

14 MR. CARLSON: No. He wanted to look at
15 the letter.

16 THE WITNESS: I've scanned it.

17 MR. CARLSON:

18 Q Mr. Running makes a point. I suppose we ought to
19 discuss that. This particular memorandum has to do
20 with a letter that was apparently developed for the
21 therminol and industrial Aroclor customers?

22 A It does.

23 Q And with regards to the information conveyed, it was
24 found that Monsanto -- that the telephone calls were
25 necessary to the customers in order to motivate

1 them to action because your company recognized that
2 the letter itself may not reach the contacts that
3 you wanted them to have?

4 A Well, that's what the author of this document
5 believed; and he was passing it onto his team of
6 salesmen.

7 Q And then your company did follow up and use the
8 telephone calls to those customers to make
9 sure that they did receive the appropriate
10 information?

11 A They did.

12 Q Do you have Exhibit 533 to your right?

13 A I do.

14 MR. CARLSON: Your Honor, Exhibit 533 is a
15 Monsanto -- a copy of a Monsanto supplemental
16 discovery responses made in agreement with the
17 plaintiffs. That's us.

18 THE COURT: Interrogatory number or --

19 MR. CARLSON: Interrogatory, that's
20 correct.

21 THE COURT: The jury may recall a few
22 weeks ago I mentioned there are a number of
23 discovery devices that are utilized by attorneys in
24 civil litigation. They take many forms. The one
25 you heard most frequently here is depositions.

1 But another one is interrogatories, and
2 that is where written questions are sent out and
3 then the other side -- whoever they are directed to,
4 and they can only be done with parties, not
5 witnesses -- will answer those questions in writing
6 under oath.

7 Attorneys or parties I should say also
8 have a duty under the rules of civil litigation to
9 what's known as seasonably amend any responses which
10 the answer -- or believes needs amplification or
11 change based on the original answer. I think what
12 we are talking about now is an additional answer to
13 some interrogatory. Is that correct?

14 MR. CARLSON: That's right. It was an
15 agreement worked out between us, and they gave us
16 some additional information.

17 THE COURT: Okay. Just so the jury knows
18 what this is all about.

19 MR. CARLSON:

20 Q Mr. Papageorge, if we look at the first question
21 from your first set of interrogatories, it asks,
22 "Please give the name -- I'm sorry. "Please give
23 the trade name of each product either manufactured,
24 formulated, or sold by the defendant Monsanto
25 Company between the years 1955 and 1970 which

1 contained as an intentional component
2 polychlorinated biphenyls."

3 The response was, "See Schedule A." Do
4 you see that?

5 A I do.

6 Q And then following that is, "For each product listed
7 in response to the preceding question, please state
8 the date the defendant last sold such products." Do
9 you see that?

10 A I do.

11 Q In reference to Exhibit A again?

12 A It does.

13 Q Would you be kind enough to turn to schedule A,
14 page two. And about a third of the way down, would
15 you be kind enough to look at the listing for the
16 Pydraul 312 and tell us the month and year it was
17 last sold?

18 A Pydraul 312, July 1974.

19 Q Thank you. That's all we have on that. Thank you.
20 Would you be kind enough to turn to the next exhibit
21 to your right hopefully 666?

22 A I have it.

23 Q And Exhibit 666 is a portion of a memorandum with a
24 handwritten date at the top of May 22, 1969?

25 A That's what it shows.

1 MR. McDEVITT: Don, what is this?

2 MR. CARLSON: Oh, I'm sorry. Your Honor,
3 we would offer Exhibit 666 into evidence as one of
4 the documents produced by Monsanto.

5 MR. RUNNING: No objection.

6 THE COURT: So received.

7 (Exhibit No. 666, previously marked for
8 identification, was received into evidence.)

9 MR. CARLSON:

10 Q On the bottom of this memorandum there's a resolved
11 section, is there not?

12 A Yes.

13 Q Would you read that for us?

14 A "Resolve, that the expenditures of \$1,100,000 for
15 the expansion of the solid Aroclor facilities at the
16 Anniston, Alabama, plant is hereby approved."

17 Q And was that work done?

18 A Yes, sir.

19 Q In the middle of the upper paragraph there's
20 reference to the expansion. Do you see what I'm
21 making reference to?

22 A I believe I do.

23 Q "This expansion will enable the company to supply
24 into the mid-1970's all forecasted U.S. chlorinated
25 polyphenyl needs and also to provide a significant

1 share of the ex-USA demands."

2 A That's what it states.

3 Q Did your company then manufacture more PCBs when
4 that expansion was completed?

5 A No, sir. This refers to terphenyls. Polyphenyls is
6 the terphenyls.

7 Q With regards to the terphenyls, that was a product
8 that your company discontinued manufacturing in
9 1972?

10 A I don't recall the date when they discontinued the
11 terphenyl manufacture.

12 Q The terphenyls were the products that were used as
13 the stopgap measure while you worked on the
14 phosphate ester that could be put on top of the
15 PCBs?

16 A Yes, sir.

17 Q Would you be kind enough -- I think you can go over
18 667 and go down two more down to 705.

19 A I have it.

20 MR. CARLSON: And Exhibit 705 our records
21 would indicate, Your Honor, has been received in
22 evidence.

23 THE COURT: Is that a Monsanto
24 document?

25 MR. CARLSON: Pardon me?

1 THE COURT: Is it a Monsanto document?

2 MR. CARLSON: Yes.

3 THE COURT: It's received now if it wasn't
4 received earlier.

5 (Exhibit No. 705, previously marked for
6 identification, was received into evidence.)

7 MR. CARLSON:

8 Q Would you be kind enough to turn to page two of
9 the document -- First of all, this is a letter to
10 Mr. Jenkins of Sprague Electric from July 8th,
11 1970?

12 A It is.

13 Q And under the section for Disposal, do you see
14 approximately a third of the way down -- Well, would
15 you just read the disposal section from, "The
16 preferred method," down through where it references
17 furans and dioxins.

18 A "The preferred method for disposal is high
19 temperature incineration. I suspect there are
20 several commercial burners on the market which will
21 perform well. I personally witnessed burning tests
22 at the John Zink Company's unit in Tulsa, Oklahoma.

23 "Temperatures must exceed 1,600 degrees F
24 to assure that complete destruction is achieved.
25 Lower temperatures would only vaporize the Aroclors

1 and create atmospheric pollution or worse yet would
2 form by partial oxidation materials which could be
3 highly toxic (e.g. furans and dioxins)."

4 Q This is a letter that you wrote, sir?

5 A I did.

6 Q Thank you. Do you have Exhibit 863 there?

7 A I do.

8 Q Do you recognize that as a copy of a Monsanto annual
9 report?

10 A It appears to be a copy of an annual report, yes,
11 sir.

12 Q Would you read to me the slogan on the cover?

13 A Are you talking about the sentence at the
14 bottom?

15 Q Yes.

16 A "The strategy is working."

17 Q Thank you. Let me go on further. I think you have
18 Exhibit 2027?

19 A I do.

20 Q Exhibit 2027 is a memorandum of October 26 of
21 1970?

22 A It is.

23 Q And this is offered by yourself or authorized by
24 yourself?

25 A Yes.

1 MR. CARLSON: We would offer Exhibit 2027
2 into evidence, Your Honor.

3 MR. RUNNING: No objection.

4 THE COURT: So received.

5 (Exhibit No. 2027, previously marked for
6 identification, was received into evidence.)

7 MR. CARLSON:

8 Q Would be kind enough to read to us -- it's fairly
9 short -- the first paragraph.

10 A "Recent data from Dr. J. P. Mieure's work indicates
11 the presence of naphthalene and biphenyl and
12 anthracene or phenanthrene and dibenzofuran in
13 Santowax R used in the manufacturer of Aroclors."

14 Q And that's where the dibenzofurans come from that
15 are a contaminant in the Aroclors?

16 A That has not been established. It could be a
17 source.

18 Q This is a memorandum that you wrote in October of
19 1970?

20 A Yes, sir.

21 Q Would you be kind enough now to go to exhibit --
22 Defendants Exhibit 1098. I don't know if you have
23 that there or not.

24 A I found it.

25 Q Okay. Thank you. The exhibit is the prepared

1 material you had for a meeting of an ANSI committee,
2 is that true?

3 A For Exhibit 1098?

4 Q Yes.

5 A No, sir.

6 Q Did you give that same information to an ANSI
7 committee?

8 A No, sir.

9 Q Do you have Exhibit 864 there?

10 A I have it.

11 MR. CARLSON: Your Honor, Defendant's
12 Exhibit -- I'm sorry Plaintiffs 864 is a document
13 furnished to us by Monsanto during the course of
14 this matter. We would offer it into evidence.

15 MR. RUNNING: That's already in.

16 MR. CARLSON: You're right. Is it?
17 Okay. Thank you.

18 Q Would you be kind enough to turn to the page of the
19 document which is STR No. 22252?

20 A I have it.

21 Q And while I'm getting my copy of it, would you be
22 kind enough to tell us what the letters A-N-S-I
23 stand for?

24 A The American National Standards Institute.

25 Q And what is that?

1 A That is an industry organization which supports
2 studies made by different groups to establish
3 standards used by industries throughout the
4 United States.

5 Q In this particular case, it was a group that was put
6 together for dealing with PCBs?

7 A Dealing with PCBs and electrical equipment.

8 Q Mr. Running asked you some questions about
9 information that was provided. Was there an entire
10 industry standards committee set up to deal with the
11 PCBs that Monsanto made?

12 A Well, the only committees set up under this
13 organization had to do with the use in electrical
14 equipment.

15 Q Of the Monsanto PCBs?

16 A Well, of PCBs irrespective of the company that made
17 them.

18 Q If we turn to page seven, is this part of the
19 presentation you made to this ANSI committee?

20 A It is.

21 Q And first of all, there was reference in your
22 presentation earlier to a Michigan fire. That was a
23 fire that occurred where? Do you remember what
24 plant that was?

25 A As I understood, it was a General Motors Oldsmobile

1 plant.

2 Q Do you remember the year?

3 A In the 50s is as close as I come to it.

4 Q And that was a fire that developed when they were
5 using petroleum; that is what we would think of as
6 an oil hydraulic fluid?

7 A A flammable fluid, yes, sir.

8 Q It wasn't a phosphate ester fluid?

9 A No.

10 Q It wasn't a water glycol?

11 A No.

12 Q Now, with regards to this particular information
13 that you presented, when you talk about, "Many of
14 these connections leak, hoses burst, and the
15 tendency is to keep producing by adding more fluid,"
16 is that information that you understood to be true
17 in the die cast industry?

18 A In some places it was -- Yeah, it did apply.

19 Q In some cases if a leak was not too bad, they would
20 run the machine until the end of the shift until
21 maintenance came in and fixed it?

22 A Well, that depended on where the fluid was going.

23 Q Sure.

24 A If they had a collection system, they might run
25 longer knowing that they'll eventually get around to

1 reusing that fluid.

2 Q Then when you go on and say, "It is conceivable that
3 many of these hydraulic fluids ended up in the
4 sewer," that's because your company recognized that
5 the fluid; that is hydraulic fluid, could end up in
6 the same place the water was going?

7 A Yes. We described that if you recall the other day
8 as the clean up of the stains on the work floor and
9 so on.

10 Q And then you go on to say, "I do not intend to
11 criticize the customers of our products." You said
12 that for a particular reason, didn't you?

13 A Well, I must have.

14 Q Sure. The reason was that from the knowledge that
15 we -- that was Monsanto -- had at that time of the
16 material the practice was considered acceptable,
17 correct?

18 A Yes.

19 Q And that's what you told an organization of people
20 that were concerned about PCBs in 1971?

21 A Yes, sir.

22 Q Do you have -- I'm ahead of myself. Excuse
23 me. Well, we can pass that. Do you have
24 Defendant's Exhibit 1124? It would be three or four
25 down to your right in the set. It's a list of

1 companies that sent material back for incineration.

2 A I found it.

3 Q If we went to --

4 MR. McDEVITT: What is it, Don?

5 MR. CARLSON: I'm sorry.

6 Q If we turn to the list of companies beginning on the
7 first page, apparently there were returns of fluid
8 in 1971?

9 A Yes, sir.

10 Q And how did companies like General Motors or the
11 Chevrolet Division know about the incineration
12 service available in 1971?

13 A Through discussions with Monsanto's field salesmen
14 primarily.

15 Q Now, I don't by any stretch of the imagination claim
16 to know all the companies that are in here; and I
17 don't suspect you do either.

18 But what I would like you to do is open to
19 any page. Go about a quarter of the way in and just
20 turn to a page and tell me what page you're on, the
21 STR number.

22 A Any page?

23 THE COURT: Any page.

24 THE WITNESS: STR 012824.

25 MR. CARLSON:

1 Q Okay. On this particular page can you identify any
2 small die cast companies?

3 MR. RUNNING: I'll object, Your Honor.
4 There's been no foundation laid that this witness is
5 knowledgeable about the identities of these
6 companies.

7 There are a lot of companies on this
8 vendor list that could be small die casting
9 companies, and to suggest he ought to be able to
10 identify them is improper.

11 THE COURT: I'm sure Mr. Papageorge is
12 more than capable of telling us that. In fact, the
13 premise to the question was, I'm sure you don't
14 recognize all of these companies any more than I
15 do.

16 MR. RUNNING: Well, then I object to the
17 question. What's the point? Unless the title of
18 the company happens to say "die casting," this
19 witness isn't going to be able to pick out whether
20 they were a die caster --

21 THE COURT: I'm sure he's more than
22 capable of telling you that and telling us
23 that. We are not going to have him go through every
24 one of the companies in this document.

25 MR. CARLSON: That's right.

1 THE COURT: We'd be here until Thursday on
2 that issue alone.

3 MR. CARLSON:

4 Q Is there any company on there you recognize as being
5 a small die cast company?

6 A Most of these companies on this list I'm not
7 familiar with the kind of activity they are involved
8 with. I do not see any reference to die casting. I
9 do not know.

10 Q Do you see on the bottom Reynolds Metals?

11 A I do see that.

12 Q In the middle, Northern States Power in
13 Minneapolis?

14 A I see that also. That could be a transformer.

15 Q Sure. As a matter of fact, I think you'll see going
16 through here many of the fluid returns were from
17 electrical PCB users, isn't that true?

18 A I wouldn't say many. I see three or four.

19 Q On that particular page?

20 A Yes.

21 Q Right. And I don't believe we want to go through
22 the list entirely. If we went -- Pick another page.
23 Just go in and pick a page. We'll do it one more
24 time.

25 A Let's go to STR 012830.

1 Q Do you see any companies there you would identify as
2 a small die cast company?

3 A Again, my answer is like the previous. I don't
4 recognize some of those names. So I just don't know
5 what activity they are involved in.

6 Q We do see large companies at the top like DuPont?

7 A Oh, yes, DuPont.

8 Q A little further down Eastman Kodak?

9 A Yes.

10 Q More Dupont?

11 A Yes.

12 Q Florida Power and Light?

13 A Yes.

14 Q Mr. Papageorge, do you have any information that you
15 can share with us that small die cast companies were
16 returning PCB hydraulic fluid to your incineration
17 plant?

18 A I don't have any personally.

19 Q Thank you. Defendant's Exhibit 1119 is to your
20 right, probably up on the top of the stack. I think
21 just to save time because I don't want to belabor
22 the point -- Your company did do terphenyl
23 biodegradable studies almost at the same time the
24 product was being taken off the market for the
25 Pydraul 312 use?

1 A Would you --

2 MR. RUNNING: Objection. The question is
3 ambiguous, it's not clear as to which products he's
4 referring to taking off the market.

5 THE COURT: That's the proper --
6 Originally he said terphenyls, then 312.

7 MR. CARLSON: I should have said
8 312-A.

9 Q Biodegradation studies of terphenyls -- the results
10 were being obtained at about the same time that the
11 terphenyl 312-A product was being taken off the
12 market?

13 A Yes. The timing was -- Yes.

14 Q You're going to have to bear with me a second. I
15 think one of my documents is in a box. We won't
16 have to ask you questions about those documents
17 right now.

18 MR. RUNNING: Your Honor, just seeing this
19 document, I object to any questions on decisions
20 made in 1976 concerning the prices of dielectric
21 fluids. It's totally irrelevant. Referring to
22 Exhibit 2033.

23 THE COURT: Do you need to go in chambers
24 or not?

25 MR. CARLSON: I can demonstrate relevance,

1 but I don't know if you want to do that in front of
2 the jury.

3 MR. RUNNING: Let's do it in chambers.

4 (Whereupon, the following proceedings
5 were held outside the presence of the jury in
6 chambers.)

7 THE COURT: The record should reflect the
8 Court is in chambers relative to the objection made
9 by Mr. Running. We'll hear from Mr. Running first
10 and then Mr. Carlson.

11 MR. RUNNING: Your Honor, my objection
12 concerning Exhibit 2033 is that Mr. Carlson is
13 apparently now going to go into decisions that were
14 made about the pricing of dielectric fluids in the
15 last year in which Monsanto made dielectric fluids.

16 There was a decision made to increase the
17 prices of the dielectric fluids at least according
18 to this document to help recover the cost of
19 shutting down facilities such as incinerators and
20 other facilities that were dedicated to Aroclor
21 production.

22 This has nothing to do with any issue
23 relevant to this case. If Mr. Carlson wants to
24 represent some plaintiffs some day who claims he
25 paid too much for dielectric fluids, that's one

1 thing. I can't imagine what his cause of action
2 would be. He'd be entitled to consider whatever
3 rights they may have.

4 But Stroh wasn't effected one whit by
5 pricing decisions for dielectric fluids and
6 particularly 1976 when we hadn't been selling PCB
7 based hydraulic fluids for five years. There's no
8 possible relevance. All this is is an attempt, an
9 ad hominem attempt to show Monsanto was gouging or
10 charging too much to a set of customers who aren't
11 in this courtroom and have no rights at stake in
12 this courtroom.

13 MR. CARLSON: The only problem with all of
14 this is that Mr. Running in examining Mr. Papageorge
15 made it appear as though Monsanto was losing money
16 in the incineration process thereby giving the
17 impression that Monsanto was doing something to its
18 economic disadvantage.

19 The fact of the matter was that Monsanto
20 had a plan and it will show up from the earlier
21 pricing documents that I intend to reference of 1972
22 that they would recoup all of this. It certainly
23 has a bearing on whether or not Monsanto, in fact,
24 was losing money as a result of this apparent
25 demonstration of responsible behavior.

1 It certainly was not to the economic
2 disinterest of the company to do so. They had ways
3 to recoup all of that money. And I think the jury
4 should be aware of that.

5 MR. RUNNING: Your Honor, on that point
6 Mr. Papageorge testified to two things: to the
7 price per pound for the incineration service, which
8 in '73 was five cents a pound, but by 1976 it was
9 apparently eight cents a pound; and to the fact that
10 fuel oil prices kept increasing during the period so
11 that Monsanto didn't make money on the five cents a
12 pound figure.

13 Now, Mr. Carlson is now getting into price
14 decisions that were made in part because of a
15 recognition of the fact that when you decommission
16 an incinerator their capital costs incur.

17 If we are going to get into a discussion
18 about whether or not Monsanto made money on
19 decommissioning its incinerator in 1977, we are
20 getting way far afield. This document has nothing
21 to do with whether or not fuel oil costs will exceed
22 the five cents on these prices per pound which is
23 all Mr. Papageorge was referring to.

24 So this is a tangent that has no relevance
25 to this case at all.

1 MR. CARLSON: The Court should be aware
2 that the document says that pricing objectives were
3 to achieve the historic high profit market
4 referencing a particular amount of \$4 million and
5 recover the cost of going out of the PCB business.

6 The jury has the impression right now that
7 Monsanto is losing money on this process, and that's
8 simply not true. This is the only way that we can
9 present this information to the jury.

10 MR. RUNNING: What this refers to is a
11 product called MCS 1238, which is a research
12 product. And also on this page Aroclor 1016, which
13 is a distilled Aroclor fluid never used for
14 hydraulic fluid purposes. This is nothing to do --
15 The quote you just read has nothing to do with
16 decommissioning the incinerator. It has nothing to
17 do with any issue relevant to this case. It has to
18 do with research for an even more fractionated
19 dielectric fluid.

20 MR. CARLSON: The pricing objective was
21 for the existing PCB product plus research
22 quantities of 1238. That's all I have.

23 MR. RUNNING: The product referred to
24 Aroclor 1016.

25 MR. CARLSON: Which is fractionated of

1 1242.

2 MR. RUNNING: It was never used for
3 hydraulic fluid purposes.

4 THE COURT: I've heard enough of your
5 arguments. I generally agree with Mr. Running that
6 this does not have a lot of relevance, but I also
7 concur with Mr. Carlson. I think the best way to
8 handle this is that you can ask him a couple of
9 questions as to whether or not they recouped their
10 losses, any losses that they may have occurred as a
11 result of offering high temperature incineration,
12 the materials returned to them by customers through
13 an increase in prices at a later date.

14 And if he says yes, that's the end of the
15 inquiry. If he says no, then you can use the
16 document to impeach him.

17 MR. CARLSON: The problem is I think he's
18 going to say, "I don't know."

19 MR. RUNNING: I think he's going to say,
20 no. There's nothing in the document to impeach.
21 I'd like Mr. Carlson to point out something that
22 does.

23 I realize the Court hasn't read the
24 document, but we are going to get into this document
25 and Mr. Carlson is going to go rummaging around

1 these other irrelevant facts. He's never going to
2 impeach the witness. There's nothing in here that
3 shows operating losses for the incinerator were
4 recouped.

5 (Whereupon, there was a change of
6 reporters.)

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1 MR. CARLSON: While we're on that same
2 subject, I think The Court should be aware I intend to
3 start out with the pricing increase they had in 1972 to
4 compensate them for the expenses they ran into with
5 PCBs, the purpose of which was to get them back to 40
6 percent gross profit. I think I'm going to be able to
7 develop that information with this witness.

8 MR. RUNNING: Well, Your Honor --

9 THE COURT: I don't disagree with the
10 impression that was probably left with the jury is the
11 same one I got.

12 MR. CARLSON: Yeah.

13 THE COURT: And that is that there was a
14 service being offered to customers to have their waste
15 oils returned, some of it was freight included, all
16 kinds of things that were being offered to certain
17 customers of Monsanto to assist those customers in their
18 disposal efforts on the PCB issue. I mean, that's the
19 impression I got from Mr. Papageorge's general testimony
20 on this incineration issue.

21 So, I don't disagree with Mr. Carlson that he can
22 ask him some questions relative to recoupment of that
23 cost that was expended by Monsanto for servicing these
24 customers.

25 Other than that, I would agree with Mr. Running,

1 that this has very little relevance at all.

2 MR. CARLSON: Okay. Thank you.

3 (Whereupon, the following was had in open
4 court in the presence of the jury.)

5 MR. CARLSON:

6 Q Mr. Papageorge, I'd like to show you what has been
7 marked as Exhibit 2034. And I would like you simply at
8 this point, sir, to familiarize yourself with the
9 document.

10 A I have reviewed it.

11 Q Is it true, sir, that your company in 1971 increased the
12 price of certain PCB fluids to cover your losses of
13 other PCB products that you were no longer
14 manufacturing?

15 A As well as other costs associated with the program, yes,
16 sir.

17 Q And these price increases were made so that your company
18 would not lose money as a result of having these
19 PCB-related expenses, correct?

20 A Yes, sir.

21 Q And that same price increase program carried through
22 into 1972 as well, did it not?

23 A Yes.

24 Q And then if we went ahead, would you be kind enough to
25 take a look at Exhibit 2033 so that you feel comfortable

1 understanding what it is.

2 THE COURT: He's not going to ask you
3 questions on all the individual pricing.

4 MR. CARLSON:

5 Q Just so you feel comfortable with what that document is.

6 A It's the first time I've seen it, so I was trying to get
7 familiar with it.

8 Q It is true, sir, is it not that in 1976 your company
9 also developed a plan for increasing the costs to your
10 customers of PCB fluids to cover the costs of the
11 incineration program that you had in place?

12 A That wasn't one of the considerations, no.

13 Q I think if you look at the bottom of the page.

14 A The increase per pound for incineration was an attempt
15 to break even for incineration. It was not reflected in
16 the price of the product sold.

17 Q But then if you look above at the pricing objective,
18 what you were seeking to do, is to continue with your
19 profit goals that had been historical profits of the
20 company?

21 MR. RUNNING: Your Honor, I renew my
22 objection. That document has nothing to do with the
23 subject Mr. Carlson is stating it does.

24 THE COURT: Well, then, the witness can so
25 state.

1 MR. CARLSON: I wasn't saying that anyway.

2 Q I am saying your company had a goal in 1976 to continue
3 the same high profits that you had had in the past?

4 A That was a goal.

5 Q And that was a goal that was accomplished by increasing
6 prices to the customer?

7 A Well, it is evident in the price increases, but there
8 were other activities to keep the costs down to help
9 achieve that goal.

10 Q Sure. Would you be kind enough to take a look at
11 Exhibit 2032. This is the last one we'll reference on
12 this subject.

13 MR. RUNNING: Your Honor, I object to the use
14 of this exhibit as being beyond The Court's ruling.
15 We're going well beyond the couple of questions The
16 Court allowed.

17 MR. CARLSON: I was going to ask him whether
18 or not --

19 MR. RUNNING: I think we've covered this
20 subject before The Court's ruling, Your Honor.

21 THE COURT: Not beyond it, but we certainly
22 covered up to it.

23 MR. CARLSON: If The Court would look on Page
24 2, Paragraph 4 of that document and see the specific
25 reference I want to make.

1 MR. RUNNING: Your Honor, this has nothing to
2 do with the consideration.

3 THE COURT: I agree with Mr. Running.

4 MR. CARLSON: Okay.

5 THE COURT: Besides the issue or the reference
6 to Paragraph 4 has already been admitted by the witness.

7 MR. CARLSON: Thank you.

8 Q Like to have you look, sir, if you would, Plaintiff's
9 Exhibit 12.

10 MR. McDEVITT: Exhibit 12?

11 MR. CARLSON: Yes.

12 MR. CARLSON:

13 Q And in doing so, Industrial Bio-Test, can you identify
14 the company for me?

15 A Industrial Bio-Test Laboratories is an independent
16 laboratory that back in the seventies and earlier was in
17 the business of providing test studies with test animals
18 on chemicals.

19 MR. RUNNING: Your Honor, may we be heard in
20 chambers?

21 (Whereupon, the following was had in chambers
22 outside the presence of the jury.)

23 THE COURT: All right. Let the record show
24 The Court is in chambers again relating to the objection
25 of the test studies on animals done by some independent

1 laboratory.

2 MR. RUNNING: Your Honor, I don't know where
3 Mr. Carlson is going with this document, but I do want
4 to raise an objection to a line of inquiry which I
5 anticipate he may be raising.

6 We do not object to questions about the IBT studies
7 that have been referred to in Mr. Papageorge's direct
8 examination, and which concern PCB fluids. Industrial
9 Bio-Test was a reputable lab independent of Monsanto,
10 they performed tests, and Mr. Carlson can conduct cross
11 examination on how those tests were performed. But
12 there is another incident involving IBT that does not
13 have anything to do with PCBs, but which has great
14 prejudicial value nonetheless, and that is on other
15 products, other than PCBs, there was some evidence of
16 wrongdoing at that laboratory, falsification of test
17 records. And people were convicted of crimes for that.
18 One or more individuals went to jail for a period of
19 time.

20 I don't want Monsanto to be smeared with that, with
21 any references to that issue, that subject, which has
22 nothing to do with PCBs, and has nothing to do with this
23 case.

24 MR. CARLSON: First of all, the particular
25 document that is involved here is a handwritten letter

1 to people at Industrial Bio-Test from someone from
2 Industrial Bio-Test regarding the Aroclor studies.

3 THE COURT: Then it's an internal memo of IBT?

4 MR. RUNNING: Yes.

5 MR. CARLSON: Yes, sir.

6 THE COURT: Apparently a copy must have been
7 given to Monsanto.

8 MR. CARLSON: No, Monsanto received a copy of
9 it when they litigated the case in Bloomington, and to
10 my knowledge that's the first time you saw it. If you
11 saw it before that, I don't know.

12 MR. RUNNING: Yes.

13 MR. CARLSON: But I do know they received a
14 copy of it, and it's as a result of that litigation we
15 asked Mr. Papageorge about this.

16 MR. RUNNING: Mr. Carlson did ask this
17 question in the videotape examination before the trial,
18 and he said he saw it for the first time in the
19 Bloomington trial.

20 MR. CARLSON: That's right.

21 MR. RUNNING: There's not going to be any
22 objection for admission of the document. What I'm
23 concerned about is where Mr. Carlson is going to go with
24 this line of inquiry. And I don't want to get one or
25 two questions out about some criminal conviction and I

1 won't have a chance to undue the damage. That's why I
2 asked for the chambers conference.

3 MR. CARLSON: Let's start with the document
4 itself. This is a document that Monsanto had during the
5 course of our litigation, and it should have been
6 produced. We agreed we wouldn't raise arguments about
7 the other documents we got from Bloomington you didn't
8 produce, and we didn't raise those, and we didn't make
9 an issue of that, and I haven't made an issue of any of
10 those documents pursuant to that understanding, and I
11 won't. But this is a document that we obtained in
12 exactly that same way.

13 Secondly, with regards to the problems that
14 Industrial Bio-Test, this document, Exhibit 12, has to
15 do with the quality of the work that was being done on
16 the Aroclor studies.

17 The next step in this progression is that the
18 person that went to jail happened to be employed by
19 Monsanto following Industrial Bio-Test, and he has given
20 a statement in the Monsanto records referable to what he
21 saw during the period of time that these kind of studies
22 were being made. And I can give The Court court a copy
23 of that you if need to look at it. It certainly has to
24 do with the credibility of the work that was being done
25 by Industrial Bio-Test for Monsanto when one of the

1 heads of the company talks about whether or not
2 information that was developed there was because it was
3 fudged or collected with carelessness or incompetence,
4 particularly the data for the supplementary study with
5 1242.

6 MR. RUNNING: Your Honor, a couple of points.
7 First of all, I don't have the discovery responses in
8 front of me, but this wasn't asked for.

9 MR. PENDERGAST: We asked for all internal
10 documents.

11 THE COURT: Let's forget about that. Let's
12 deal with the merits of issue rather than how they got
13 the document.

14 MR. RUNNING: Secondly, I don't believe we're
15 obligated to produce documents --

16 THE COURT: I said let's get to the merits.

17 MR. RUNNING: The merits, Your Honor, as I
18 said at the outset, if Mr. Carlson wants to ask
19 questions about PCB studies, I have no objection. If he
20 wants to ask about Paul Wright's review of the PCB
21 studies while he was employed at Monsanto, I have no
22 objection, but if he wants to get -- Paul Wright then
23 went to IBT, was employed by a separate company. There
24 was no affiliation between IBT and Monsanto. And Paul
25 Wright was subsequently convicted of a crime for his

1 activities at IBT on studies that did not relate to
2 PCBs. And to take a tar brush and smear Monsanto in a
3 PCB case with conduct that happened after an individual
4 left Monsanto, after this product was reformulated, and
5 concerning studies that don't have anything to do with
6 PCBs, is just grossly improper. And I think just
7 because the fellow happened to be employed by Monsanto
8 beforehand doesn't mean that Monsanto is forever held to
9 be accountable for his actions.

10 MR. CARLSON: I might be mistaken, I think he
11 was employed by Monsanto.

12 MR. RUNNING: He was hired afterwards as well,
13 but before the criminal allegations were made.

14 MR. CARLSON: Then Monsanto had him write out
15 a statement about what he saw during the period of time
16 this work was done, and some of the products involved
17 when he went to jail were Monsanto products, weren't
18 they?

19 MR. RUNNING: He was not -- no, he was not
20 convicted -- one at a time -- he was not convicted for
21 any -- and Mr. Papageorge has testified to this -- he
22 was not convicted for any improprieties regarding PCB
23 studies.

24 MR. CARLSON: Didn't say that. There were two
25 Monsanto products, however, and he has commented on what

1 he saw at the lab when he was there with regards to the
2 way these studies were being done, which is entirely
3 consistent with the guy at Industrial Bio-Test saying
4 that he is ashamed to publish that work, which isn't
5 part of this memo.

6 THE COURT: I'm sorry. Did he see this
7 so-called work while he was an employee of Monsanto?

8 MR. RUNNING: Well, I'm not sure what Don is
9 referring to now, but the answer to that as to this
10 document, no. This is an internal IBT document.

11 MR. CARLSON: What Joe said is a good idea
12 though, and let me pull out the document that Paul
13 Wright drafted at Monsanto referable to what was going
14 on at IBT.

15 IBT has done a ton of work for Monsanto. Monsanto
16 had people, a lot of people in there going through this.

17 Be that as it may, if The Court wants I'll get the
18 Paul Wright document, which, I think, is important for
19 an understanding.

20 THE COURT: If you think it is important for
21 me to look at, I'll certainly looking at it.

22 MR. RUNNING: Why don't you get it.

23 MR. McDEVITT: It's going to be another
24 exhibit.

25 MR. CARLSON: It's the next exhibit.

1 MR. RUNNING: Let's get it.

2 MR. McDEVITT: Let's get it now so we don't
3 have to do it again.

4 THE COURT: I agree.

5 (Change in reporters.)
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1 MR. CARLSON: The only -- I have
2 highlighted the parts that I thought I would be
3 making reference to.

4 MR. RUNNING: Could I see what you have
5 got?

6 MR. CARLSON: Sure.

7 MR. RUNNING: Why don't you just mark it
8 on here.

9 MR. CARLSON: This section. This
10 section.

11 MR. RUNNING: Okay. Your Honor, I don't
12 know which -- who you would like to address this
13 first.

14 THE COURT: Well, generally I agree with
15 Mr. Running. The fact that this gentleman was
16 convicted of some crime which related to something
17 totally unrelated to his studies of the products
18 being considered in this lawsuit is totally
19 irrelevant.

20 The real question I would have in my
21 mind, and why I asked the question before, is what
22 did Monsanto know back in the late '60s or early '70s
23 when these studies were being conducted on behalf of
24 Monsanto.

25 It's not a question of whether or not

1 these practices of these animal studies were shoddy,
2 not up to the normal thing that you would expect a
3 laboratory to be doing, but, rather, whether Monsanto
4 was aware or had reason to be aware of what kind of
5 activity was being done over there and whether they
6 were getting false information or incomplete
7 information or altered information. If there is
8 evidence that Monsanto, at the time in question, was
9 aware either personally -- through a member of their
10 staff being aware of that, then of course it becomes
11 relevant because that gets into the issue of what
12 they knew or should have known.

13 The reason I say this is that Mr.
14 Papageorge has continually indicated during both his
15 direct and indirect -- and cross-examination
16 testimony that they were plodding along from the time
17 they heard of the Swedish test results until such
18 time as they finally discontinued manufacture of the
19 hydraulic fluid oil which is in issue here, and that
20 they didn't inform their customers of the dangers of
21 PCBs because studies were being conducted.

22 If they were aware of something that was
23 not giving them the kinds of information that
24 somebody in Monsanto's position should have, well,
25 then that's one thing. But if they were unaware of

1 the kinds of practices that this test company was
2 utilizing, then I don't see much relevance in it at
3 all.

4 MR. RUNNING: We have no argument with
5 that.

6 MR. CARLSON: I am sorry?

7 MR. RUNNING: We have no argument with
8 that standard at all.

9 MR. CARLSON: They had to have been aware
10 by mid-October of '72 because that's when Mr. Wright
11 came back to Monsanto from IBT.

12 MR. RUNNING: Your Honor, this memo,
13 Papageorge Exhibit 18 --

14 THE COURT: But hadn't they stopped
15 selling fuel oil -- or, industrial fluids to Stroh by
16 that time?

17 MR. McDEVITT: Yes.

18 MR. RUNNING: Yes, Your Honor.

19 MR. CARLSON: Yes, that's true.

20 MR. RUNNING: That's exactly right.
21 Notwithstanding my mistake in the interrogatory,
22 that's exactly right.

23 MR. CARLSON: Apparently they were
24 selling it until '74 but --

25 MR. RUNNING: I'll give a mia culpa on

1 redirect on that, but it was a poor proofreader.
2 There is no dispute we stopped selling even the
3 PCT-based product, 312A, to Stroh or anybody else by
4 the second quarter of 1982 -- '72.

5 That's why he hit me in the side. And
6 you see why I missed the '74 date.

7 And Mr. Wright apparently came back to
8 Monsanto in mid-October, '72. But this memo is about
9 62 studies that a Dr. Fisque had identified as being
10 suspect, and this inquiry didn't come up until
11 mid-1977. In any event, we have no problems with the
12 standard the Court has articulated.

13 THE COURT: So that's why. You know, if
14 this fellow had given some information to the
15 Defendant by the time in question which would
16 invalidate the kinds of premises upon which Monsanto
17 was acting, well, then I would agree with Mr.
18 Carlson, but I don't think that's a fact.

19 MR. CARLSON: Not at this point. Let
20 me -- I guess what I would like to do, for the
21 purposes of the record, is simply ask that the
22 submission of Exhibit 12 and Exhibit 18 be as an
23 offer of proof on the question of the adequacy of the
24 work done by IBT and the credibility of the witnesses
25 on that subject.

1 What I would propose to do, then, is to
2 examine the witness on some related matters, not
3 reference these documents. If I think that there is
4 a proper foundation for the use of the documents, I
5 would let the Court know, and I'll ask that it be
6 admitted, and without making reference to the
7 contents of them, and we can look what the problem is
8 at that point.

9 It may be that I will never conclude that
10 I have laid a foundation to breach the subject again.
11 I don't know the answer to that. But I do have some
12 information I think that is germane.

13 MR. RUNNING: Well --

14 THE COURT: If you get the answers that
15 you're hoping to get out of Mr. Papageorge, yes, then
16 we will come back into chambers and discuss it.

17 MR. CARLSON: Okay.

18 MR. RUNNING: But, Your Honor, there is a
19 ruling on the standard. They have to show that
20 Monsanto knew of flaws in the IBT work before the
21 reformulation of Pydraul 312A.

22 THE COURT: Knew or should have known.

23 MR. RUNNING: Knew or should have known
24 based on some facts, yes.

25 MR. CARLSON: We are going to get into it

1 one more time, so we might as well --

2 MR. McDEVITT: Yeah.

3 THE COURT: Let me send the jury
4 upstairs.

5 MR. CARLSON: Okay.

6 (Discussion off the record.)

7 THE COURT: All right. Go ahead.

8 MR. CARLSON: We are going to get into it
9 one more time, and it has to do with the same
10 relationship between IBT and Monsanto. On one of the
11 rat studies IBT reported that it was slightly
12 tumorigenic. Monsanto came back and said, "Can't you
13 say it's a noncarcinogen?" And IBT changed their lab
14 report to read the way Monsanto asked that it read.

15 MR. RUNNING: Was this in 1975?

16 MR. CARLSON: I think that's right. My
17 belief is that there is a close relationship between
18 IBT and Monsanto that's been in existence for years,
19 and these companies were working closely, and the
20 credibility of that lab reflects on the credibility
21 of Monsanto. I want to let the Court know that
22 probably -- And I think you're probably right, it
23 will be Kelly rather than Papageorge that will get
24 into that issue, but that has been a problem with IBT
25 and Monsanto for a period of time. So --

1 MR. RUNNING: I would -- It makes sense
2 to address this now, but if you want to wait for Dr.
3 Kelly, Your Honor --

4 THE COURT: No, you can do it now, if you
5 want.

6 MR. RUNNING: This document gives an
7 example of the fallacy in Mr. Carlson's reasoning.
8 This is, I am sure, one of their favorite IBT
9 documents, and it identifies of the 62 studies that
10 Dr. Fisque had identified as being suspect. 11 were
11 Monsanto studies; meaning 51 weren't Monsanto
12 studies.

13 IBT was a recognized -- a very large,
14 independent testing lab in the 1970s. As to this
15 1975 review of the bioassays, I believe there was --
16 Dr. Kimbrough published in 1974 the first study of
17 the carcinogenicity of PCBs, I believe it was on
18 laboratory mice, and there was a rat study the next
19 year. Monsanto commissioned IBT to do an evaluation.
20 There were internal criticisms of that evaluation at
21 Monsanto.

22 We produced those records in response to
23 a discovery request. And I would submit that all of
24 these events as they happened, the starting point was
25 Kimbrough's 1974 paper, and, you know, this story

1 would go to '74, '75 -- I don't think it comes to
2 much of any conclusion that would help the Plaintiff.
3 But even if it did, I question the relevance for the
4 same reasons as the Court has articulated.

5 This product -- Even if you assume that
6 the PCT product should be lumped in with the PCB
7 product, Pydraul 312A was not sold after the second
8 quarter of 1972. And to start getting into whether
9 or not IBT performed good science or bad science in
10 reviewing rat tumors in 1975 is just totally
11 irrelevant. And whether or not there was a close
12 relationship between Monsanto and IBT in 1975 is
13 equally irrelevant. I would submit it's false. But
14 why should we get into a factual dispute over
15 something like that when it's three years after the
16 last sale of the product in question?

17 THE COURT: Well, I generally agree with
18 your viewpoint, Mr. Running. I think Mr. Carlson can
19 certainly ask Dr. Kelly if there had been a close
20 relationship between Monsanto and the IBT laboratory
21 during the '60s and early '70s. And if he says yes,
22 or something close to that, that should really end
23 the inquiry. If he says no, well then we have got a
24 different issue. Then there may be some opportunity
25 to impeach him by that no answer. And we may have to

1 come back in chambers at that point.

2 MR. RUNNING: Just so we have warning,
3 Your Honor. Because I don't want things coming out
4 about a '75 incident to impeach him about whether
5 there was a close relationship in '72 without having
6 a chance to be heard on that.

7 THE COURT: No problem. You'll get a
8 chance to be heard.

9 MR. RUNNING: Okay.

10 (Recess had.)

11 (Whereupon, the following proceedings
12 were had in the presence of the jury.)

13 MR. CARLSON: Maybe we'll be done. I
14 hope.

15 MR. CARLSON:

16 Q Mr. Papageorge, your company did a fair amount of
17 work in developing an Aroclor known as 1016?

18 A Yes, sir.

19 Q The Aroclor 1016 was basically the Aroclor 1242
20 distilled so that you wouldn't have the five-chlorine
21 PCB?

22 A That is correct.

23 Q And the effort was made to develop that Aroclor 1016
24 because of the presence of the five-chlorine PCB in
25 Aroclor 1242; wasn't it?

1 A Yes.

2 Q Do you recall, sir, that in the early 1960s the
3 question of the potential damage caused by
4 chlorinated hydrocarbons became an issue?

5 A I'm not aware of -- The early '60s?

6 Q Yes.

7 A Became an issue? I am not aware of any issue being
8 attributed to the whole family of chlorinated
9 hydrocarbons.

10 Q There were some chlorinated hydrocarbons which became
11 an issue in the early '60s; weren't there?

12 A Well, I would suggest that some of them were known to
13 have potential for causing problems even before that.

14 Q By the early '60s it was true that DDT was found in
15 the tissue of animals?

16 A I'm trying to recall the dates. Sometime in the
17 '60s. I don't know if it was early or not.

18 Q There has been reference to the book "Silent Spring"
19 as being published in 1962. Does that help to
20 refresh your recollection as to when certain things
21 were known?

22 A Yes, there were some studies indicating that, um-hum.

23 Q With regards to PCBs as your company knew it in 1971,
24 they were so thoroughly distributed throughout both
25 the animate and inanimate world that they occurred

1 virtually everywhere?

2 MR. RUNNING: I am sorry. This relates
3 to what?

4 MR. CARLSON: PCBs in 1972.

5 THE COURT: You said '71.

6 MR. CARLSON: I am sorry, '71.

7 THE WITNESS: Well, I am having trouble
8 with the expression "virtually everywhere," because
9 there were samples taken where PCBs were not
10 detected.

11 MR. CARLSON:

12 Q But they were found throughout the world?

13 A They were scattered, yes, throughout the world.

14 Q Okay. And it was likewise true that in the early
15 '60s DDT was found scattered throughout the
16 environment?

17 A Wherever it was distributed or dispersed, yes.

18 Q And PCBs in 1971 you knew were being found in fish?

19 A Yes.

20 Q Birds?

21 A Yes.

22 Q Domestic animals?

23 A Yes.

24 Q Wild animals?

25 A I don't recall a wild animal study.

1 Q You knew that it was being found in soil?

2 A Yes.

3 Q And in water?

4 A Yes.

5 Q And that was likewise true in 1962 for DDT; was it
6 not?

7 A Yes.

8 Q It was known in the early '60s that DDT was stored in
9 the fat of animals, or birds, or fish?

10 A There were reports that said that, yes.

11 Q And PCBs are stored in the fat of animals, birds,
12 fish and people?

13 A That was established much later, yes.

14 Q And the early '60s it was known that DDT was found in
15 mother's milk?

16 A I have seen reports that stated that, yes.

17 Q And in the '70s it was found that PCBs were in
18 mother's milk?

19 A Yes.

20 Q And in the early '60s DDT was found to be such that
21 the fatty storage deposits act as biological

22 magnifiers, correct?

23 A That is correct.

24 Q And that's likewise true of PCBs, isn't it, they are
25 biologically magnified?

1 A As they go up the food chain, yes, sir.

2 Q So that, for example, with regards to PCBs, if you
3 take in as little as one-tenth of a part per million
4 in the diet, you can have up to 10 or 15 parts per
5 million in the body?

6 A I don't recall that -- those numbers, but it does
7 accumulate, um-hum.

8 Q And in birds you do recall they accumulate up to
9 75,000 times the intake amount?

10 A I recall that number in terms of aquatic life. I
11 don't recall it relating to birds.

12 Q Okay. With regards to the concentrations of DDT that
13 were being found with nonoccupationally-exposed
14 people, do you recall that they were showing parts
15 of -- or, approximately 5.3 parts per million to 7.4
16 parts per million in their body?

17 A I don't remember those numbers.

18 Q You do recall that there were concentrations in the
19 parts per million being found in
20 nonoccupationally-exposed people to DDT?

21 A Again, I don't recall specific numbers.

22 Q You do recall it occurred, though?

23 A Yes.

24 Q And, likewise, with regards to DDT, one of the
25 problems of DDT that was understood in the early '60s

1 was that they got into the food chain, so that one
2 species would eat another species that had PCBs
3 (sic), and it would keep on passing up the food
4 chain?

5 A Yes.

6 Q And that's likewise true of PCBs; isn't it?

7 A There is a similarity, yes.

8 Q And it was understood in the early '60s that DDT
9 could be passed from the mother to the fetus?

10 A That I don't know.

11 Q You do know that it was passed from the mother to the
12 newborn in her milk?

13 A I have read reports to that effect, yes.

14 Q That's likewise true of PCBs?

15 A Yes.

16 Q It is true of PCBs that most of them are so stable
17 that they cannot be broken down, they do not
18 biodegrade by ordinary processes?

19 MR. RUNNING: This is all PCBs?

20 MR. CARLSON: He can answer the question
21 as he chooses.

22 THE WITNESS: You used the expression
23 "most of them"?

24 MR. CARLSON:

25 Q Yes.

1 A I would suggest that a few of them is more
2 descriptive.

3 Q Well, for everything above four they're extremely
4 stable, aren't they, four-chlorine?

5 A There are amongst the five, six, sevens, eights.

6 Q All right.

7 A Some are very stable. And some of the fives do
8 degrade. It does not mean all fives do not degrade.
9 So I think a better description is that some of the
10 higher-chlorinated do not degrade.

11 Q And many of the chlorinated hydrocarbon pesticides
12 were so stable that they did not ordinarily degrade?

13 A My experience with pesticides is very limited, and I
14 honestly don't know. I can't comment.

15 Q It was understood in the early '60s that DDT could
16 enter the food chain as the result of being in water?

17 A That's what I read.

18 Q And you knew that PCBs in the 1960s were going into
19 water?

20 A Some of them, yes.

21 Q You were -- As of '69 you still had 700 pounds a day
22 going in from one of your plants into the -- into
23 water?

24 A That is true.

25 Q And you knew that -- from the previous documents that

1 some of the PCBs would be going into sewers and
2 waterways?

3 A Some of them, yes.

4 Q Interesting -- It was found that DDT in the early
5 '60s was killing the young shrimp at the
6 parts-per-billion level? This was the early '60s;
7 wasn't it?

8 A This is the first I have heard of that.

9 Q Okay.

10 A I don't know.

11 Q You do know that the DDT -- strike that -- PCBs were
12 killing shrimp -- juvenile shrimp at the
13 parts-per-billion level?

14 A Yes.

15 Q And one of the things that was understood about the
16 DDT products and the -- Strike that.

17 One of the things that was understood in
18 the early '60s about DDT was that although there may
19 not be an acute effect, that is, if you put it on
20 your skin or got it on when you're dusting your
21 roses, or however it was being used, you may not have
22 an acute reaction to it, right?

23 A Certainly. I have seen that personally.

24 (Switch in reporters.)

25

1 Q Sure. But it was also becoming -- it was understood at
2 that time that there could be long-term effects as a
3 result of buildup in tissue of certain birds, in
4 animals?

5 A The reports indicate that, yes, sir.

6 Q It was known of DDT that one of the target organs or the
7 organs that you would see the DDT concentrated in was
8 the liver?

9 A That's one of the organs, yes, sir.

10 Q And it was known back as far as the 1930s that PCBs
11 would affect the liver?

12 A At high concentrations, yes.

13 Q So that it was known in the thirties that the PCBs would
14 be such that they would be, they would be stable enough
15 to accumulate in the liver in the 1930s?

16 A Oh, I'm not qualified to comment on their stability and
17 effect on the liver. I don't know.

18 Q It was reported in the early sixties that some
19 chlorinated hydrocarbon insecticides caused nervous
20 system disorders?

21 A I don't recall seeing that information.

22 Q Do you recall that it was found that DDTs would affect
23 the ability of pheasants to reproduce?

24 A I vaguely recall a report that described the test with
25 pheasants. I do not recall the details.

1 Q You do recall that PCBs had been found to affect the
2 ability of pheasants to reproduce?

3 A No. No. I do recall that the federal laboratories in
4 Maryland said that the effects noted were not PCB, but
5 due to DDT.

6 Q And you're aware of reproduction studies on other birds
7 showing that PCBs can affect the ability of birds to
8 reproduce?

9 A Yes.

10 Q It was being found as early as the 1950s that DDT was
11 accumulating in the parts per million ratio in people,
12 wasn't it?

13 A Not being involved with DDT, I just don't remember any
14 reference to that in the fifties. I don't know.

15 Q Would you be kind enough -- I believe that there are
16 some additional documents up there, and the first one,
17 hopefully, would be 2007.

18 A I have it.

19 Q I imagine it's been some time since you've read much
20 about DDT and concentrations and that kind of thing.

21 A That is true.

22 Q Your company did have -- Strike that -- an agricultural
23 chemical department that monitored scientific literature
24 that was applicable to agricultural products?

25 MR. RUNNING: Is this relating to DDT or does

1 this relate to DDT or products other than DDT? There's
2 been no testimony about Monsanto producing DDT.

3 MR. CARLSON: I didn't say there was. I just
4 asked a question.

5 MR. RUNNING: Object.

6 THE COURT: This is a generic question about
7 whether or not the defendant had an agricultural
8 chemical department that monitored scientific journals.

9 MR. RUNNING: Relating to all business?

10 THE COURT: Relating to anything, I assume.

11 MR. CARLSON: That's right.

12 THE WITNESS: My answer is, yes, they did.

13 MR. CARLSON:

14 Q And your company also in the -- Strike that. What is
15 the American Medical or A.M.A. Archives of Industrial
16 Health?

17 A I don't know.

18 Q Okay. Would you be kind enough just to look at 2007 and
19 tell me whether or not that refreshes your recollection
20 that DDT was being measured in people down to the low
21 parts per million?

22 THE COURT: This is in 2007?

23 MR. CARLSON: Yes.

24 THE WITNESS: Well, I see wording here that
25 indicates that.

1 MR. RUNNING: Well, I think, Your Honor, I
2 think the witness should be informed there's a
3 difference between reading a document and refreshing
4 one's recollection.

5 MR. CARLSON: I don't mind Mr. Running talking
6 to his witness out in the hallway, but I do mind him
7 doing it here.

8 MR. RUNNING: Mr. Papageorge has been asked to
9 read a lot of documents, and I want it clear when he's
10 being asked to refresh his recollection it's different
11 than reading a document.

12 MR. CARLSON: If you'd like to take your
13 witness out into the hallway and explain it to him.

14 MR. RUNNING: Well, when I want to do that,
15 Mr. Carlson, I'll ask to do that.

16 THE COURT: Fellows, that's enough. If you
17 are going to ask him to refresh his recollection, fine.
18 If you want him to read from the document, fine too.
19 Just so the witness understands.

20 MR. CARLSON: And believe me, that's all I
21 care about.

22 Q Is it true, sir, that back in the 1950s scientists had
23 the ability to measure DDT down in the low parts per
24 million level?

25 A Yes.

1 Q Okay. It was also true, was it not, sir, that in the
2 1950s scientists had the ability to feed animals diets
3 consisting of some traces -- I suppose that "traces" is
4 overly broad, so I'll rephrase the question.

5 It was true, sir, that in the 1950s scientists had
6 the ability to feed animals diets that had low parts per
7 million contamination of certain chlorinated
8 hydrocarbons to see whether or not the chlorinated
9 hydrocarbons would be passed in the milk, for example,
10 of a cow?

11 A That is true.

12 Q There were no studies done like that for PCBs prior to
13 1970, were there?

14 A Well, there were studies starting in the '68-'69
15 timeframe.

16 Q But that's work that could have been done earlier if the
17 company had so chosen?

18 A In hindsight, yes.

19 Q There's a whole group of studies on experiments that
20 were being done in the 1950s regarding the accumulation
21 of DDT in milk, and in body fat in people and
22 everything. You do recall that, don't you?

23 A I recall the general subject and the impact that was
24 being noted.

25 Q And that was occurring because it was known that the DDT

1 was in the environment?

2 A Well, sir, it's a registered product that is disbursed
3 widely. It's not an industrial chemical. It's an
4 entirely different set of circumstances.

5 Q But it's also true, sir, isn't it, that you people at
6 Monsanto knew in the 1960s that your PCB chemical was
7 also getting into the enviornment?

8 A Not to the extent that one would expect from aerial
9 spraying and dusting of crops and mosquito control and
10 so on. It's so different that the extrapolation to an
11 industrial chemical just would not have been a practical
12 kind of a line of thought.

13 Q How many billions of pounds of PCB did your company
14 make? How many billions of pounds do you think of that
15 chemical you made?

16 A I have never added up the total, no, sir.

17 Q You would agree with me is in the the billions of
18 pounds, wouldn't you?

19 A I don't know whether it reached a billion. I don't
20 know. I'd have to sit down and add it up.

21 Q And prior to 1965 the chemical was being used as an oil
22 for spraying on roads to contain dust. Your own
23 documents show that, don't they?

24 A Yes, but these billions that you say are possible --

25 Q Right.

1 A -- many of them are still in steel containers and still
2 in use, that road dusting was the rare exception. It
3 was not -- the product wasn't designed to dust roads,
4 just DDTs were designed to dust crops.

5 Q But your company knew the product was being used to dust
6 roads, amongst other things?

7 A I don't know that. I have no evidence that we knew
8 that.

9 Q We can go back to Exhibit 24, which, I think, is the
10 abatement plan on Page 7 where it references these
11 products have been used for a variety of uses as dust
12 control. Do you recall that?

13 A Yes, but you're implying this started from 1930 and on.
14 The knowledge that it was used for dusting was a
15 relatively new sort of a recent development.

16 Q I see. You knew that -- we know that it got into the
17 water of the Great Lakes?

18 A Yes.

19 Q And we know that it got into water in Europe?

20 A Certainly.

21 Q We know that it gets into cattle through the silage that
22 they eat?

23 A That's one way, yes.

24 Q So we know that we have a fairly wide-spread
25 distribution of PCBs today, don't we?

1 A Today we do. We know that, yes.

2 Q And this distribution of PCBs in the environment, if
3 Monsanto had wanted to look at the question of whether
4 or not they were going to, for example, accumulate in
5 living things, that work could have been done as early
6 as 1962, isn't that right?

7 A Are we referring to the technology availability? That's
8 right.

9 Q You could have done the experiments?

10 A I don't think we could have analyzed for it. We didn't
11 have the technology to detect it.

12 Q In the environment if you didn't have -- you may not
13 have had the technology to find it in the environment, I
14 don't know quite frankly, but let's leave that aside for
15 a second. You could have done this test, just like were
16 done with DDT in 1962, to see whether or not your PCBs
17 would get into the milk of cows?

18 A We didn't have the methodology to detect the PCBs in the
19 milk, unless it was there in the percent level, one
20 percent, and that's a lot of PCB.

21 Q How were they detecting in the parts per billion of DDT
22 in 1962?

23 A Well, they had the methodology for it.

24 Q Because they developed the methodology?

25 A Well, certainly somebody developed it, sure.

1 Q There was a driving force to develop that methodology?

2 A The driving force was primarily the registration with
3 the Department of Agriculture.

4 Q With regards to PCBs, you didn't develop that
5 methodology early on, did you?

6 A Well, early on -- what is the time frame?

7 Q Early sixties.

8 A Early sixties?

9 Q Sure.

10 A It was not developed.

11 Q You could have gone through exactly the same protocols
12 for PCB that you went, that the agricultural industry
13 went through for DDT as early as 1948, isn't that true?

14 A Oh, I don't understand it that way. In '48 there were
15 no instruments to analyze the GLC and the
16 spectrophotometry. If they did exist, they were very
17 crude instruments in '48.

18 Q Would you expect that in 1949 they could measure DDT in
19 the low parts per million level?

20 A I don't know. I don't know that much about the analysis
21 of DDT.

22 Q Do you expect Dr. Kelly would know more about that?

23 A I don't know.

24 Q You haven't talked to him about it?

25 A I don't know.

1 Q Would you expect in 1949 that there would be the ability
2 to measure down to one part per million of DDT?

3 A I don't know enough about the analysis of DDT to
4 comment. I just don't know.

5 Q If your company wanted to find out if -- Strike that.
6 There was no one attempting to find out at Monsanto
7 whether or not PCBs were getting into living things --

8 A That's true.

9 Q -- until 1969. That is true, isn't it?

10 A That is true for thousands of chemicals.

11 Q That's true for PCBs?

12 A Yes.

13 Q That's the subject of this case?

14 A Including PCB, yes, sir.

15 Q But it was also true that there was -- it was known that
16 chlorinated hydrocarbons had the potential to get into
17 living tissue, that's also true, isn't it?

18 A I wouldn't say that, no. DDT was demonstrated. I don't
19 know of any other that was demonstrated.

20 Q DDE?

21 A DDE is --

22 Q Is a derivative?

23 A -- a derivative of the DDT, yes, sir.

24 Q There's a whole list of them. They show up in one of
25 your drawings, molecular drawings in one of your

1 reports. Do you recall those dieldrin and all of those.

2 MR. RUNNING: Well, Your Honor, I object to
3 the question. We'll stipulate that that's a list of
4 pesticides, but if he's implying through the question
5 that all those pesticides were identified in the
6 sixties, he ought to ask it, not ask it separately.

7 THE COURT: I think the issue is not what you
8 just indicated, but rather whether or not there was
9 methodology available at the time PCBs were marketed to
10 so determine whether or not they bioaccumulated in the
11 environment. I think that's what he's getting around
12 to.

13 MR. CARLSON:

14 Q Dieldrin is a chlorinated hydrocarbon?

15 A Yes.

16 Q And it was studied in the fifties to see whether or not
17 it would accumulate in animals?

18 A I don't know.

19 Q Let me ask you another series of questions regarding the
20 same subject.

21 If Monsanto had wanted to determine whether or not
22 PCBs accumulated in fish swimming in water where PCBs
23 had been disbursed, that could have been done as early
24 as the 1940s. That's true, isn't it?

25 A No, it's not.

1 Q Well, if you put your fish into a body of water that is
2 contaminated with PCBs, you can then take those fish and
3 extract the livers, right?

4 A Yes.

5 Q And you can take the livers of these fish, and you can
6 do the simple chloracne test that was being done in the
7 1940s to see whether or not PCBs were present?

8 A I don't understand the reference to the chloracne test.

9 Q Well, could you take the extracts from those livers, and
10 remember how they used to put them on bunny ears to see
11 whether or not outbreak of chloracne would occur?

12 A I'm aware of the method whereby a chemical is wiped on
13 rabbit ears to see the effect. I don't know about this
14 liver extraction. I've never heard that before.

15 Q You weren't here when Dr. Peteson testified?

16 A I was not.

17 Q The fact of the matter is that prior to 1968, knowing
18 that at least in some respects your product was in the
19 environment, you had done no environmental testing?

20 A Your reference to "knowing that it was in the
21 environment" puzzles me. I don't know what you mean by
22 that.

23 Q Let me go into it just one different way.

24 In the middle 1970s, if your company was going to
25 release a new chemical for use, there was a specific

1 protocol that had to be followed for environment testing
2 before that product was released?

3 MR. RUNNING: Your Honor, I object. We've
4 been through this before. I object on grounds of
5 relevance.

6 THE COURT: You mean repetitiveness?

7 MR. RUNNING: And repetitive -- well, both.
8 I'll add that as well. This has been covered before.
9 And if he he's getting into the subject in the
10 mid-seventies, the relevance objection also.

11 THE COURT: I may be wrong, Mr. Carlson, but I
12 I think we've gone over this before.

13 MR. CARLSON: I think I probably have to
14 explain to you this last series of questions out of the
15 presence of the jury.

16 THE COURT: Okay.

17 (Whereupon, the following was had in chambers
18 outside the presence of the jury.)

19 THE COURT: Let the record reflect The Court
20 is in chambers relative to the reasons why we came in
21 here as explained by Mr. Carlson.

22 MR. CARLSON: I believe it's '75 that was the
23 date of your environmental or your testing protocol,
24 although I can stand to be corrected on that. There was
25 a remedial measure taken by this chemical company so

1 that future chemicals used would be, would go through a
2 variety of environmental tests before release. That's
3 something this witness has indicated that these folks
4 did not do with regards to this chemical. Their
5 defense, I think, being nobody else did it; we didn't
6 have to do it. But it does show that this company is
7 aware of the necessity of doing that kind of testing.

8 This is not TSCA, that was their own internal test
9 protocol that was developed. I still think that TSCA is
10 an appropriate subject, because the length between TSCA
11 and environmental testing requirements and failure of
12 the chemical industry to do that kind of work, as
13 Mr. Papageorge apparently has been telling us, there is
14 legislation passed to meet the need caused by the
15 chemical companies in the first place, including
16 Monsanto. But this particular line of questioning has
17 to do with this specific test protocol that the company
18 developed so that they would not have, so that they
19 would premarket test for environmental impact before
20 manufacturing and selling.

21 MR. RUNNING: Your Honor, there's no dispute
22 that by 1970, '71 environmental testing of this type was
23 feasible and it was done by Monsanto. And Mr. Carlson
24 has established for the Pydraul 312-A product the
25 testing was done simultaneously with the introduction of

1 the product, and once the test results came in and were
2 negative or were adverse the product was taken off the
3 market. He's established the feasibility of the
4 testing. There is no dispute about that.

5 Now, what he's trying to get at now is there is a
6 small, a short memo that begins "an environmental
7 testing program in 1975," and then there was a manual
8 set up, I believe, in the next year or two years later
9 when the TSCA regulations came into effect.

10 He can't be offering that evidence to prove
11 feasibility, because he already established it. So the
12 line of cases, including the Chart case, are not
13 applicable. That's, you know, he has gotten at the
14 subsequent action in this case, and that is the testing
15 that was done while the product was already out on the
16 market. The remoteness in time, that's obvious here.
17 We're talking about a situation where internal policies
18 were set up in 1975, three years after the PCT product
19 was taken off the market diminishes the probative value
20 of that subject to nil, particularly since it's
21 repetitive and redundant.

22 Mr. Carlson has made his point. There is no
23 dispute in '71 and '72 the testing could be done, and
24 Monsanto did it. Mr. Carlson can make his arguments, as
25 he's attempted to do, that it should have been done in

1 the sixties. Mr. Papageorge's point about feasibility
2 will have to be weighed by the jury. But to show that
3 Monsanto knew the testing could be done in '75 is just
4 totally irrelevant, because he already proved it can be
5 done earlier.

6 MR. CARLSON: Just one point.

7 MR. RUNNING: It was done earlier.

8 MR. CARLSON: Just one point. With regards to
9 terphenyl testing that was done, to my recollection that
10 was only biodegradation studies. That's what you
11 introduced into evidence.

12 MR. RUNNING: There are also chronic feeding
13 studies done for PCB and PCT. That's what you're
14 talking about.

15 MR. CARLSON: The test protocol that was
16 developed to meet these kinds of problems has to with
17 testing of fish, of birds, of the eggshell thinness, all
18 of the things that this company could have done earlier.
19 I think it certainly shows that this is the kind of
20 protocol that should be in place premarket release of
21 chemicals or for historic chemicals at some point in
22 time when you have a reason to know that there may be a
23 problem.

24 MR. RUNNING: The chronic feeding studies that
25 were started in 1968 involved three species, chickens,

1 rats and beagle dogs. Now, if you're saying in '75 we
2 expanded the program, that may be true. Maybe we
3 studied fish, but the point -- you've established the
4 point that testing was done by Monsanto beginning in
5 '68.

6 There is a dispute between Dr. Peteson and
7 Mr. Papageorge over whether in the early sixties that
8 testing was feasible. And you've exhausted that
9 subject. And to get into 1975 events when this product
10 was not on the market after the second quarter of '72 is
11 not going to shed any probative light on this case, and
12 is instead going to be prejudicial, because it's going
13 to discourage companies from taking remedial measures.
14 The Chart case addresses that concern, but overrides it,
15 because in that case, and in cases like that, there are
16 disputes about the feasibility of the remedial measures.
17 In this case there's no dispute about the remedial
18 measures. You've gotten into evidence that it was done.

19 MR. CARLSON: General Motors did not dispute
20 the feasibility of the test. As a matter of fact, the
21 Chart case is what took us beyond the realm of the
22 federal rules.

23 MR. RUNNING: In the Chart case it went beyond
24 strict liability to negligence.

25 MR. CARLSON: My point is this. There's a

1 specific protocol that's set up and looks at toxicity to
2 fish, to invertebrates in the water, to soil buildup,
3 and there's a nice little checklist. That same
4 checklist could have been used and developed, you know,
5 prior to the selling of this product to my client. And
6 I think I should be entitled to go through those items
7 with this witness to explore that information, because
8 it could have been and it wasn't. I guess that's all we
9 have to say, or at least that's all I have to say.

10 THE COURT: I agree with Mr. Carlson. I don't
11 disagree with some of the analyses made by Mr. Running
12 on the Chart v. General Motors case, but I have some
13 other problems with that case that are unrelated to the
14 issue here. But I think Mr. Running is correct in that
15 he's already shown that this testing could have been
16 done prior to the marketing of this product that was
17 sold to the plaintiff, and he's admitted, in effect,
18 both from a PCB and a PCT standpoint they didn't do it.

19 MR. RUNNING: As to the PCT products is what I
20 was referring to, Your Honor.

21 THE COURT: Well, they didn't do it for them
22 either. As soon as they got reports from the Jensen
23 thing in 1965 or '66 they started to do a few things,
24 but they went ahead and marketed the product anyway.

25 MR. RUNNING: Your Honor, it was already on

1 the market though. I mean, the question is Mr. Carlson
2 is getting into premarking testing, and our point is the
3 product had been on the market for fifteen years in 1965
4 or '67.

5 MR. CARLSON: That's true. The real question
6 is as to whether they could have developed some kind of
7 a protocol based upon the technology that was available
8 at the time in question.

9 MR. RUNNING: Your Honor, the 1975 policy is
10 not going to shed light on that issue. That's my
11 objection.

12 THE COURT: Well, that's a matter of argument.
13 Okay.

14 MR. McDEVITT: Judge, when he says "time in
15 question," what time in question are we talking about?
16 When they developed the product, because that's 1951.
17 Is that the time in question?

18 THE COURT: He already said the technology was
19 not available in those days.

20 MR. McDEVITT: I know. Okay.

21 MR. CARLSON: For some of those kinds of
22 tests.

23 MR. McDEVITT: This is premarket developing,
24 and the question has to go back to '51 then, because
25 that's when the product was first marketed.

1 MR. PENDERGAST: Well, Joe --

2 MR. McDEVITT: I just want to find out what
3 time in question we're talking about.

4 MR. CARLSON: I will develop the testimony, I
5 think, to your satisfaction. I will develop the
6 testimony to your satisfaction.

7 (Change in reporters.)
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1 (Whereupon, the following proceedings
2 were had in the presence of the jury.)

3 MR. CARLSON: We have been in there so
4 long, I sometimes forget where we are, sir. I will
5 try to -- All right.

6 MR. CARLSON:

7 Q I wanted to discuss with you the concept of whether
8 or not a protocol could have been developed sometime
9 prior to 197' -- 1965 for testing products for their
10 environmental impact, as a subject matter. Certainly
11 there have been developments in technology since 1965
12 regarding ability to analyze chemicals and those
13 kinds of things?

14 A Regarding what?

15 Q The ability to analyze the presence of chemicals and
16 that kind of information?

17 A Yes, and that's continuing, um-hum.

18 Q Right. It is true, sir, that -- Do you recall -- Do
19 you -- The company sometime back in the '30s had put
20 some PCBs on the ground, I think down in Florida; do
21 you recall that?

22 A I recall a test that was conducted. The best I
23 recall, it was in the '50s.

24 Q Okay.

25 A I don't recall the 1930s.

1 Q Do you recall that 30 years later the PCBs that were
2 on the ground were still there?

3 A I do.

4 Q The company, for products that were on the market in
5 the early 1960s, could have addressed the question of
6 whether or not there were going to be any impacts on
7 the environment as a subject; couldn't it?

8 A Do -- Did you say 1960s?

9 Q That's right. You could have addressed the question
10 of whether or not they were going to cause some
11 impact on the environment?

12 A The studies that were undertaken in the 1960s were
13 limited to animal testing.

14 Q But you could have -- you could have in the early
15 1960s done studies to see whether or not the PCBs
16 were going to have some impact on the environment to
17 which they were being discharged? That is true;
18 isn't it? Just as it was done with DDT?

19 A If you remember, I believe I discussed with you the
20 attempt by Monsanto representatives to get guidance
21 from federal agencies as to the appropriate testing.
22 The federal agencies were not able to guide Monsanto,
23 so Monsanto was forced to use the tests that were in
24 place for food additive testing to help determine and
25 understand the PCBs.

1 Q But your company didn't try to do any of this? You
2 didn't even try to do this until the late 1960s?

3 A Well, prior to that that kind of testing was not done
4 by anybody, and proposing such a test would not have
5 been realistic, nor would it have been perceived as
6 rational even. It just -- Nobody does it.

7 Q The chemical industry didn't do it, the industrial
8 chemical industry didn't do it? That's true; isn't
9 it?

10 A True.

11 Q But it was being done in the agricultural chemical
12 industry?

13 A And in the drug industry.

14 Q Right.

15 A Those two, that's it.

16 Q And you folks knew that your product to some extent
17 was getting into the environment but chose not to do
18 the same kinds of tests that were being done in the
19 agricultural industry when their products were in the
20 environment? That's also true; isn't it?

21 A The amount entering the environment was never
22 perceived to be of the magnitude that required any
23 special attention other than normally is given
24 industrial chemicals.

25 Q The perception that you had, though, was that you

1 were making millions of pounds of this stuff a year,
2 right?

3 A That's true, and they were in steel tanks.

4 Q But you knew that for replacement hydraulic fluids,
5 for example, that they were being sold as make-up
6 fluids?

7 A Well, that doesn't mean that the material that was
8 removed from the unit ended up in a river and lake.

9 Q And you knew that it was being used to manufacture
10 plasticizers that were in the environment?

11 A We're talking now about something like a paint?

12 Q That's right.

13 A Yeah. The amount considered -- was considered to be
14 something nature could cope with.

15 Q But you didn't do the studies to see if nature could
16 in fact cope?

17 A There were no studies.

18 Q That's right?

19 A I don't think there are any today.

20 MR. CARLSON: That's all I have. Thank
21 you very much.

22 THE COURT: That's the end of cross?

23 MR. CARLSON: Yes.

24 THE COURT: Just a second. All right.

25 Redirect.

REDIRECT EXAMINATION

MR. RUNNING:

Q Mr. Papageorge, you mentioned that DDT was a broadcast chemical?

A I did.

Q What does that mean again?

A I use the term "broadcast" to indicate that it's widely spread to do the job it was intended to do, and it includes such things as spraying from mosquito fogging machines that run down the neighborhood street, or the aircraft that dusts the fields with a combination of the pesticide and some other materials.

Q And the Department of Agriculture was concerned about the spraying of pesticides on crops?

A Well, they were concerned about any side effects that this use or method of dispersal might cause.

Q And dieldrin was another pesticide that was sprayed on crops and in swamps, and so on and so forth?

A That's right.

Q And there were others?

A Oh, yes, many others.

Q And did the Department of Agriculture set up requirements for the testing of those pesticides? At some point in time?

1 A There were requirements. I don't recall the series
2 of tests required, but there are some testing results
3 that are required before the product is registered.

4 Q Why didn't Monsanto just do the same kind of testing
5 for broadcast pesticides that Mr. Carlson was asking
6 about for a product such as PCB-based Pydraul that
7 was used in hydraulic lines?

8 A We never perceived that Pydrauls would be dispersed
9 the way a pesticide is. We visualized it as being in
10 systems, we visualized that some care is taken in
11 controlling it. The two are not similar in any way,
12 the two uses.

13 Q Did you ever plan to put Pydraul PCB-based hydraulic
14 fluid in airplanes and spray it on the fields?

15 A Oh, no, no.

16 Q Did you ever plan to take Pydraul PCBs-based
17 hydraulic fluid and spray it over swamps to kill
18 mosquitos?

19 A No. No.

20 Q Mr. Carlson asked you about steps that were taken to
21 persuade Therminol customers to return PCB-based heat
22 transfer fluids to Monsanto for incineration; do you
23 recall those questions?

24 A I do.

25 Q Why did Monsanto initiate the Therminol conversion

1 program, which is what it was identified as in the
2 document that Mr. Carlson showed you?

3 A It was initiated because of Monsanto's concern that
4 systems that used Therminol, of the PCB-type
5 Therminol, in food processing or in preparing such
6 things as packaging and adhesives and printing inks,
7 and the like, that would eventually come in contact
8 with food, we wanted to make certain that the entry
9 of PCBs into human and animal feed was prevented.

10 Q I just want to make sure we can visualize how these
11 heat transfer fluids were used. I am going to draw a
12 very crude diagram, Mr. Papageorge.

13 MR. CARLSON: Well, I don't think he can
14 do that without using the witness.

15 MR. RUNNING: Well, I'll try.

16 THE COURT: I see nothing wrong with the
17 lawyer making a diagram as long as the jury is well
18 aware of who is doing it.

19 MR. CARLSON: Okay.

20 MR. RUNNING: Okay. I don't think there
21 is any dispute on this.

22 MR. RUNNING:

23 Q I have drawn a tank, just a crude box, and let's
24 assume inside that there's frying oil for potato
25 chips, Mr. Papageorge.

1 A All right.

2 Q We'll just draw little waves to show the top of the
3 oil. And I am going to draw a pipe. Do you see I
4 have made a very crude attempt at a coiled pipe --

5 A I do.

6 Q -- Mr. Papageorge?

7 A I do.

8 Q Is this a crude schematic of how -- Let me just -- Do
9 you see this coiled pipe that I have drawn in red?

10 A I do.

11 Q Would heat transfer fluids play a role in such a
12 system?

13 A The hot heat transfer fluid would be inside that
14 pipe.

15 Q All right. I'll write, "Heat Transfer Fluid." Now,
16 I take it -- Where would this pipe go back? I am
17 showing the coil system where we have got the frying
18 oil, where we are going to put in the sliced potatoes
19 and turn them into potato chips. Where would --
20 Would there be some sort of heating unit away from
21 the system?

22 A Well, there would be a heating unit, but generally
23 you would have a collection tank.

24 Q Okay.

25 A And from that tank it is pumped through a heating

1 unit. The heating unit is heated either by burning
2 gas or oil.

3 Q Okay. So we have got a collection tank, and then
4 we'll just say, "Plus Heating Unit." Okay. So
5 where --

6 A All right.

7 Q -- where it is, the piping is, isn't that important.
8 Okay. Is this a crude but still accurate depiction
9 of how a heat transfer fluid might work?

10 A That's one way.

11 Q Okay. Why would -- And let's assume now that the
12 heat transfer fluid has PCBs in it.

13 A All right.

14 Q Would there be any special risks associated with PCBs
15 being in heat transfer fluids?

16 A Certainly. The coil inside the tank could spring a
17 leak, and the PCB-containing fluid could enter into
18 the frying oil, contaminating the potato chips.

19 Q Was Monsanto indifferent to this danger after the
20 problems with PCBs were identified?

21 A Certainly not.

22 Q Is this situation at all comparable to having a leak
23 on a floor of a die casting plant?

24 A Oh, no. No.

25 Q Why not? Why aren't they the same, Mr. Papageorge?

- 1 A Well, contaminating of food is certainly much
2 different in terms of risk to human beings, for
3 example, than the PCB-type oil on the floor of a
4 factory. The exposure risks are entirely different.
- 5 Q And, in fact, Monsanto called the customers who had
6 this type of PCB fluid in their systems; didn't they?
- 7 A Certainly.
- 8 Q Picked up the phone and called them?
- 9 A Yes.
- 10 Q What else did they do?
- 11 A They offered them all kinds of help in converting
12 their system.
- 13 Q Offered to incinerate?
- 14 A Incinerate.
- 15 Q Offered financial incentives to get them to do that?
- 16 A Yes.
- 17 Q And had repeated follow-up calls from field
18 representatives?
- 19 A Correct.
- 20 Q Monsanto was concerned about this problem; wasn't it?
- 21 A Very much.
- 22 Q Is the same risk as this frying oil risk posed by a
23 leak in a hydraulic -- in a hydraulic line onto a die
24 casting floor?
- 25 A Oh, no.

1 Q Did Monsanto gauge its actions appropriately,
2 correspondingly?

3 A Certainly. I think they did.

4 Q Okay. Mr. Papageorge -- You can go ahead and sit
5 down.

6 A (Witness complies.)

7 Q Mr. Papageorge, you have been with me for the past
8 week or so, and we were in a deposition together. Do
9 I ever make mistakes?

10 THE COURT: What a question.

11 MR. RUNNING:

12 Q Don't identify them all. Just say whether I make one
13 or two.

14 A We all make mistakes. We're human. I can't think of
15 a specific example.

16 Q I'll give you a specific example right now. You see
17 Plaintiff's Exhibit 533?

18 A I do.

19 Q Do you know who the damn fool was who signed this
20 thing?

21 A No, I don't.

22 Q Who signed it?

23 A Looks like you did, Mr. Running.

24 Q Okay. Did I make a mistake proofreading this page
25 that Mr. Carlson showed you? I am going to refer you

1 to the line for Pydraul 312, which says it was last
2 sold in July of 1974.

3 A That date surprised me.

4 Q When was -- When was Pydraul 312 reformulated, just
5 for the record?

6 A Early '71.

7 Q Do you recall that Mr. Carlson yesterday afternoon
8 put up on the screen the mailing labels for the first
9 two letters that were sent to Stroh, the mailing
10 label for February of 1970 and the mailing label for
11 August, 1970?

12 A I recall.

13 Q Do you recall that?

14 A I recall it.

15 Q Do you recall the mailing labels were identical?

16 A They appeared to be, um-hum.

17 Q Do you recall explaining in your direct examination
18 that there were many copies made of a whole page of
19 addresses when these mailing lists were first
20 performed, put together?

21 MR. CARLSON: Wait.

22 THE WITNESS: I did say that.

23 MR. RUNNING: Referring to Page 2686 of
24 trial testimony.

25 MR. RUNNING:

1 Q Mr. Papageorge, were you surprised to see that the
2 mailing labels were identical for the first two
3 letters sent out?

4 A No.

5 Q Why not? Why wasn't that shocking to you?

6 A Well, it took such a great effort to prepare the
7 initial mailing list, but once we had it for the
8 first mailing, it was much more efficient to use that
9 same mailing document, the record that was kept of
10 who got the mailing, and use it to prepare the next
11 set of labels for the next mailing.

12 Q You just made multiple copies of that list, and you
13 used it for the first mailing; is that right?

14 MR. CARLSON: That's objected to. It's
15 leading, Your Honor.

16 THE COURT: It is.

17 MR. RUNNING:

18 Q You made multiple copies of the list when it was
19 first prepared; is that right?

20 MR. CARLSON: Objected to as leading.

21 THE COURT: Sustained.

22 MR. RUNNING: Your Honor, this has
23 already been in the record.

24 MR. RUNNING:

25 Q How many copies did you --

1 MR. RUNNING: He already testified it was
2 just summary.

3 THE COURT: First of all --

4 MR. RUNNING: I'll rephrase the question.

5 THE COURT: -- if it's already in the
6 record, it's repetitive.

7 MR. RUNNING: Well -- There has been a
8 point made about it, and I want to resolve it.

9 MR. RUNNING:

10 Q Mr. Papageorge, how many copies were made of these
11 mailings labels when the effort went into the first
12 compilation of the mailing labels? Was it just one?

13 A It was certainly more than one. It was one intended
14 for the record, the perpetual record. There were
15 many copies made to be used by the people involved
16 with the mailing, either as a checklist or to be used
17 later to transfer onto another set of labels with the
18 adhesive for the next mailing, to prevent all that
19 typing, the repetition of all the typing.

20 Q Why didn't you just go to your word processor and
21 just type in to copy a new set of labels?

22 A I wish we had word processors then. This is --
23 Remember, we are still working out of records in shoe
24 boxes almost. It was not as sophisticated as today's
25 equipment.

1 Q There weren't too many word processors in 1970, were
2 there?

3 A No, there weren't.

4 Q There weren't any.

5 THE COURT: Are you testifying now?

6 MR. CARLSON: Are you testifying?

7 MR. RUNNING: Yeah, I'll testify to that.

8 MR. CARLSON: The way you testified about
9 some other things?

10 MR. RUNNING:

11 Q Mr. Papageorge, do you recall Mr. Carlson drawing
12 attention to the fact that the Monsanto 1988 annual
13 report is titled, "The Strategy Is Working"?

14 A I do recall that.

15 Q Does Monsanto have some secret strategy that it is
16 not telling the world about that's been working for
17 the past couple years?

18 A There are many strategies in any big corporation.

19 I --

20 Q Is it evil to have strategies?

21 A No. That's -- That's what businesses are built
22 around. Any program has a strategy that guides it,
23 not just businesses.

24 Q Is Monsanto ashamed of the strategies that are on
25 Page 5 of the annual report for 1988?

1 A Certainly not.

2 Q Does the president of Monsanto -- at least the
3 president in 1988 -- does he describe those
4 strategies in more detail on Page 5?

5 A He does.

6 Q Does he refer in the third paragraph on Page 5 to
7 "impressive productivity gains"?

8 A He does.

9 Q Is there anything wrong with productivity gains?

10 A Oh, no. It's essential.

11 Q In the next paragraph it talks about research and
12 development; doesn't it?

13 A Yes.

14 Q Anything wrong with that?

15 A Certainly not.

16 Q And then in the next paragraph it talks about
17 ventures to complement research as routes to new
18 products"; is that right?

19 A That's right.

20 Q Anything wrong with developing new products?

21 A No.

22 Q In the next paragraph it talks about developing the
23 global economy and global markets; is that right?

24 A That is right.

25 Q It specifically talks about Korea and Brazil?

1 A It does.

2 Q Anything wrong with expanding to new markets?

3 A No.

4 Q And the next paragraph reads as follows. "Earning
5 the right to operate is basic to our corporate
6 strategy. Hal Corbett points to Monsanto's
7 achievements in environmental stewardship." Is there
8 anything wrong with that, Mr. Papageorge?

9 A There is not.

10 Q Then he summarizes these strategies by saying, "They
11 represent numerous instances of thousands of Monsanto
12 employees accepting the challenge of greatness."

13 "These cases did show the strategy being
14 put into practice by Monsanto people around the
15 world, excited and determined people who will place
16 Monsanto among the handful of the world's great
17 industrial enterprises."

18 Is there anything wrong with that, Mr.
19 Papageorge?

20 A Not in my opinion, no.

21 Q Do you recall Mr. Carlson asking you a series of
22 questions with the premise being that Monsanto hadn't
23 told its Pydraul 312 customers point-blank in no
24 uncertain terms that there were PCBs in the fluid
25 prior to the time that Pydraul 312 was reformulated?

1 Do you recall that series of questions?

2 A I do.

3 Q And do you recall when I got up and got this chart?

4 A I do.

5 Q It was during those questions. When was this -- Just

6 again for the record, when was this label put on

7 Pydraul 312?

8 THE COURT: What's the number?

9 MR. RUNNING: I am sorry, Your Honor.

10 It's 1007.

11 THE WITNESS: Starting in May, 1970.

12 MR. RUNNING:

13 Q And does this chart read -- I am sorry -- this

14 sticker read, "This product contains polychlorinated

15 biphenyls which some studies have shown may be an

16 environmental contaminant"?

17 A It does.

18 Q Now, Mr. Carlson asked you why it didn't say that the

19 studies do show it's an environmental contaminant; do

20 you recall that question?

21 A I do.

22 Q What type of PCB was in Pydraul 312?

23 A Aroclor 1242.

24 Q Were there any studies in May of 1970 that showed

25 that Aroclor 1242 was causing damage to the

1 environment?

2 A No.

3 Q Now, Mr. Carlson also was making a point that -- that
4 of course this blowup wasn't actually put on the
5 Pydraul drums; do you recall that?

6 A Not the blowup, no.

7 Q And he used the black-and-white version of the label,
8 the actual size?

9 A Yes.

10 Q Can you identify Defendant's Exhibit 1007.2?

11 A This is a -- an exact label that was used starting in
12 May, 1970, of the environmental statement -- what I
13 call the environmental statement.

14 Q This is the sticker itself?

15 A It is, um-hum.

16 MR. RUNNING: I move for the admission of
17 1007.2, Your Honor.

18 MR. CARLSON: No objection.

19 THE COURT: So received.

20 MR. RUNNING: I ask that this be shown to
21 the jury.

22 THE COURT: Sure.

23 MR. RUNNING:

24 Q Did you design this sticker to be invisible so people
25 couldn't see it?

1 A No. That's why red was selected as a high-visibility
2 color.

3 Q And just a few minutes ago, I want to clear up one
4 point, Mr. Carlson asked you about some soil that had
5 PCBs in it starting in the '50s and it was looked at
6 later?

7 A Yes.

8 Q Were other chemicals in that soil? Wood
9 preservatives?

10 A Certainly, yes. Oh, many other chemicals.

11 Q So this wasn't -- Was this a planned test of how PCBs
12 react in the soil in the '50s?

13 A No. No.

14 Q Now, what significance is it that there were wood
15 preservatives in the same plot of soil that had the
16 PCBs?

17 A The test was primarily designed to evaluate chemicals
18 to be used as wood preservatives. There were posts
19 that were put into the ground along with some -- many
20 kinds of chemicals to see if these chemicals would
21 preserve the wood, the wood wouldn't rot. PCBs,
22 particularly Aroclor 1242, was used as a solvent for
23 some of these wood-treating chemicals.

24 Through the years the posts have
25 disappeared. I don't know personally whether they

1 were taken away, or whether they rotted, or what
2 happened. Nevertheless, they disappeared.

3 Samples were taken of the dirt where the
4 posts used to be, and it was determined that the
5 Aroclor 1242 still looked like Aroclor 1242. Because
6 there were no bacteria, there was no sunlight, there
7 was no running water to change anything.

8 Q Well, what effect -- What is a wood preservative
9 designed to do, Mr. Papageorge?

10 A A wood preservative is designed to in essence kill
11 off bacteria and fungus and anything that rots wood.

12 Q And an example of a wood preservative is
13 pentachlorophenol?

14 A That's a good example.

15 Q Phenol. And is creosote, such as we see on railroad
16 tracks, another?

17 A That's another example.

18 Q And chromated copper arsenate is another one?

19 A They're metal types, yes.

20 Q They all have one effect, and that is to kill
21 bacteria that could rot wood; is that right?

22 A Organisms. It covers anything that could eventually
23 rot wood.

24 Q Would the presence of the wood preservatives in the
25 soil that was -- that was studied in 1950, and then

1 later, have any impact on whether or not Aroclor 1242
2 could be degraded in that plot?

3 A Well, certainly. It sterilized the area. There was
4 no bacteria to act on it, on the Aroclor 1242.

5 Q Is that why Aroclor 1242 didn't degrade in that test
6 plot?

7 A Exactly, um-hum.

8 MR. RUNNING: I have no further
9 questions.

10 THE COURT: Just a second. Recross.

11 MR. CARLSON: Thank you. Just a few
12 things.

13 RECROSS-EXAMINATION

14 MR. CARLSON:

15 Q With regards to this PCBs on the ground back in the
16 '50s, first of all, you could have put 1242 on the
17 ground, just let it sit there, without any
18 pentachlorophenol, see what happened to it; couldn't
19 you?

20 A Well, yes, you could have, but this was a -- this is
21 a post study.

22 Q I understand that.

23 A Wood posts.

24 Q I understand that. But if you wanted to put an
25 Aroclor on the ground to see if it was going to break

1 up in sunlight, you certainly could have done that?

2 A In hindsight, yes.

3 Q Sure. And the particular sticker that you have --

4 MR. CARLSON: Does Monsanto have a
5 copy -- a real Pydraul 312 label in the courtroom?

6 MR. RUNNING: We have a blowup.

7 MR. CARLSON: Do you have a real one?

8 MR. McDEVITT: Yeah.

9 MR. CARLSON: Thank you.

10 MR. CARLSON:

11 Q Mr. McDevitt has been kind enough to share with me
12 your Exhibit 1003.1. Is that a Pydraul 312 label?

13 A Yes.

14 MR. CARLSON: You don't happen to have
15 one of those not mounted on a board, do you? One of
16 these stickers?

17 MR. McDEVITT: No.

18 MR. CARLSON:

19 Q Okay. Your Pydraul 312 label was also red?

20 A Yes.

21 (Switch in reporters.)

22

23

24

25

1 MR. CARLSON: I would offer Exhibit 1003.1
2 into evidence, Your Honor.

3 MR. RUNNING: No objection at all.

4 THE COURT: So received.

5 MR. CARLSON: If you put red and white with
6 red and white it doesn't quite stand out quite so much,
7 does it?

8 A Well, remember, this is against a black background.

9 Q Right. But if you wanted to show information that was
10 different and important you could use signal colors like
11 the black on yellow or yellow on black or some of the
12 signal oranges or those colors.

13 THE COURT: Gentlemen, come on. Let the jury
14 evaluate. I mean, both of you guys as to what the
15 effect of a color is on something. Nothing wrong with
16 the gentleman testifying as to what the background is,
17 but I think the jury is as well equipped as anyone to
18 evaluate the visibility of certain colors.

19 MR. CARLSON: Okay.

20 Q It is true, sir, if you want to draw attention to
21 something besides the label you can use a different
22 color scheme as a signal if it's important information?

23 A Well, that implies the original information on the label
24 is not important. I think they're of equal importance.
25 They're both the same color. The messages are both

1 important, one is not to be considered much more
2 important than the other.

3 Q With regards to the use of that sticker. In February of
4 1970 your company claims you sent Stroh a letter, and in
5 that letter it does not mention PCBs being used in the
6 312, correct?

7 A It says that the Aroclor 54 and 60 are not present in
8 the 312.

9 Q And it doesn't say that an Aroclor is and doesn't say
10 that a PCB is, that's also true?

11 A It doesn't do that, no.

12 Q And then you send, or then according to you, your
13 company puts some stickers on the barrels. How do these
14 barrels get into these companies? Delivered by truck
15 typically?

16 A Yes, truck deliveries on pallets, four four barrels to a
17 pallet.

18 Q And typically who is the person that has to work with
19 those barrels of oil?

20 A Well, there's the receiving dock employee, there's the
21 warehousing employee, there's the maintenance people
22 that open them to introduce them into the system.

23 Q But if you wanted to let people know about PCBs in your
24 product, what you could do is, one of the steps taken
25 with Therminol was to send a registered letter telling

1 them they had PCBs in their product, isn't that true?

2 That's what you did with Therminol, isn't it?

3 A Yes, but that doesn't go to the dock worker or the
4 maintenance man.

5 Q That's right, that goes -- if you send a registered
6 letter that shows there's something really important
7 that you want that person to know about, doesn't it?

8 A All that does is give Monsanto a record that the letter
9 was actually delivered and the delivery was
10 acknowledged.

11 Q That wasn't done -- Strike that. Would you be kind
12 enough just to review Exhibit 952 with regards to the
13 test plot?

14 A I have read it.

15 Q While we are going through that, there is reference to
16 the test plot being created in what year?

17 A '39.

18 Q Okay. And then it was looked at in what year, the last
19 time it was looked, at according to the memo?

20 A 1963.

21 Q Okay. Is that the date of the memo?

22 A The date on the memo, April 8, 1969.

23 Q And in that plot there was Aroclor 1242, 1248 and 1254?

24 A That's what it states here.

25 Q And I guess the only point, the only point I'd like to

1 make is that -- Strike that.

2 They could see the residue of the Aroclor fluids on
3 the ground by virtue of what, their color, or wetness,
4 or do you know?

5 A I can only go by my own experience.

6 Q Okay.

7 A It looks like an oily dark spot.

8 Q Okay. When -- Strike that. Would you look at the
9 second paragraph of that letter?

10 A I am.

11 Q It reads, "Aroclors 1242, 1248 and 1254 were mixed in
12 test soil (1 cubic foot per plot) at rates of
13 application and replicate spots." Then it goes on and
14 said, "In addition, there were additional plots with
15 these Aroclors mixed with penta," does it not?

16 A Yes.

17 Q That to me reads you got one test site without penta and
18 one test site with?

19 A That's right.

20 Q And the test site without penta was just straight
21 Aroclors?

22 A That's right.

23 Q And the Aroclors at the time they were observed were
24 still present without the penta acting on it?

25 MR. RUNNING: Could I see that?

1 THE WITNESS: I don't recall the report that I
2 got referring to the soils in which only the Aroclors
3 were present. I do vividly recall the report in which
4 penta had been present, and the report that the Aroclor
5 that was initially added was virtually still there.

6 MR. CARLSON:

7 Q There is reference in the second to last paragraph, "I
8 believe we should be asking Marsh to look into the
9 possibility of obtaining samples for these plots for
10 measurement of loss or degradation," correct?

11 A That is correct.

12 Q Was that done?

13 A That's what -- this report, that I recall, resulted from
14 this action.

15 Q I see. Couple of other things that were mentioned by
16 Mr. Running. With regards to the mailings, you didn't
17 go back, and I think we've established, and look at the
18 mailing labels that were used for Stroh at any time, did
19 you?

20 MR. RUNNING: Go back to the --

21 MR. CARLSON: At this company, that's right.

22 THE WITNESS: At the time they were prepared?

23 MR. CARLSON: Or afterwards?

24 MR. RUNNING: Now wait a minute. That's
25 compound.

1 MR. CARLSON: Probably is compound.

2 Q So you didn't at the time the mailings went out to
3 Stroh, or allegedly went out to Stroh, you didn't look
4 at them?

5 A I saw mailing addresses for thousands of customers. The
6 Stroh Die Casting Company label may well have been in
7 there. I don't recall it any different than I recall
8 the others.

9 Q And you don't recall specifically if they used a copy of
10 a previous mailing list on any of the other mailings or
11 not, do you?

12 MR. RUNNING: What do you mean "the other
13 mailings."

14 MR. CARLSON: Subsequent mailings.
15 Subsequent, after February 9th of 1970.

16 THE WITNESS: There were copies of the
17 original typewritten address labels used in mailings in
18 '70 and early '71.

19 MR. CARLSON:

20 Q And just bear with me a little bit. We've got four
21 mailing labels, copies from four of your letters and
22 they're exactly the same. I can put them up on the
23 screen and you can see they line up exactly.

24 We've got two other mailings that were apparently,
25 or allegedly sent to us that show a different mailing

1 label.

2 Do you have any personal explanation, that is what
3 you know personally, as to why one mailing label was
4 used at one time and allegedly another mailing label was
5 used at another time?

6 MR. RUNNING: I think you should shos him the
7 labels.

8 MR. CARLSON: Then you have to wait a second.

9 MR. RUNNING: Why don't you identify. Object.

10 MR. CARLSON: Well, all right, I'll identify
11 them.

12 Q Let's take the labels from Exhibits 1011, 1009, 489 and
13 1010. If Mr. Running would like it, we'll do it.

14 MR. RUNNING: We don't dispute they're the
15 same.

16 MR. CARLSON: Okay.

17 Q Then we have another series of mailings allegedly made
18 to us that have different mailing labels. Do you recall
19 that?

20 A Yes, I know, Uh-huh.

21 Q If they had this mailing label in use, then why did they
22 change?

23 MR. RUNNING: Why don't you show him the
24 labels?

25 MR. CARLSON: I'm going to get -- I don't --

1 If you object to the form of the question, I don't have
2 any problem with that. You want to tell me what to do,
3 I have a problem with that.

4 MR. RUNNING: I do object. They're addressed
5 to different people. Why doesn't he show him the label?
6 You can't refer in the abstract to a letter without
7 identifying it.

8 THE COURT: Well, I may agree with both of
9 you, stipulation that they are different.

10 MR. CARLSON: Okay.

11 THE COURT: But I don't disagree that the
12 witness ought to be shown the label.

13 MR. CARLSON: Right. I don't either.

14 Q Now, we have Stroh Die Casting as a label that went,
15 that allegedly was used with 1018, right?

16 A Yes.

17 Q All right. Why change labels?

18 MR. RUNNING: Why don't you -- the witness
19 ought to be given the time to see the letter rather than
20 just the label.

21 THE COURT: It's only the label we're talking
22 about.

23 MR. RUNNING: But it is attached to a letter,
24 and the question is "Why did you use a different label?"

25 THE COURT: That's the question.

1 MR. RUNNING: Okay.

2 THE COURT: He's asking him.

3 MR. RUNNING: As long as Mr. Papageorge knows
4 he can look at the letter itself.

5 THE COURT: We are not talking about the
6 letter, we're only talking about mailing labels, that's
7 all.

8 MR. CARLSON:

9 Q Do you know why they used different mailing labels for
10 that particular letter?

11 A Yes, I do.

12 Q What is that?

13 A Let me go back. When the first letter was sent out, it
14 followed an awful lot of activity getting the mailing
15 lists correct and typed. Once they were typed, that
16 typewritten mailing list was used for at least two more
17 mailings. As I remember it, it took care of the
18 mailings in 1970, and if I remember correctly, there was
19 a mailing in '71. So the labels will look the same for
20 the first few mailings.

21 Then there was a period of time during which we had
22 a chance to review our customer lists and update them,
23 and it resulted in the kind of label you have on the
24 screen now. And then there was a further review in
25 which, as I remember, we tried to get the address to

1 show a specific person where we had a name or the title
2 of a position where we thought that title was
3 appropriate at that customer's plant.

4 Q I really don't want to beat this badly, but here is
5 something that bothers me. We've got Exhibit 489, which
6 is another letter, which in your direct testimony you
7 did not say was sent to us. Okay?

8 MR. RUNNING: Can I see that that?

9 MR. CARLSON: I'm sorry.

10 Q The problem I have is, we were given Exhibit 489, a
11 letter that there was no testimony that you sent to us,
12 along with the same darn label, and if you didn't send
13 us the letter, why would that label be on there?

14 A Well, what I have here is a copy of a letter that was
15 sent to the plasticizer customers of Monsanto. I
16 thought we corrected that during deposition, that there,
17 obviously there was some mistake in this, matching up
18 the Stroh Die Casting Company to a plasticizer letter.

19 Q Except that Mr. Craddock's letter, and ultimately I'm
20 going to so ask you to assume, says we got that letter,
21 February 27th letter.

22 A Well, that mistake may apparently show itself up even in
23 Mr. Craddock's files.

24 Q And the document productions that you folks have made
25 during the course of this litigation?

1 A Apparently so, otherwise you wouldn't have this.

2 Q Mr. Running asked you some questions about Therminol and
3 showed you a little drawing about getting into food, and
4 Therminol did have a potential for getting directly into
5 food, right?

6 A Oh, yes.

7 Q And you knew in 1966 that PCBs in the water had also the
8 potential for getting into any fish that people may
9 catch and eat, which is also food, right?

10 A Well, it's a matter there of predicting the orders that
11 this would happen, and the amount that would show up in
12 the fish, and how widespread it is, and how much fish is
13 consumed. There's an awful lot of information that was
14 lacking to make a good assessment of what could happen.

15 Q But you knew it could get into food in the last
16 analysis. That's true, isn't it? PCBs from hydraulic
17 fluid, and PCBs from your plant or PCBs anywhere in the
18 waterway could get into food?

19 A I didn't know that.

20 Q You didn't?

21 A That's why we were surprised when Dr. Jensen's work was
22 published.

23 Q Well then as of 1966 you knew it?

24 A That's right.

25 MR. CARLSON: Nothing further. Thank you very

1 much.

2 THE COURT: Thank you. Mr. Papageorge.

3 Well, it's ten after. Why don't we resume at 1:45.

4 I guess you've got another personal situation with me
5 now.

6 (Whereupon, the proceedings were recessed
7 until 1:45 P.M.)
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