FILE NAME: American Cyanamid (AMCY)

DATE: 0000

DOC#: AMCY004

DOCUMENT DESCRIPTION: Plaintiff Attorney Notes

Dr. Castleman, I am trying to give you a quick overview of the Brennan case.

- p. 2-3 Description of plaintiff's employment history and asbestos exposure. When my client and his father were employed by Lederle Laboratories, Lederle was a division of American Cyanamid. The defendant in this lawsuit is Wyeth. The relevant corporate history is as follows:

> Wyeth states that in 1908, Dr. Ernest Joseph Lederle founded Lederle Antitoxin Laboratories to produce refined antitoxin for diphtheria. On January 8, 1915, the Treasury Department issued U.S. License No. 17 ("License for the Manufacture of Viruses, Serums, Toxins and Analogous Products") for the Pearl River, New York facility. On February 13, 1930, the Lederle Antitoxin Laboratories became Lederle Laboratories, Inc., a subsidiary of American Cyanamid Company ("Cyanamid"). In 1946, Lederle Laboratories was converted from a subsidiary to a division of Cyanamid. In November, 1994, American Home Products Corporation ("AHPC") acquired Cyanamid, and in March, 2002, AHPC changed its name to Wyeth. In October, 2009, Pfizer Inc. acquired Wyeth. In November, 2009, Wyeth became Wyeth LLC.

- p. 3-10 Information on Mr. William Bradley, who was the first Industrial Hygienist hired by American Cyanamid (June 1944 to March 1960). I have produced in the notebook Bradley's CV and articles he wrote before and during his employment at American Cyanamid, a number of which discuss asbestosis and the TLV for asbestos.
- p. 10-14 Dr. Hamblin, the American Cyanamid Medical Director in the 1940s, was never deposed to my knowledge. Information on Dr. Robert Clyne who was employed as a physician and/or medical director of American Cyanamid from 6/30/48 to 4/1/81.
- p. 14-16 Information on William Andresen who was employed by American Cyanamid as an Industrial Hygienist from 1947 to 1979.
- p. 16-23 I completed a deposition of Mr. Pendergrass in Brennan. He was employed as an industrial hygienist for American Cyanamid from 1957 to 1964. Interesting to note that he prepared an article about Mr. Bradley a "pioneer in the profession" (Exhibit #9). He talked about Mr. Bradley in the 1930s doing animal studies with asbestos. In April of 1964, Mr. Pendergrass, while employed by American Cyanamid went to hear Dr. Selikoff's presentation in which he linked asbestos exposure with lung cancer and mesothelioma.
- IHF Card for American Cyanamid (Exhibit #22)
  - Joined 2/9/43
  - Resigned 3/8/54
  - Dr. D. O. Hamblin, Medical Director
- National Safety Council (Exhibit #19)

Wyeth LLC	No Membership History Found	
Wyeth Pharmaceuticals Various Locations	August 1, 1999	September 30, 2010
Lederle Laboratories	No Membership History Found	
American Cyanamid	November 1, 1982	September 29, 2000

1 Campus Dr.
Parsippany, NJ 07054

- The Answers to Interrogatories of American Cyanamid from California (Exhibit #4) and the testimony of Mr. Bradley and Mr. Pendergrass grass certainly establishes that American Cyanamid was buying and selling asbestos products and/or using raw asbestos fiber.
- I have attached (Exhibit #23) a memo on NY workers compensation law and the duty of an employer. I also attached the statute.
  - 1913 – Workers comp law applies to employers that manufacture drugs and chemicals.
  - 1921 – Sanitation law – if a machine creates dust, an employer needs proper ventilation; exhaust fans.
  - 1936 – Workers comp statute expanded for "silicosis and other dust diseases".
  - 1957-58 – "Department of Labor Control of Air Contamination in Factories" reference TLV for asbestos.

Expert Report of Richard Hatfield of MAS in Which He Described Plaintiff's Work History and Asbestos Exposure

Robert Brennan was diagnosed with mesothelioma in December of 2010. He had various sources of asbestos exposure, more specifically:

- **Take home exposure to his father, George Brennan's, work clothes while his father was employed as a tinsmith by Federal Shipbuilding and American Cyanamid at Lederle Lab;**
- Completing home construction projects with his father;
- Working in a theater as a teenager;
- **Working as a granulator for American Cyanamid in the summer of 1960 at Lederle Lab; and**
- As a school teacher while working at schools where construction was in progress.

Robert Brennan lived with his parents until he got married in September of 1964. George Brennan wore street clothes to work as a tinsmith at both the shipyards (1940-1948) and at Lederle Lab (1948-1964). Mary Brennan and Robert Brennan described George's asbestos ladened work clothes as dusty. Mary would shake out her husband's asbestos ladened work clothing in the kitchen/laundry area. Robert Brennan was frequently nearby and in the same room when his mother was shaking out and laundering his father's work clothes. He shared clothing with his father. He traveled in his father's car, which once again was a source of exposure.

At Lederle Lab, George initially worked as a tinsmith and then was elevated to supervisor of the tinsmiths. There were occasions when George also supervised the insulators/pipecoverers. George's work took him throughout the plant including the boiler room, machine shop and 100 group series of buildings. In the summer of 1960, Robert, as a granulator, worked in the 100 group building, which was a six story building that was a couple football fields long. Both George and Robert labored in the same area as tradesmen, including pipecoverers, plumbers, carpenters and machinists.

In a 1967 brochure, the Lederle Lab was described as follows:

> The Laboratories which Lederle established at Pearl River served as the largest blood plasma processing plant for the Armed Services during World War II and remains the largest manufacturer of gamma globulin in the world. From these labs have come the first of the broad-spectrum antibiotics, the synthesis of folic acid which made possible the development of several compounds useful against leukemia and other forms of cancer, and sixteen years of research which contributed to the acceptance and use of an oral vaccine against all three types of paralytic polio.

George and Robert Brennan were exposed to the following asbestos-containing products while at Lederle Lab:

- Kaylo pipecovering:
- Valves with asbestos gaskets and packing:
- Pumps with asbestos gaskets, packing and motors:
- Steamtraps with asbestos gaskets:

WILLIAM BRADLEY

Source of Information is Mr. Bradley's deposition of 2/1993

William R. Bradley. (p. 21) was employed as an industrial hygienist, industrial toxicologist. (p. 22). He secured his B.A. from Cornell College in 1929 in science, biology and chemistry. Thereafter, for (2) years he attended the College of Medicine at the University of Iowa. In 1937, he secured employment with the Detroit Department of Health as an industrial hygienist (p. 32). This department in the Department of Health was started approximately a year before he joined; Dr. Carey McCord was his supervisor. Both he and Dr. McCord visited various plants in the city, primarily automotive plants (p. 35). He was asked and testified:

> Did you attend any kind of special courses or go to any association meetings during those late 1930s to try and learn what you could? The only association meetings was the -- first the Michigan Industrial Hygiene Society. And a year later, a little bit later the American Industrial Hygiene Association was formed. We attended those meetings. So, you were an early member then of the Michigan Industrial Hygiene Society? I was the founder. (p. 36) Then you joined the American Industrial Hygiene Association when it was founded a year later? I'm one of the group of founders of that association. (p. 37)

In 1942, Bradley left the Department of Health because Frank Patty contacted him (p. 38); he took a job with Fidelity and Casualty Company in New York as an industrial hygienist (p. 46). He and Frank Patty completed industrial hygiene surveys for Fidelity and Casualty in New York (pp. 46-47). Bradley was asked why he left his employment at Fidelity and he testified:

> When did you leave the Fidelity and Casualty Insurance Company? We were there about a year and a half. I was fired. The brokers told the insurance company that they were losing money and to fire Frank Patty and myself. (pp. 51-52). Frank Patty went to General Motors. (p. 53).

In 1944,Mr. Bradley secured employment at American Cyanamid. The medical director of American Cyanamid, Dr. Donald Hamblin, asked him to join American Cyanamid (p. 55). He worked for Dr. Hamblin for 16 years. (p. 59)

Bradley's Testimony Regarding His American Cyanamid Employment

When you joined American Cyanamid around the middle of 1944. What were your early assignments? My assignment was to organize the department, select people, get them approved and to maintain the health of Cyanamid employees from the standpoint of industrial hygiene. Was this a new industrial hygiene department that was being built up? Yes there had not been one before. Now, there had been a medical department. Oh, yes. (pp. 87-88)

We tried to hire four or five during the first year or so. Did you stay with the industrial hygiene department for your entire 16 or plus years with American Cyanamid? That's right I was the head of the department or head of this industrial hygiene. (p. 89)

How many plants did you have to concern yourself with when you became the first and head industrial hygienist at American Cyanamid in 1944? Every plant that was built or occupied or bought and so forth. I don't recall how many there were. There were 40 or more as I recall. (p. 90). [Dr. Castleman, there were 60 plants – see Exhibit #20]

Do you recall traveling to New Jersey to make surveys in American Cyanamid plants? I must have done that, yes. When did you come to have a staff that could go make field surveys? After the first year. Do you recall the names of any of these individuals sir? John Pendergrass. There was Bill Andresen. (p. 94)

Did you hire toxicologists in 1944? No sir. (p. 95)

Was the practice during these earlier years 1944 let's say on to 1950, was it the practice at American Cyanamid to make written reports, sir, of industrial hygiene surveys in the plants? We wrote a report on all of the studies that we made. They would have been sent first to Dr. Hamblin, and he would take the responsibility of handling it from that point on. (pp. 96-97)

You say American Cyanamid did its own exams of employees? The medical department did their own exams. (p. 99)

Do you recall, Mr. Bradley, if there was some sort of a medical monitoring program that American Cyanamid had for its employees who would be potentially exposed to toxic materials in the workplace? I didn't handle that part. That was Dr. Hamblin's work, and I – I didn't butt into his job. Do you recall, sir, whether or not there was such a program at all? I'm sure there must have been, but I don't recall. (p. 100)

When you began with American Cyanamid in 1944 and in the next year or so, did you have any kind of a laboratory available for your industrial hygiene department then? Not at the corporate center. At our research building. This is up in Connecticut. It was just the central research laboratory. So, the industrial hygiene department of American Cyanamid actually had a

laboratory staff that worked in Connecticut at the central research laboratories? Yes. (pp. 104-105)

When was it that you were President of the American Industrial Hygiene Association? I don't recall. It's got to be here someplace. (p. 130)

Asbestos:

So, specifically, sir, do you recall any efforts at American Cyanamid while you were with the company from 1944 to 1960 to recognize, evaluate or control potential asbestos exposures in American Cyanamid facilities? I don't recall any potential exposures. Is that to say, sir, that then there were no efforts made to recognize or to look for any --- (Interrupting) If it wasn't there... Sir? If it wasn't there, we didn't have to make an effort to recognize it. How --- (Interrupting) Because it wasn't present. How did you satisfy yourself, sir, that it wasn't there? We would have found out about it. By what means? By means of the medical man who was responsible at the plant and the industrial hygienists that visited the plant. What would the industrial hygienists visiting the plant have done to determine whether or not there was a potential asbestos exposure hazard there? Well, you can see asbestos. You can take it from there. We didn't have any problems. And, so... So, you are saying, sir, that if the industrial hygienist went to the plant, it would have been apparent to him if there had been asbestos insulation there, for instance, or asbestos cements being used or asbestos – (Interrupting) I said if there had been any exposure to asbestos. There is a difference. I was referring to your statement that you can see asbestos --- (Interrupting) Yes, you can see it. --- You can take it from there. You can see it. Yes, sir. So, if --- (Interrupting) It certainly would have been visible. Could you explain what you mean by that, I mean when you say you can see it. If it was there, you could see either a bag of asbestos or you could see what else might be there, where it would be used. And our people didn't report to me that they saw any. You would have expected him to have reported to you if it had been present? Yes. Do you understand that asbestos was used in American Cyanamid plants during your years with the company? I don't know. (pp. 148-150)

Plant Construction/Design:

So, it was not the practice at American Cyanamid to permit the industrial hygiene department to have any input in plant design? Yes, they did. And of course, they had – they had Bill Andresen's production, which you know about. I'm referring to his design of ventilation engineering. (p. 151) Were you consulted while an American Cyanamid industrial hygienist before the finalizing of deigns for any American Cyanamid plant? Industrial hygiene was consulted on all designs of plants after we got. We were asked to look over the plans to be sure that there would be no problem of exposure to our employees and suggest how to correct it if we could see that there would be an exposure. (p. 172) Why would it be important to have the input of an industrial hygienist for an engineering design? So they wouldn't make our employees ill. Our responsibility was to keep them well. (p. 173)

Knowledge of Plant Production:

Was Dr. Hamblin in a position to tell you in this plant or that plant we have such and such different chemicals that are of a concern to us? Well, we pretty well knew because each plant had their own list. (p. 175)

But when you joined the company, was it possible with the right expertise to safely handle all of the toxic materials that were used in the American Cyanamid plants? We set up the procedures. We had the ability and the confidence in our controlled techniques. (p. 177)

Engineering Controls:

Could you teach us, sir, about some of the techniques that were used as controls of industrial hygiene hazards for dust, for example, as of 1942. We tried to recommend enclosure and exhaust to the outdoors sufficiently so that we could capture all of the vapors from a chemical. That was the main thing for liquids. For dusts it was the same so the dusts would not get away from you. We also talked to the employees. Even to this day sometimes warnings are not given to employees who need them. That's too bad. I hate to say that, but that happens. (pp. 183-184) It's essential to their health. If they don't know that they are being exposed to something and they are, and if they don't know how to avoid it, they should be told. And warnings are very important. (p. 185) Didn't you also in your first five years in industrial hygiene learn of using wet methods to handle dusty materials in order to keep the dust levels down? Wet the floors in case dust got out on the floor? Or spray water on the – on the dusty floor before sweeping it up, for example. Oh, I see what you mean. Well, if you wanted to do that, you would sweep up mud. I mean that was a technique that was – that was known to you during that time, wasn't it? Oh yes. (pp. 188-189)

These principles that we have visited about, the isolation, substitution, containment --- (Interrupting) Oh, yes. --- ventilation --- (Interrupting) They are good principles. --- wet methods, respiratory protection, biological monitoring, these principles would have held true in 1942 just as they do today; true? Yes. There weren't known so much – so well in 42; but more substances are known about today. And these principles should be applied by industrial hygienists or could be applied to materials like asbestos dust; true? Yes, I would expect so. (p. 192)

Air Samples:

How, Mr. Bradley, would you make sure that the engineering controls you designed and recommended and which presumably were being used, how would you make sure that these controls were actually working? You would take air samples in the work environment and find out. (p. 190)

Mr. Bradley, was there a Cyanamid plant near Wayne, New Jersey? The company moved their corporate offices from 30 Rockefeller Plaza to Wayne, New Jersey. And that's the time that I left because it was a long haul from Tenafly to Wayne. Then I wanted to get some experience with other types of industry. I got out before they moved the offices there. (pp. 208-209)

Knowledge of Silica/Dust Hazards:

You knew certainly by the time you joined American Cyanamid that the inhalation of free silica dust particles in air could at some levels and after a certain amount of exposure caused lung disease; true? It's part of industrial hygiene and toxicology to know that silica – to know about silica, free silica. (pp. 282-283) Did you know as an experienced industrial hygienist and industrial toxicologist by 1944 that breathing dust – breathing air containing free silica dust could cause lung disease? Did I know? That was in the infancy of one's experience or

knowledge about the effects of silica dust on a human body. There was some conjecture what actually caused any lung disease and the nature of the lung disease. That hadn't been settled yet. If you want to just say disease, I don't know what the disease was. Usually you would say that it was cancer or something like that. Was it the case in 1944 that you as an industrial hygienist then would not recommend controls to prevent exposure to free silica dust in air in the workplace environment? What do you mean by "exposure"? I mean placing a worker in an environment where he could breathe free silica dust without --- (Interrupting) What do you mean by the limits – permissible limits of exposure? There isn't any exposure unless you have permissible limits. You don't have exposure if you just – If you walk through a plant and there is some silica there, you have to inhale it. But how much if you are talking about exposure to me? What is the limit that you are speaking of? Was there, if fact, a limit recognized for exposure to silica dust in 1944? As far as I remember the limits that were ever developed were not too definite, but they were subject to change at any minute. (pp. 284-285)

I have a document here that appears to have come from the Chemical and Engineering News in December of 1944 titled "Postwar Industrial Health." And apparently it is in part at least a report on the Industrial Hygiene Foundation's Ninth Annual Meeting in Pittsburgh at the Mellon Institute. Do you recognize the author as... Yes, I was asked to attend that. The company took membership in it for a spell. Do you recall, sir, anything about Dr. Selby, a medical consultant to General Motors Corp.? Yes, I do. Could you just tell us anything about that gentleman. Well, he was a very knowledgeable person. At the time that we felt that it was necessary to bring people interested in industrial health, the nurses and the M.D.'s and so forth, the safety men, in Detroit in that area, we wanted to form an association. And, so, we needed to send out letters and so forth. And we needed some money. None of us had any money. And, so, we didn't have any. The health department didn't furnish any. So, I went down to see Clarence Selby and told him about it. He said, "I think that's good idea. How much do you want?" I said, "$25,00." And he give it to me out of his pocket. I remember that. Otherwise it would have been delayed. We got started all right then. He got paid back at sometime. You recollect him being with G.M.? I recollect that he was – occupied an office in the G.M. building as medical director. I see. I never met him in the plant or anything. Frank Patty went with him. Then next day Frank went to work for G.M. (pp. 292-294)

Mr. Bradley, I have got one from 1947 we have labeled Plaintiffs' Exhibit 471200 CYAN. Would that be another of your articles, sir? Yes, my name is on it. What – Is there anything interesting that you can tell us about that one? We made some permanent colors for standards for use with --- I can't remember the gas that we used it with, but there weren't any permanent standards. So, we developed our own out of cellophane – colored cellophane. And that was --- You would carry those with you and read – read out your answer in the field. Who were these other gentlemen that were listed as authors along with Mr. Bradley? Let me see if I can remember. I think they were Stamford Research Laboratory people who actually did the developing of the color on the cellophane. It was a difficult thing to do to get a permanent standard color that was stable on cellophane. Was Stamford research lab the central research lab of American Cyanamid in – in the late 40s? Was that the place --- It was the East Stamford --- It was the chemical research laboratory, Stamford, Connecticut. That's the one we were speaking of yesterday I believe; is that correct? Yeah. So, Mr. Bradley, I have another article that appears to have been authored by you from 1947. We have labeled it Exhibit 471000 CYAN on the

prevention of air pollution. I guess this article would have preceded your active involvement with the New Jersey Air Pollution Commission? Well, I don't know whether it would or not. I'm thinking --- I don't know the timing here. If I may, sir, it appears it was published as part of the 35th National Safety Congress in 1947. Well, it was a – it was a talk I gave to the Safety Congress. And it think it must have been in Chicago. Yes, sir. In fact, it's listed on your C.V. as being in the transactions of the 35th Congress chemical section. (pp. 304-306)

And I guess you were the author of this article in Chemical Week in 1956? You mean the Monitor Grid? Yes, sir. As I recall some of the other fellows developed this and wrote it. And I don't know how my name got on it. I think, sir, your name is in it and not on it as the author actually. Yeah. All right. It mentions in the second paragraph that the special monitoring equipment was devised by the company's industrial hygiene department under the direction of William Bradley. Yes. I don't take credit for it. Okay. Let me substitute this copy for that. So, this involved then both air sampling and water sampling for contaminants in the air around this particular plant? It was a – an article developed to show industry of American Cyanamid's concern for not only employee health but community health and showed how to go about setting up their own air and water pollution sampling stations. It was a contribution to industry or people who didn't have any. (pp. 310-311)

I have got one article we have labeled Plaintiffs' Exhibit 590800 CYAN titled "Air Pollution Control Is Good Buisness." That must have been while I was the – the head of New Jersey's Air Pollution Control Commission. That would be promoting the commission. It shows it was published in 1959, sir. I gave Cyanamid the credit. (p. 313)

Is it accurate to state that one of your concerns as the Chief of the central industrial hygiene staff of American Cyanamid in 1951 was the elimination of industrial health hazards in that plant's – in that company's worksites? Our job was to maintain employee health. We didn't have much in the way of hazards because we had them all pretty much bottled up. If anything new came along, we developed with the engineers how to protect it engineering-wise so that there was no exposure. That's the way we did it. Yes, we were quite active in – in our concern about employee health. As a matter of fact, the President of the company wrote a letter to all of our plant managers. And they all knew that nobody could stop a process while it was ongoing, and not even the plant manager. Nobody in the plant or the plant manager. And the President wrote a letter to the plant managers saying that if Bradley sees a problem and stops the process, he's the only one that can do it in the whole company. It was quite a responsibility. That's how the company took care of our health. We stopped things before anything happened. You can see that our company was very much interested in employee health. That's why they started and had one of the biggest industrial hygiene groups in the industry. Some companies, big companies had one man; and he only sat his desk and answered letters. We got out in the field. Even in 1950; true? Right. Did I understand you that your practice was to prevent occupational disease by eliminating the exposures that could cause it in the first place? Our understanding was to prevent exposure, not occupational disease. I'm not an M.D. (pp. 318-319)

You have told I think that it was necessary to – to take sir samples to monitor for contaminants in the air in the plant. If we found contaminants. We didn't just create contaminants all day long. (p. 323)

So, you worked at American Cyanamid from June of 1944, until March of 1960; is that correct? That's right (p. 327)

Well, you were one of the first certified industrial hygienists, weren't you? Well, my number was two. (p. 333)

Say from the mid to late 40s until the mid to late 60s, would you tell us how, if at all, you used threshold limit values in doing your work as an industrial hygienist. Well, I relied on them. You can't give a report that's affirmative and that's honest unless you can develop a concentration and then apply what you find to the permissible limit when you write your report (pp. 342-343)

Tell us while you worked at American Cyanamid, what was the primary business of the company? What sort of things were they doing? Well, we were in the chemistry business primarily. We were in industrial chemicals, agricultural chemicals. We were in drugs – Lederle Laboratory. And we branched out from there later on into some articles that we could sell over the counter. And – But then Cyanamid later on figured that they weren't in that business and didn't know how to manage that business. So, they gave up on pine products and that kind of stuff. (p. 351-352)

I want to get back to talking about the businesses that American Cyanamid was in when you were there. I mentioned agricultural chemicals. Okay. And phosphate was a good one. And quite a – quite a display, just from everything they wanted to go into. When you say "agricultural chemicals," what sort of things are you talking about? Well, we are talking about insecticides and that line. Fertilizers. And then they went into the business of providing animal – animal medicines. I don't know whether that business kept on or not. It wasn't very profitable I don't think. But it was a wide variety and wide scope. They kept buying companies. And the companies they bought had their own production. And we would get into that, also, as long as Cyanamid had a man that was a Cyanamid employee. Were --- As a result of different sorts of business activities, did those difference business activities – did they confront you as an industrial hygienist with different potential hygiene problems? No, really not. Their production was rather straightforward. They handled mostly liquids. And the reaction of one liquid with another and – to develop a product. We weren't in the paint business or anything like that. We were – Liquids was our main efficiency. While you were at American Cyanamid, did American Cyanamid manufacture any asbestos products to your knowledge? No, not to my knowledge. No. I never saw a single asbestos product. (p. 353-354)

Tell us how you came to hire William Andresen. He was a chemist at Calco Chemical Division of American Cyanamid Company in Bound Brook, New Jersey. And when I would go out there, he would go along with me. And he had quite a knowledge and interest in the field of industrial hygiene. And I said, "Bill" – I said, "We are going to need you in New York. Would it be possible for you to get away from here?" And he said, "I don't know." And I said, "I can fix it." I did. And we --- He was a good man and a wonderful worker. Were you able to delegate some of your responsibilities to Mr. Andresen? Absolutely. And how did he perform --- From that point forward when you moved him to New York until you left the company, was he in the industrial hygiene department at American Cyanamid. He was in the department, yes. (p. 358)

Did you hire John Pendegrass? I did. (p. 359)

Tell me how the medical department and the industrial hygiene department functioned reporting-wise at American Cyanamid while you were in the industrial hygiene department there. I wrote up my trips and my findings and sent them to Dr. Hamblin. The findings of my staff, I looked over and sent those on to him. And Dr. Hamblin and I got together frequently and discussed findings. Really what I was getting at, did the medical department report to the industrial hygiene or was it the other way around; or did you report to different people? I wished it was the way you first said. How was it really? We reported to the medical department. (p. 361)

DR. ROBERT CLYNE

Source of Information is Dr. Clyne's deposition of 12/20/91

Years With American Cyanamid

- Start of employment: June 30th of 1948. And for how long did you work for American Cyanamid? Until April 1st of 1981. (p. 5)
- You went to full-time status with American Cyanamid? September of 1950. (p. 5)

Doctors

- Would you describe for me as best you recall the medical and related staff that existed at American Cyanamid when you first went there in 1948? **Donald O. Hamblin**, was the corporate medical director, and his office was just, oh, I'd say 500 feet away from where I was operating. There was another physician at the Bound Brook plant in New Jersey known as **Arthur Mangelsdorff**. He was at that time assistant medical director. Now, I'm trying to think. There was another gentleman who was an assistant medical director by the name – and working at 30 Rockefeller Plaza in New York known as **John Hans Felix Marchand**. There was an assistant to me, and his name was **James Clarkin**. (p. 6)
- **Dr. Harold Golz**, who joined the staff as a replacement for Dr. Marchand. (p. 10)

Industrial Hygiene

- Industrial hygiene group which was under the aegis of **William Bradley**, and there were three other industrial hygienists, **James Rook, J. Brennan Gisclard**... **William Andresen** was also a member of that group. (pp. 6-7)
- Were Messrs. Bradley, Rook and Gisclard, were they all there in 1948? To the best of my recollection, yes. (pp. 7-8)
- Prior to 1956, can you tell me who Mr. Bradley and the industrial hygienists reported to at American Cyanamid? To Donald O. Hamblin. (p. 11)
- Was in the usual practice, as you understood it, of the industrial hygienists to write a report of any surveys they made? Or would you know? I know that if they made a visit to any location that they would produce a report as to that particular survey or visitation. (p. 42)
- Is it fair to say that the whole purpose of the medical and industrial hygiene departments of American Cyanamid medicine in the late 40s and early 50s, when you got there, was toward the goal of worker health and safety? Yes, sir. (p. 103)

- How many industrial hygienists, for example, did American Cyanamid have on its staff? At one point in time, we had eight full-time industrial hygienists. In the late 40s and early 50s, when industrial hygiene was still a new profession, how many industrial did American Cyanamid have on its staff? Late 40s early 50s? I believe in that time frame there were five, one at Bound Brook and four centrally located to implement the corporate program. (p. 104)
- The industrial hygiene department reported to the medical director at American Cyanamid, is that correct? Yes, sir, until Dr. – Well, let me ask this. In the 40s and 50s, did the medical – did the industrial hygiene department report to the medical director? In the 40s, yes; in the 50s, for the first few years. And then Dr. Golz came on board. (p. 107)
- What sort of things did the industrial hygiene department do to encourage worker health and safety? Well, they would do their surveys to detect any possible problems that existed, depending strongly on statements or recommendations from local managements, leads as to areas of possible concern. They would then, if they found problem areas, discuss those with management and recommend corrective action. And this, in turn, would be discussed centrally with the appropriate personnel. (p. 107)

Medical Department

- Dr. Clyne, when you arrived at the American Cyanamid Company in 1948, would you describe the physical facilities that were available to the medical department at that time, if it was called the medical department? Yes, it was. We had a large waiting room, we had two examining rooms, x-rays facility, laboratory, two rooms with beds available in case someone wished to lie down. That was immediately adjacent to the administrative section, which consisted of two offices and two secretaries. And that was pretty much it in 1948. That was on the 58th or 59th floor of Radio City. (p. 13)
- Were you ever in a position to determine approximately when American Cyanamid began a corporate medical program? It did not have corporate implications until Dr. Hamblin moved to 30 Rockefeller Plaza sometime in the mid-40s. (p. 17)
- When you arrived at American Cyanamid and began your full-time employment with American Cyanamid, could you just briefly tell the jury how the medical department was structured and how the industrial hygiene department was structured? Very briefly. The medical department consisted of: the medical director, Donald Hamblin; his assistant medical director, who was Dr. Marchland; another assistant medical director located in Bound Brook, New Jersey, Dr. Mangelsdorff; and the industrial hygiene section which reported directly to Dr. Hamblin and consisted of four men – Mr. Gisclard, Mr. Bradley, Mr. Andresen and Mr. Rook. (pp. 102-103)
- Is it fair to say that the whole purpose of the medical and industrial hygiene departments of American Cyanamid medicine in the late 40s and early 50s, when you got there, was toward the goal of worker health and safety? Yes, sir. (p. 103)
- Tell us generally what medical policies American Cyanamid had implemented to ensure worker health? For example, would you do preemployment physicals, that sort of thing? Preemployment was done on every individual prior to being accepted for employment. There were periodic examinations, not only on the hourly worker, but on the clerical group, the office personnel. (p. 105)

- In the late 40s and early 50s, do you have any idea how many doctors were working for American Cyanamid either full time or part-time? I can't give you a specific figure. I can tell you that we had: 16 full time physicians; 15 part time physicians who gave us an hour and a half a day three days a week, up to five house a day five days a week; we had 135 fee-for-service physicians scattered throughout the United States and abroad; we had 55 full time nurses; and we had 10 technologists. (p. 106)
- The industrial hygiene department reported to the medical director at American Cyanamid, is that correct? Yes, sir, until Dr. – Well, let me ask this. In the 40s and 50s, did the medical – did the industrial hygiene department report to the medical director? In the 40s, yes; in the 50s, for the first few years. And then Dr. Golz came on board. (p. 107)
- Now, if you were at an American Cyanamid plant where American Cyanamid employees were working, did you have, in your capacity as a medical director, any authority to take any action if you saw some unsafe practice? It was --- it was known in Cyanamid that if I or even the industrial hygienists doing their routine surveys saw anything that was deemed to be hazardous that they had the power to go to the plant manager and say, "Shut that operation down." (p. 110)

American Cyanamid Plants

- Bound Brook, that's in New Jersey? Somerset County in New Jersey. How far is that from New York City, where the American Cyanamid offices were located? In round figures, about 50 miles. (p. 18)
- Would you give me a brief overview of what was manufactured at Bound Brook in the 50s? Dye stuffs, pigments, naphthalene, **some pharmaceuticals, the sulfur drugs were manufactured there** and were introduced by Cyanamid. There are a whole host of different compounds. It was a plant that had at one time about 4,400 people engaged in these various operations. (pp. 23-24)
- Cyanamid had 55 plants in the United States, 40 some off abroad. (p. 27)

IHF

- Would you recall at any point that American Cyanamid received information from the Industrial Hygiene Foundation? I'm quite certain. When they received it is an important point. When the industrial hygiene section was established by Dr. Hamblin under the aegis of Bradley, I'm certain that they received information from the Industrial Hygiene Foundation. (pp. 19-20)

ACGIH

- Would you know of the American Conference of Governmental Industrial Hygienists and their publications of TLVs or MACs in that time period also? Yes, sir. (p. 27)
- What is the ACGIH? Well, it's the American Conference of Governmental Industrial Hygienists. And based on information which is developed in each succeeding year, they publish a list of acceptable limits or threshold limit values. What is the threshold limit value, Doctor? It's the limit or the value for concentrations of that particular chemical in the work area which an individual can be exposed to safely eight hours a day for the duration of his employment. (p. 108)

National Safety Council

- Were you generally familiar, in the early 50s, with publications of the National Safety Council at American Cyanamid? Yes. (p. 28)

Chemical Association

- In the 1950s again... were you generally familiar with publications of the Manufacturing Chemists Association? Yes. In fact, I served on the medical board on the DMCA, which is now CMA, I believe. (pp. 28-29)

American Cyanamid Consulting Experts

- What is your best recollection of what you were taught, as part of your medical training, with regard to the toxicity of benzene? That individuals who are overexposed to benzene can have effects on their bloodstream, blood system, blood cells. We had an avid hematologist by the name of **Paul Reznikoff at Cornell University**, and he would deliver at least one, if not more, lectures about benzene. But in sum and substance, I've already told you what the effects were as taught to me. (p. 45)
- Did American Cyanamid have an epidemiological program while you were an employee? We had a consulting relationship with **Dr. Seltzer at Johns Hopkins University**, and he conducted epidemiological studies for us. There were **other studies that were conducted at the Yale medical school**, but these were on an individual-by-individual basis. One involved allegations at our plant down in Bartow, Florida, which proved to be unfounded; another one at Wallingford, et cetera. There were a whole series of things that cropped up from time to time, as you might expect, in 25 to 30 years. Dr. Seltzer's work at Hopkins, was he doing epidemiological studies on populations of American Cyanamid employees? He and his associates took that one group in Florida and did a study on them. But he was not doing them on all Cyanamid employees. (p. 68)
- Before Dr. Utidjian, was there ever an epidemiologist consultant or an employee for American Cyanamid, to your knowledge? As an employee of Cyanamid or as a consultant? Or as a paid consultant. Either one. Well, I mentioned Seltzer. Okay. And I mentioned the Yale medical program. And those are the only ones you are aware of? That I recall, yes. And Dr. Seltzer and the Yale medical program were both hired by American Cyanamid to do these investigations? That is right. Are you aware of any epidemiological investigations of American Cyanamid facilities that were done by people other than Cyanamid employees or consultants to Cyanamid? No, sir. (p. 74)

Epidemiologist

- Has American Cyanamid, to your knowledge, ever employed a consulting epidemiologist? The present medical director is an epidemiologist. And that would be Dr. who? Utidjian. Michal Utidjian. And approximately how long had Dr. Utidjian been with American Cyanamid? Since I retired (1981). (p. 73)

American Cyanamid Providing Medical/Industrial Hygiene to Other Companies

- Now, in addition to plants where there were American Cyanamid employees, did the medical and industrial hygiene department from time to time provide consultation and serve in an advisory capacity to other companies, other corporations; for example, Jefferson Chemical Company? Yes. Did you shortchange them on the advice and

consultation that you gave them? Same – they got the same treatment that the employees in Cyanamid got. (p. 109)

MR. WILLIAM V. ANDRESEN
Source of Information is Dr. Andresen's deposition of 1/10/92

- Would you tell me what years you were employed by American Cyanamid, please? I started --- well, I worked for a company that was --- was acquired by Cyanamid, so my service was from **1935** to 1979. And you say there was a company that was acquired by Cyanamid? Yes. What was the name of that company? **United Color and Pigment in Newark, New Jersey**. Now, they were acquired by Calco Chemical, which is in Bound Brook. And then Calco was acquired by Cyanamid? Well, actually during World War II, I think both of those things happened, that Cyanamid acquired Calco and Calco acquired United Color somewhere in that --- somewhere in that time frame. (pp. 5-6)

- I have a **B.S. in Chemical Engineering**. And when did you get your Bachelors, please? **1936**. And from what institution? Newark Institute of Technology. Have you had any graduate training beyond your Bachelors? I'd --- the Bachelors **and a Masters**. And the only training --- I got some training in the Army. (pp. 6-7)

- **When did you get into the field of industrial hygiene, please? In 1947**. Would you give me your best recollection of how it is that you got into the area of industrial hygiene? Well, the --- the plant I was working for was being shut down and most of its operations are going through Willow Island, West Virginia so I had a choice either to go to Willow --- West Virginia or to Bound Brook. **I chose Bound Brook**, and at Bound Brook they had a job that had just started, Industrial Hygiene Engineer, and **that's how I got into the field**. (p. 7)

- When you took this job as Industrial Hygiene Engineer at Bound Brook, was this at a point in time when American Cyanamid was already in the picture? The program was started in Central Medical Program in the hygiene started in 1946. At American Cyanamid? Yeah. (pp. 7-8)

- Would you give me your best understanding of the beginnings of the industrial hygiene program at American Cyanamid? Well, **Mr. Williams R. Bradley was hired to** --- industrial hygiene **by Dr. Hamlin.** Dr. Hamlin was the Medical Director at the time. (p. 8)

- **Goals:** What did you understand to be the role or the objectives of the industrial hygiene program at American Cyanamid when you joined in 1947? Well, it was to --- to provide protection of the employees to environmental hazards such as noise, radiation, exposure to chemicals, et cetera. (p. 9)

- Is there something that happened around 1952? In 1950 I was transferred to from Bound Brook to the New York office at the time, and for two years I spent half of my time at a

plant in Linden, New Jersey and the other half at Bridgeville, Pennsylvania. And then after that I got into the **General Surveys** and so on after 1952. (p. 10)

- My job as Industrial Hygiene Engineer (Bound Brook) at the time was to take the recommendations made by the Central Medical Department, Industrial hygiene group, and to see that the recommendations were carried through. Did the American Cyanamid Central Medical Department group have responsibility for these employees making nitrobenzene? No. The responsibility in any plant was that of the Plant Manager. (p. 20)

- **Yearly Surveys:** Do you recall who would have done those yearly surveys? W.R. Bradley was the first one, and then Brennan Gisclard and Jim Rook, and one of those three would have done that. Can I ask you to spell the last two gentlemen's names, please? Gisclard is G-I-S-C-L-A-R-D, and Rook is R-O-O-K. And they are both --- they are both deceased. I understand that Mr. Bradley is alive? Yes. (pp. 20-21)

- **TLV:** Were you generally familiar with the TLV's, threshold limit values of the American Conference of Governmental Industrial Hygienists? Yes. You were aware that there was a TLV for benzene? Yes. Would that have been back when you started taking your courses as an Industrial Hygiene Engineer in the late 40s? I had a copy of the TLV's every year since I got into industrial hygiene, I was provided with a copy of it so I knew about it. (p. 23)

- **Job Titles:** Would you tell me the different titles that you held while you were at American Cyanamid after you became Industrial Hygiene Engineer at Bound Brook? Well, I was Industrial Hygiene Engineer at Bound Brook, and I reported to the Engineering Department there. Then when I transferred to New York at the time, at Rockefeller Plaza, where the office was, I was an industrial hygienist, and then later I became Chief Industrial Hygienist; and after OSHA, I became the Director of Occupational and Environmental Services, which included both industrial hygiene and safety. (p. 30)

- And you're a certified industrial hygienist, are you not? Yes. Number 184. (p. 31)

- **IH Familiar with Products in the Plant:** Would it have been the general practice of industrial hygienists to make an inventory of the materials that are located in the manufacturing process, when you begin to do your survey work? It would be very difficult in Cyanamid where you had so many processes. They had sheet with instructions of the operation, for instance in the batch operation they have instructions saying put in this, so many pounds of this, so many pounds of that and so on, so there was those sheets available which would be looked at. You say that's one of the things that an industrial hygienist would do would be to look at the formulations? Yes. (pp. 38-39)

- **Decentralization of the IH Department:** Which department or grouping within Cyanamid did the industrial hygiene group function under when you left? Central Medical Department. And may I ask who was your replacement, if you know? J.C. Caporossi. He is still at American Cyanamid, but American Cyanamid has decentralized

the industrial hygiene since I left and he is, I believe, in --- is the hygienist for the industrial chemicals or organic chemicals group. He is still in Wayne, New Jersey. (pp. 61-62)

- **ACGIH:** What is the ACGIH? American Conference of Governmental Industrial Hygienists. Okay. Who is in that? Is that a bunch of people for business? John Pendergrass for one, and anybody else that works for the government in industrial hygiene. John Pendergrass worked for American Cyanamid for awhile? That's right. Was he in ACGIH while he worked? Not at that time I don't believe. (pp. 70-71)

- Do they have threshold limit values published for different sorts of chemicals and substances? Oh, yes. Lots of them. (p. 72)

- When you left American Cyanamid, you would have been over all of the industrial hygiene activities at American Cyanamid? Not exactly. I was the Director of Occupational Environmental Services and as such a number of industrial hygienists in the Central Medical Department reported to me. However, in some of the plants that we had, like Bound Brook, and Warners' plant in Linden, New Jersey they had resident hygienists, so they did not report to me. They reported to the Plant Manager. You were responsible for the corporate industrial hygienists? We were responsible for the corporate staff function, yes. (p. 82)

- Do you recall those? Threshold limit values as set out by the American Conference of Governmental Industrial Hygienists, it is clearly stated in those that those are not to be fine lines between safe and unsafe, that's true isn't it? That's right. (p. 83)

- **Medical/IH Review Construction Plans:** For plants that American Cyanamid owned, and where there were American Cyanamid employees working, if a plant were going to expand and build a new unit or facility, would somebody at American Cyanamid review those plans? Central Medical Industrial Hygiene Section reviewed every new plant that Cyanamid made, to incorporate industrial hygiene controls into the design. (p. 89)

ROBERT PENDERGRASS DEPO SUMMARY IN BRENNAN

Education and Employment History:

p. 4 1943 to 1944 Tulane University
1946 to 1948 Alabama/BS in biology and chemistry
1954 to 1955 University of Michigan/Masters in Public Health
1948 to 1956 Tennessee Valley Authority – also active duty for the Navy (i.e. 1951-53)

pp. 4-5 Employment with Boeing Airplane, Wichita, Kansas

p. 5 **1957-64 American Cyanamid employed as an industrial hygienist.**

p. 5 1964-86 Employment with 3M Company

1986-89 Employment with US Department of Labor Asst. Secretary of Labor for OSHA

p. 5 Pendergrass Associates 1989-2007 consulting business

p. 6 1994 to 1996 American Services Corp.

p. 7 Contacted by Anne Wilcox, Esq. to be a fact witnesses in Brennan
Documents he reviewed:
- Article by Mr. Bradley (which is Exh. 14 from Gramling depo – 1/1951 article in "Industry and Power" entitled "Cyanamid Industrial Hygiene Program")
- His depo dated 8/21/01)

p. 9 Never read the above-referenced article prior to this deposition.

Knowledge of Asbestos Hazards and Disease:

pp.10-11 By 1948 aware asbestos exposure could case asbestosis.

p. 11 By mid 1950s, aware of dangerous propensities of asbestos.

p. 12 By 1954-55 while at the University of Michigan he knew how to take asbestos dust samples and knew of engineering techniques to limit a worker's exposure.

p. 13 "Asbestosis" term coined by 1925.

p. 14 Denied knowledge of 1949 JAMA article entitled "Asbestosis and Cancer of the Lung"

p. 15 JMS refers him to a state of the art report he authored in an Allegheny County and there is a statement about Dr. Selikoff in 1964 recognizing asbestos as a cancer causing agent. Mr. Pendergrass conceded he attended the Selikoff presentation in 1964 at which time he was still employed by American Cyanamid.

pp. 16-17 He published nothing on asbestos or asbestos disease. Never lectured on asbestos. No awards for asbestos research. He has testified many times as a state of the art expert.

pp. 18-19 Witness is shown JAMA 1949 article referenced above – can't say if he has seen in the past.

pp. 20-21 JMS refers to previous testimony:
- 1/29/92 he testified for the first time in an asbestos case
- Testified that he gave 50-100 depos
  - 50% involved asbestos litigation

p. 22 Can't recall how much money he made in asbestos litigation.

Employment at American Cyanamid:

p. 22 1957-64 corporate hygienist for American Cyanamid. This was a staff position in corporate headquarters. First he was located in NY, then in NJ.

pp. 22-23 In 1957 at American Cyanamid there were:

- (5) industrial hygienists
- All had experience in toxicology, chemistry and engineering
- (p. 23) The goal was to maintain health of workers and those in the surrounding neighborhoods
- Industrial hygiene was a function of the Central Medical Department
- Dr. Hamlin was the Medical Director and thereafter Dr. Golz took his place

p. 24 American Cyanamid's primary business was chemicals.

p. 25 Witness shown a "Cyanamid News" newspaper which establish that in the mid 1960s there were 60 American Cyanamid plants.

p. 27 Some plants had an industrial hygienist; maybe 4 or 5 plants had an IH.

p. 27 His boss was Mr. Bradley; Bradley started the IH Dept. at American Cyanamid in the 1940s.

pp. 28-29 American Cyanamid had a Research facility at Stamford, Connecticut; he can't recall if Stamford did any asbestos research; he gave some examples of research projects done at Stamford.

p. 29 He would visit plants and conduct surveys.

p. 30 He visited the Lederle Lab.

p. 31 Denied raw asbestos fiber was used at Lederle.

pp. 31-34 **Shown a transcript where he said raw fiber was used in connection with pharmaceuticals.**

IHF:

p. 34 American Cyanamid was a member of the IHF.

p. 35 IHF had digests; he would agree some of the digests would have had articles on asbestos.

pp. 36-37 He never attended IHF presentations until he secured employment with 3M.

p. 37 Did not know Dr. Robert Parker at Lederle.

p. 37 He can't identify the plant manager at Lederle.

pp. 37-38 He visited Lederle in association with industrial hygienist activities.

p. 38 **There was an industrial hygienist at Lederle – John Wright.**

pp. 39-40 Not familiar with: Dr. W.G. Malcolm or John Allegaert – both were CEOs.

p. 40 Witness is shown an article he authored about Mr. Bradley:

- JMS reviews Bradley's employment history before American Cyanamid, which was the Bureau of Industrial Hygiene, Michigan Department of Health and American Fidelity Insurance.
- (p. 42) Bradley worked with the famous Frank Patty.
- (p. 43) **In Mr. Pendergrass' article he mentioned that Bradley did animal studies with asbestos prior to his work at American Cyanamid.**

pp. 43-44 JMS refers him to Mr. Bradley's testimony which he agrees with, more specifically, American Cyanamid had one of the biggest industrial hygiene groups in the industry and those individuals associated with the program were very talented and well respected in the industry.

p. 44 JMS reviews other employed in Industrial Hygiene at American Cyanamid: James Rook, W. Andresen

p. 45 In the article he authored about Mr. Bradley, he mentioned Mr. Andresen and a "bible" Andresen created for process and design engineers. It was a manual used so when American Cyanamid was adding to a new facility or building a facility, engineering controls were always considered.

p. 48 He mentions Mr. McHenry also in IH.

p. 49 He remembered Dr. Clyne and no other doctors that Dr. Clyne referenced when Dr. Clyne was deposed.

pp. 49-50 Doesn't know if x-rays/pfts were maintained on employees.

pp. 50-51 Masks/respirators for asbestos were available on the market when he was employed by Lederle.

p. 52 American Cyanamid was involved in the plastics industry.

pp. 52-53 Shown a 1951 article prepared by Mr. Bradley (Exhibit #13 Gramling deposition) dealing with the plastics industry; in the article Mr. Bradley discussed asbestosis and TLVs for asbestos.

pp. 55-56 Witness acts like American Cyanamid was not in the reinforced plastics business and

that Mr. Bradley was not referring to his work experience at American Cyanamid, rather, making general comments about the plastics industry.

pp. 56-57 He claimed American Cyanamid did not use raw asbestos fiber in their plastic business.

pp. 58-59 Witness shown 1/29/92 depo – he talked about raw asbestos fiber as a filler in plastics in regard to American Cyanamid.

p. 60 Discussion of journals he received while employed by American Cyanamid. He received the Journal of the American Industrial Hygiene Association

p. 61 American Cyanamid had libraries. He thought there was a library at Pearl River.

p. 62 He had access to the library in Wayne, NJ Corporate Headquaters.

pp. 62-63 Shown irrogs from Wyeth in Brennan (#19) and reference to:

- Journal of American Industrial Hygiene Assoc.
- Journal of Occupational Health
- JAMA

TLV:

pp. 64-65 Familiar with TLVs. While employed by American Cyanamid, there was a TLV for asbestos.

p. 66 Testified to the TLV for asbestos. ACGIH set forth the TLVs.

p. 66 Question witness when he was a member of the ACGIH.

p. 68 The first TLV for asbestos was in 1946.

pp. 68-69 Every year American Cyanamid would give to him a copy of the TLVs.

Need To Do Air Sampling:

pp. 69-70 Show witness his expert report from Allegheny County where he referenced the TLVs and asbestos and noted: "in evaluating asbestos levels in work areas it is necessary to obtain air samples by either midget impinger or with filters"

pp. 70-71 If American Cyanamid did air sampling it would be by midget impinger – can't recall when filter technique came out.

p. 71 Shown a 1953 article in American Industrial Hygiene Quarterly which was authored by industrial hygienists at American Cyanamid; the article was entitled "A Simple Device for Air Analysis."

p. 73 JMS refers him to his expert report from Allegheny County and his reference to Dr. Selikoff.

1960 – Dr. Wagner Article and Meso:

p. 74 Shown 1960 Dr. Wagner article "Diffuse Pleural Meso and Asbestos Exposure in the North Western Cape Province."

p. 75 He was familiar with the article.

p. 77 He conceded no known threshold for meso.

p. 77 He referenced other causes of meso: salk vaccine, idiopathic, ionized radiation. He noted none of those have been established as a causative agent like asbestos.

p. 79 **Issue – did he know that asbestos could cause meso when he was employed by American Cyanamid.** "No because that had not come to the forefront that it had just a few years later."

p. 79 Claimed he is not sure if he knew asbestos could cause cancer when he was employed by American Cyanamid – cross on this issue – went to see Dr. Selikoff speak while employed by American Cyanamid in 1964.

Taking Home Dusty Work Clothes:

pp. 80-81 He knew, and it was known in industrial hygiene, when he was employed by American Cyanamid, that workers should not take home dusty clothes since they could expose family members to toxic dusts.

p. 81 He thought American Cyanamid laundered workers clothes at some point; not sure if at Lederle, the workers clothes were laundered.

Workers Compensation:

p. 82 Can't say when PA, NY or NJ recognized asbestosis as a compensable injury.

Duty of the Employer:

p. 82 Employer has a duty to know what law applies to them and provide a safe work environment.

p. 82 It is the employer's duty to test finished products. Shown previous testimony and stands by it on that issue.

p. 90 No knowledge if American Cyanamid had a consulting relationship with John Hopkins or

Yale Medical School.

p. 90 Familiar with asbestos pipecovering; he observed it cut in the past.

p. 92 Claims as to the TLV during the relevant time period (prior to 1964) one would see visible dust in order to exceed the TLV.

pp. 93-94 He claimed there would be no need to do air sampling --- IH person could look at the environment and determine if exposure exceeded the TLV.

p. 94 Familiar with Kaylo – JMS referenced a report by Mr. Bradley air sampling Kaylo at an OCF facility (issue after 1964).

American Cyanamid Offering Their IH Services to Others:

pp. 95-96 American Cyanamid offered their IH services to "employers who were using American Cyanamid products."

pp. 96-76 He previously testified that at Lederle they were over exposures to certain chemicals.

pp. 98-99 Shown the 1951 Bradley article he reviewed prior to his depo. JMS reviews with him air sampling tools that were available.

p. 100 Said he may have testified as an expert for American Cyanamid – JMS: He did.

pp. 101-102 Shown irrog answer of Wyeth #8 – on the issue of vacuum systems at Lederle. He was not aware of any vacuum systems at Lederle.

p. 102 Irrog #10 – what written materials was provided to employees on asbestos hazards. He doesn't know if written materials were given to employees. He never received any such documents.

p. 103 Irrog #5 – were workers ever warned to avoid exposures beyond TLV "I don't know." He never received such documents.

p. 103 Irrog #36 – warning union? "I have no idea."

pp. 106-107 Did not know Dr. Love who was identified as a doctor at Lederle by Wyeth.

p. 107 Shown Supp Irrog #16 listing IH people – the answer referenced "Charles McKinnon" – he thinks it is misprinted – it should be Charles McHenry.

p. 108 Joseph Mellor – IH employee at a NJ plant.

p. 109 Clifford Hellings replaced him.

p. 109 He did not know Joseph Pernal or Charles Walters

p. 110 When Mr. Bradley left in 1960, James Rook became his boss.

p. 111 IH always answered to the medical dept.

pp. 111-112 75% of his time was involved in visiting American Cyanamid plants. The goal was every year that the plants would have a survey.

pp. 113-114 Usually traveled to plants alone.

p. 114 Plant employees would help out with air sampling. There was a Corporate Safety Director; every plant had someone responsible for safety – he can't recall any names.

p. 115 Refer him to supplemental irrogs regarding the individuals identified as safety employees at Lederle: David Hobbs, Joe Parnell, Charles Walter, John Wright. He only could say Mr. Wright was the industrial hygienist at Lederle.

pp. 116-117 Not being paid for his time.

p. 118 Questions by Tom Hanna

- p. 119 Wagner article – limited to crocidolite
- p. 120 ACGIH
- p. 122 TLV not reduced for asbestos until 1970
- p. 123 employment for OSHA
- pp. 125-126 never told high exposure to asbestos at Lederle