PLAINTIFF'S EXHIBIT

GTR-30

NO. 12540*BH00

EDWARD J. LAMBERT	§	IN THE DISTRICT COURT OF
	§	
v.	§	BRAZORIA COUNTY, TEXAS
	§	
PROKO INDUSTRIES, INC., et al.	§	23rd JUDICIAL DISTRICT

THE GOODYEAR TIRE & RUBBER COMPANY'S FIRST SUPPLEMENTAL RESPONSES TO PLAINTIFFS' REQUEST FOR DISCLOSURE

To: Plaintiff, Edward J. Lambert, by and through his attorneys of record, Elizabeth Schick and William Tapscott, Jr., Baron & Budd, P. C., Centrum Building, 3102 Oak Lawn Avenue, Suite 1100, Dallas, TX 75219-4281.

Defendant The Goodyear Tire & Rubber Company ("Goodyear") files and serves these first supplemental responses to Plaintiffs' Request for Rule 194 Disclosure as follows:

RULE 194 DISCLOSURES

194.2(a) The correct names of the parties to the lawsuit.

RESPONSE:

This defendant's correct name is The Goodyear Tire & Rubber Company.

194.2(b) The name, address, and telephone number of any potential parties.

RESPONSE:

At this time, Goodyear knows of no potential parties to this lawsuit. However, Goodyear reserves the right to supplement this response in accordance with the Texas Rule of Civil Procedure.

194.2(c) The legal theories and, in general, the factual bases of the responding party's claims or defenses.

RESPONSE:

Goodyear denies that plaintiffs contracted any asbestos-related disease(s) as a result of exposure to asbestos while working on Goodyear's premises. Goodyear denies that it was either negligent or

grossly negligent. In the alternative, plaintiffs' claims, damages and injuries were caused in whole or in part by a pre-existing or subsequent medical condition which was unrelated to Goodyear or were the result of natural and ordinary diseases of life. In the alternative, plaintiffs' injuries and damages were caused by an idiosyncratic reaction, without any negligence, defect, or actionable conduct by Goodyear. Goodyear contends that plaintiffs' evidence cannot meet the requirements of *Merrell Dow Pharmaceuticals v. Havner*, 953 S.W.2d 706 (Tex. 1997) or *E.I. du Pont de Nemours and Co. v. Robinson*, 923 S.W.2d 549 (Tex. 1995).

194.2(d) The amount and any method of calculating economic damages.

RESPONSE:

Goodyear contends that plaintiffs have no damages for which Goodyear is responsible.

194.2(e) The name, address and telephone number of persons having knowledge of relevant facts, and a brief statement of each identified person's connection with the case.

RESPONSE:

Bob Abrahams
1021 Main Street, Suite 2020
Houston, TX 77002
(713) 527-0379

Mr. Abrahams is a former employee of B & B Engineering who will testify concerning wages paid to employees including, but not limited to manner of payment and withholding of FICA taxes.

Melvin P. Proctor
7515 rockhill
Houston, Texas 77061
(713) 643-1309

Former employee of Thorpe Insulation who will state that it would be highly unusual for Thorpe to pay by cash unless 1) it was a very small town that would not accept out-of-state checks or 2) on the last day of a job and checks had already been cut so it would be payment for overtime or time not turned in.

Tom Hopkins

Former employee of Thorpe Insulation who will state that it would be highly unusual for Thorpe to pay by cash unless 1) it was a very small town that would not accept out-of-state checks or 2) on the last day of a job and checks had already been cut so it would be payment for overtime or time not turned in.

CURRENT/FORMER EMPLOYEES

The Goodyear Tire & Rubber Company also designates the following current and former employees as potential witnesses. In addition to factual testimony, many of these witnesses will offer expert testimony in their respective fields of skill, training and/or expertise. These witnesses should only be contacted through Goodyear's counsel.

Lonnie Albers
M. Bard
A. Baskin
E. Carr
John Cavanaugh
Richard Cavanaugh
J. Collins
H. Conn
D. E. Cook
P. [illegible]. Davis
J. E. Durkot
James Farmer
A. Haralson
L. C. Hatch
Herb Hennington
H. Hensley
Robert Hillyer
J. L. Holtzhouser
A. Hopkins
C. A. Johnson
Clifford Johnson, Jr.
Arthur Kelson
E. Kissel

L. Kistler
M. Lewis
Robert A. Manning
M. McGrann
H. W. McInerney
D. Miller
R. W. Modrell
Corley Odum
R. Pierre
D. M. Shaeffer
D. J. Sherman
R. Stegmeier
A. Tacker
Luis Tan
W. A. Thomas
P. Troskler
John Wellman

194.2(f) For any testifying expert:

(1) the expert's name, address, and telephone number;

(2) the subject matter on which the expert will testify;

(3) the general substance of the expert's mental impressions and opinions and a brief summary of the basis for them, or if the expert is not retained by, employed by, or otherwise subject to the control of the responding party, documents reflecting such information; and

(4) if the expert is retained by, employed by, or otherwise subject to the control of the responding party:

(A) all documents, tangible things, reports, models, or data compilations that have been provided to, reviewed by, or prepared by or for the expert in anticipation of the expert's testimony; and

(B) the expert's current resume and bibliography.

RESPONSE:

Goodyear believes that plaintiff's counsel has copies of all resumes but will provide additional copies upon request.

Dr. Oscar Auerbach
Tremont Avenue & Centre
East Orange, New Jersey 07017
(973) 675-6988

Dr. Auerbach is a pathologist who may testify about his examination of paraffin blocks of the plaintiff(s) and about his findings and conclusions.

Howard E. Ayer, CIH
Industrial Hygiene Consultant
2812 Linwood Avenue
Cincinnati, Ohio 45208-2810
(513) 871-0146

Mr. Ayer is a certified industrial hygienist who may testify about product composition and the type and volume of airborne asbestos fibers produced during various operations. He may also testify about the effects of exposure to different types of asbestos fibers, the level of potential respirable asbestos fibers and the chronology and meaning of governmental and other regulations regarding permissible levels of airborne asbestos fibers.

Dr. Stephen M. Ayres
Medical College of Virginia
Director of Center for International Programs
Box 843071
Richmond, Virginia 23298
(804) 828-5356

Dr. Ayres is a pulmonary specialist. He may testify as to all matters pertaining to the history of scientific knowledge, research and study concerning exposure to asbestos and its effects on the human body, as to all state of the art issues, as to his expert opinion as to safe levels of asbestos exposure and the basis for such opinions, as to exposure to asbestos in regards to development of respiratory diseases, including but not limited to asbestosis, lung cancer, and mesothelioma, and as to the effects of exposure to the chrysotile fiber and other asbestos fibers. Dr. Ayres may testify about the Saranac Laboratory studies, including the significance of the methodology of the studies, the results of the studies, and the conclusions of the studies. He may also testify that it was believed that at that time individuals who were exposed to asbestos dust levels below the threshold limit value of five million particles per cubic foot were not at risk of contracting asbestos related disease. The opinions of Dr. Ayres are based upon his training and experience, and his extensive review of the Saranac documents and the deposition of Willis Hazard. His opinions are set forth in depositions and transcripts of testimony he has given at trial, copies of which are in the possession of plaintiffs' counsel.

Dr. Bob Baird
3500 Gaston #806
Wadley Tower
Dallas, Texas 75246
(214) 820-1000

Dr. Baird will testify regarding his review of the medical records and/or his examination and diagnosis of the physical condition of the plaintiff(s) and the relationship, if any, to the plaintiff's exposure to asbestos.

Dr. Baird will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Baird will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Baird will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Baird will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Baird mental impressions and opinions and a summary of the basis for them are as follows. Dr. Baird will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those employed during the Second World War. Thus, in 1965 when the first significant series of publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments.

This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos

exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Baird may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Baird may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Baird may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United

States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Baird in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Dr. J. Leroy Balzer
408 Horse Trail Court
Walnut Creek, California 94595
(925) 274-0828

Dr. J. Leroy Balzer is an industrial hygiene specialist. Dr. Balzer received his B.S. in Microbiology/Public Health from the University of California, Los Angles in 1962, his M.S. in Public Health/Preventive Medicine/Industrial Hygiene in 1963 from the University of California, Los Angles, and his Ph.D. in Environmental Health Sciences from University of California, Berkeley in 1971. From 1963 to 1965, he was employed as an environmental health scientist at the University of California at Berkeley. From 1966 to 1971, Dr. Balzer was employed by the University of California School of Public Health as a research associate and research fellow. In 1966, he became involved in a coordinated research program of occupational medicine, industrial hygiene and education of insulation contractors. This intense study of the construction industry was sponsored through grants from the United States Public Health Service and involved observing the work environment of insulators.

Dr. Balzer was a Certified Industrial Hygienist from 1973 until 1987. Dr. Balzer has been a consulting Industrial Hygienist since 1988. He has been a professor at the University of California, San Francisco since 1993, and was an assistant Vice Chancellor, Environmental Health and Safety from 1987 to 1993. He has lectured on occupational/environmental health issues in the United States and internationally. In 1993, Dr. Balzer became a full time consulting industrial hygienist and was appointed an Assistant Clinical Professor, School of Medicine, University of California Health Sciences. Dr. Balzer is a member of the American Conference of Governmental Industrial Hygienists (Affiliate), American Industrial Hygiene Associations and other professional organizations.

Dr. Balzer is an environmental consultant. He may give testimony regarding the level of fiber release, if any, from gasket and packing products or other products in the occupational setting. He may testify regarding threshold limit values and permissible exposure levels as promulgated by private organizations and governmental agencies. He may testify as to issues involving reentrainment and fiber drift. He may testify as to work practices regarding various types of occupations using products that contained asbestos. He may testify as to the

applicability of the OSHA and Environmental Protection Agency's guidelines as they relate to various types of products including gaskets and packings. He may testify as to exposure that may result from the use of other types of asbestos products.

Dr. Balzer has personal knowledge of relevant facts but is also an expert based upon his specialized knowledge, skills, and training. Dr. Balzer may testify about the size, construction, layout and working environment of facilities such as where the plaintiff(s) worked. He may testify about the nature of the working environment in such locations. He may testify about his knowledge of the composition and asbestos content, if any, of the products and may testify concerning the ability of such products to emit asbestos fiber under certain conditions. He may testify generally as to the industrial hygiene state-of-the-art. He may testify to the dust levels produced by particular insulation operations and products, including pipe and block insulation. He may also address insulator union knowledge of asbestos hazards, the historical development of the use of respirators in association with the use of asbestos-containing products. He may testify about whether the products identified are capable of emitting respirable asbestos fibers of type or quantity which could have substantially contributed to the plaintiffs' alleged asbestos-related condition. He may testify about applicable governmental standards and regulations. His testimony will be based, in part, on the results of testing which he has performed or reviewed for products which are the same or substantially similar to those of which the plaintiffs complain.

Balzer may testify regarding an individual's risk of exposure to asbestos from different media, including, but not limited to, ambient air, industrial products and occupational settings. Balzer may testify concerning: (1) circumstances in occupational settings that may result in direct exposure for persons having contact with asbestos-containing products or equipment with asbestos insulations, and (2) circumstances that may result in bystander exposure for those nearby others having contact with asbestos containing products or equipment with asbestos insulation. Balzer may testify about industrial hygiene principles and methodologies used to determine potential hazards due to asbestos exposure.

Dr. Balzer may comment on defendant's knowledge and conduct and whether it was reasonable and appropriate in light of industry knowledge and the "state of the art" during the period of time in question. He may offer opinions that defendant's actions were reasonable and appropriate and met the appropriate standard of care. Based on the evidence developed in this case, Dr. Balzer may testify that the plaintiff had little or no opportunity for any harmful exposure to asbestos while at defendants' facility because of the nature of the plaintiff's occupation, and he may testify that defendants' approach to the handling and control of any asbestos-containing materials on its premises were reasonable in light of available information and industrial hygiene practices at different points of time. He may also testify as to any matter raised by experts called by plaintiff or any co-defendants in this action.

Dr. Balzer may also testify to any and all other matters, within his knowledge and expertise, which are relevant to this particular case. Finally Dr. Balzer may render various opinions relevant to a *Daubert/Havner/Robinson* analysis.

Dr. Peter Barrett
300 Boyleston Street Suite 14
Boston, Massachusetts 02116
(617) 749-5876

Dr. Barrett is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Barrett may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Barrett may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Barrett in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Barrett's education and professional experience.

Joseph Bates, M.D.
4300 West 7th Street
Little Rock, AR 72205
(501) 224-1461

Dr. Bates is a medical doctor. He may testify about the medical condition of the plaintiffs and/or plaintiffs' decedents and about asbestos-related diseases in general.

Mr. Lawrence R. Birkner
McIntyre, Birkner & Associates, Inc.
2026 El Monte Drive
Thousand Oaks, California 91362-1822
(805) 494-7155

Mr. Birkner is a certified industrial hygienist and certified safety professional. He received a Bachelor of Science degree from Portland State University in 1973 and a Masters Degree in Occupational Safety and Health at New York University in 1975. Between 1974-1976,

Mr. Birkner worked closely with Dr. Irvin Selikoff and others at Mount Sinai while employed as a safety and health research specialist at Environmental Sciences Laboratory in New York. From 1976 through 1996, Mr. Birkner worked extensively as a practicing industrial hygienist in American Industry; in the course of that employment, Mr. Birkner worked as a corporate industrial hygienist for Celanese Corporation between 1977-1981. Mr. Birkner is a fellow of the AIHA and a member of the other professional industrial hygiene organizations.

Mr. Birkner will provided testimony regarding the history of industrial hygiene, industrial hygiene methods, exposure levels which trigger diseases associated with dust exposure, good housekeeping measures, and other related matters. He is prepared to testify about respirator history, what constitutes good hygiene practice, and the periods of time from an industrial hygiene standpoint when people and companies became aware of associated health risks. Mr. Birkner may give testimony regarding the level of fiber release, if any, from asbestos-containing products in the occupational setting and may testify regarding the availability of materials as substitutes for asbestos-containing products. He may testify as to issues involving reentrainment and fiber drift. Mr. Birkner may also testify regarding work practices applicable to various types of occupations using products that contain asbestos, and he will provide a retrospective assessment or estimate of plaintiff's likely exposure to asbestos in defendant's work environment based on historical literature and facts available in this case.

Mr. Birkner has personal knowledge of relevant facts, but he also possesses generalized expertise in his field based on his specialized knowledge, skills, and training. He may provide testimony regarding the applicability of the ACGIH, OSHA, and EPA guidelines as they relate to occupational exposures to various types of asbestos-containing products. Mr. Birkner may testify regarding the size, construction, layout and working environment of facilities such as where plaintiff worked. He may testify about the nature of the working environment in such locations. He may testify about his knowledge of the composition and asbestos content, if any, of products present in the plaintiff's workplace and may testify concerning the ability of such products to emit asbestos fibers under certain conditions. Mr. Birkner may testify to the dust levels produced by particular occupational operations and products, to include those associated with the use of pipe and block insulation.

Mr. Birkner may testify about the development of literature and information about asbestos-related diseases as they related to the gradual development of knowledge within industry and within the field of industrial hygiene about asbestos exposure and appropriate control measures. He will address the evolution of workplace practices available to control exposures, to include the historical development of the use of respirator protection in association with the handling of asbestos-containing products. Mr. Birkner will testify regarding the development over time of governmental standards and regulations pertaining to asbestos, to include the historical evolution of permissible exposure levels to asbestos developed by professional organizations and governmental agencies. He will discuss his own research into asbestos-related diseases as they relate to industrial hygiene, the carcinogenicity of various fiber types as they related to industrial hygiene, and the relationship, if any,

between asbestos and various diseases. Mr. Birkner will provide testimony regarding the epidemiology of asbestos-related diseases, latency, state-of-the-art, and other related matters as they impact industrial hygiene. Based on the evidence developed in this case, Mr. Birkner may testify that the plaintiff had little or no opportunity for any harmful exposure to asbestos while at defendants' facility because of the nature of plaintiff's occupation, and he may also testify that defendant's approach to the handling and control of any asbestos-containing materials on its premises were reasonable in light of available information and industrial hygiene practices at different points of time.

Kenneth J. Boudreaux, Ph.D.
Consulting Economist
A.B. Freeman School of Business
Tulane University, 1424 Bordeaux
New Orleans, LA 70115
(504) 865-5471

Dr. Boudreaux is an economic consultant and may testify regarding the economic loss incurred by the death of a plaintiff.

Dr. Brian B. Bradley
Lung Center Associates, P.A.
4003 Woodlawn
Pasadena, TX 77504
(713) 941-0088

Dr. Bradley is a medical doctor and board certified in the areas of internal medicine, pulmonary medicine, preventative medicine, occupational medicine, and geriatrics. He may testify about the medical condition of the plaintiffs and about asbestos-related diseases in general.

Richard C. Bradt, Ph.D.
Department of Metallurgical & Materials Engineering
F 301 MIB / Box 870202
University of Alabama
Tuscaloosa, AL 35487-0200
(205) 348-0663

Richard Bradt has expertise regarding the physical characteristics, propensities and behavior of certain products at issue in this case during exposure to elevated temperatures.

Dr. Kevin Browne
66A Warwick Way
London, England SWIV IRZ

Dr. Brown is a medical doctor. He may testify, in general, concerning asbestos-related diseases, the effects of exposure to asbestos upon a person or persons in general, including the epidemiology of asbestos-related diseases, and the link between use of tobacco products and various pulmonary and other diseases and conditions. In addition, Dr. Brown may testify about the necessary elements of a clinical diagnosis of occupational and other disease, the complexities and scientific criteria associated with determination of cause-effect relationships between occupational exposures and lung or other pathology, the nature of various diseases and conditions, and the likelihood that such diseases or conditions will progress, recur, or predispose an individual to develop another related disease or condition. Dr. Browne may also be expected to testify regarding whether a particular plaintiff or group of plaintiffs who is or was at an increased risk of developing or experiencing recurrence of cancer and whether a plaintiff has a reasonable fear of cancer due to exposure to asbestos.

Dohrman H. Byers
12060 Lawnview Avenue, #6
Cincinnati, OH 45246
(513) 671-3762

Mr. Byers was the Chief of Analytical Chemistry Service, United States Department of Public Health from 1948 through 1959. Mr. Byers testified as to the interpretation and application of the Threshold Limit Value by the U.S. Public Health Service. Mr. Byers' testimony will be presented by way of deposition taken on October 21, 1985, in *Brandt v. Owens-Illinois, Inc.*, Case No. 605-147, Milwaukee Circuit Court, Wisconsin.

Dr. Sam H. Cade, Jr.
Radiology Department
Baylor University Medical Center
3600 Gaston Avenue
Dallas, TX 75246
(214) 820-0111

Dr. Cade is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Cade will also testify about asbestos-related disease in general.

Dr. Cade may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Cade may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Cade in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Cade's education and professional experience.

Phillip Cagle, M.D.
Baylor School of Medicine
Dept. of Pathology
1200 Moursund Street
Room 286A
Houston, Texas
(713) 790-2376

Dr. Cagle is Board Certified in Anatomic and Clinical Pathology by the American Board of Pathology. Dr. Cagle may provide testimony regarding his examination of plaintiffs' or plaintiffs' decedents' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Cagle may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. Dr. Cagle may also be asked to respond to the testimony of certain witnesses offered at the time of trial.

Dr. Cagle is expected to provide testimony concerning the anatomic structure and functioning of the lung from a pathologic perspective, the defense mechanisms and functioning of the lung in health and otherwise, the responses of the lung to various stimuli, and the role of various components of the respiratory system in the proper functioning of the lung. Dr. Cagle is expected to describe and distinguish various types of asbestos fibers; to describe the things which affect the ability of asbestos fibers to affect various structures within the respiratory system; and to describe the body's specific responses to fibers of asbestos that are inhaled, whether or not they are retained.

It is further believed that Dr. Cagle will define and distinguish various conditions, such as asbestosis, pleural changes and other non-malignant changes that may be attributable in some

persons to the results of long term inhalation and retention of some forms of asbestos fiber. Dr. Cagle is further expected to be able to testify concerning the circumstances under which exposure to certain forms and types of asbestos may be associated with the incidence of some forms of mesothelioma in some persons, and will testify concerning the results of his own experiences, the medical and scientific literature, and existing epidemiologic studies concerning associations that are alleged to exist epidemiologically between exposure to asbestos in some populations and the mortality and/or incidence of some forms of cancer.

Dr. Cagle is further expected to offer testimony concerning the effects of inhaled tobacco smoke and other factors on the occurrence of disease in populations who are also alleged to be exposed to asbestos containing products, and additionally concerning how the effects of inhaled tobacco smoke and other factors can confound the apparent results of certain epidemiologic studies.

Dr. Cagle is also expected to testify that it cannot be said, to a reasonable degree of medical probability, that any hypothetical person's alleged "exposure" to products that may have contained asbestos was of importance to that individual, without reference to that specific person's individual work history, medical history, findings on physical examination and pathological examination of tissue, if any, information concerning the individual's use of protective equipment, specific types of asbestos containing product(s) used and/or handled, resolution of questions regarding exposures to substances other than asbestos-containing products, and other known etiologies for whatever conditions are found to exist.

It is further expected that Dr. Cagle's testimony will generally respond to the pathologic, scientific and epidemiologic testimony which may be offered by plaintiffs' experts, and in that sense his testimony is dependent upon the prior testimony of such experts and cannot be specifically predicted.

Dr. Cagle may testify as to the general medical aspects of the diagnosis and treatment of asbestos-related disease and the pathological effect of asbestos on the lung. He may also testify as to the relationship of asbestos exposure and the incidence of cancer. Dr. Cagle is expected to provide testimony in the following areas:

1. Anatomy and function of the respiratory and circulatory systems and the diagnosis and treatment of disease affecting such systems;

2. The nature of asbestos and asbestosis;

3. The symptomology, disease process and diagnosis of asbestosis and cancer associated with the respiratory system peritoneum and peritoneal cavity;

4. The nature and extent of medical and scientific knowledge regarding any association of obstructive pulmonary disease with asbestos fiber exposure;

5. The effect of exposure to substances other than asbestos on the development and manifestation of obstructive and restrictive conditions and diseases of the respiratory system and other causes of obstructive and restrictive disease or defects of the respiratory system;

6. Methods of diagnosis of various diseases, particularly means of establishing the differential diagnosis of alleged asbestos-related diseases with other non-asbestos related diseases;

7. Incidence of lung cancer among individuals with asbestosis or asbestos exposure without asbestosis, compared with non-asbestotic asbestos workers, non-asbestos exposed workers, and with the general population;

8. The import of any exhibit (including without limitation, corporate documents of defendants) introduced as evidence, or any items prepared for use or used for demonstrative purposes by any witness;

9. Cigarette smoking and its effect on the lung and other organs;

10. The relationship of cigarette smoking to cancer of the lung and cancers of the other sites with reference to epidemiological studies and physiologic effect;

11. Difference between impairment and disability;

12. Effect of asbestosis, or asbestos exposure without asbestosis, on disability and life expectancy; effect of pleural plaques or other pleural manifestations of asbestos exposure on lung function or life expectancy;

13. The lack of relationship between presence of pleural plaques and a later development of any form of cancer;

14. Cancer incidence in the general population and among asbestos workers and its potential causes;

15. The history of evolution and knowledge of asbestos-related diseases;

16. The fiber types and exposure levels considered to be substantial in causing asbestos-related disease, specifically mesothelioma.

Additionally, Dr. Cagle may testify concerning the diagnosis of the plaintiff. Dr. Cagle may also testify as to his findings and diagnosis after examination and analysis of tissue, slides or other pathologic materials, medical records, reports, radiographs and plaintiffs' work history. He may give testimony concerning his review of any report purported to be diagnostic of any

oncological condition and the methods of and procedures for conducting fiber counts. He may give testimony regarding malignancies associated with asbestos exposure or cigarette abuse and other malignancies from which they must be differentiated, the appropriate protocols for the diagnosis of those conditions, prognosis and information relating to the known cause of those malignancies. He may testify concerning the text and other literature relevant to any malignancy purported to be asbestos-related and any other malignancy from which it must be distinguished, including data relevant to contentions of increased risk of asbestos-related disease or cancer, prognosis, the relevant standards of care and considerations relating to medical monitoring. His testimony may include discussions of any relevant epidemiology, anatomy and physiology. He may testify regarding the pathology of the plaintiffs and/or plaintiffs' decedents, causation of the plaintiffs' and/or plaintiffs' decedents' illness and asbestos-related diseases.

Finally Dr. Cagle may render various opinions relevant to a *Daubert/Havner/Robinson* Analysis.

The observations and opinions offered by Dr. Cagle in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Cagle's training, education, professional experience, research and publications.

As defendant becomes aware of additional facts and the opinions of plaintiffs' experts, this witness may testify as to the opinions suggested by the additional facts or in response to the opinions of plaintiffs' experts.

Dr. Cagle will testify regarding the pathology of the plaintiff(s) and/or plaintiffs decedent.

Richard Call, M.D.
496 Prospect Terrace
Pasadena, CA 91103
(626) 744-9803

Dr. Call worked for Unocal from 1957 until 1983 as the medical director. He has knowledge of the corporate occupational medicine program of Unocal during this time frame. His responsibilities included support of localized efforts at each facility, which, after 1966, included the Nederland Refinery. Additionally, he is generally familiar with the medical department at Pure Oil at the time of the 1966 merger with Unocal.

Michele Carbone, M.D., Ph.D.
Assistant Professor
Maurizio Bocchetta, Ph.D
Dr. P. Rizzo
Loyola University Medical Center
Department of Pathology
2160 South First Avenue
Maywood, IL 60153
(708) 327-3250

Dr. Carbone, Dr. Bocchetta and/or Dr. Rizzo may testify about the role of the SV-40 virus in the development of mesothelioma.

E.J. Chatfield
Chatfield Technical Consulting, Ltd.
2071 Dickson Road
Mississauga, Ontario, Canada L5B I Y8

E. J. Chatfield has expertise regarding the physical characteristics, propensities, and behavior of certain products at issue in this case during exposure to elevated temperatures.

Dr. Andrew Churg
Department of Pathology
University of British Columbia
2211 Westbrook Mall
Vancouver, B.C. Canada V6T 1WS
(604) 228-7111

Dr. Churg is a Pathologist. Dr. Churg may provide testimony regarding his examination of plaintiffs' or plaintiffs' decedents' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Churg may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. Dr. Churg may also be asked to respond to the testimony of certain witnesses offered at the time of trial.

Dr. Churg is expected to provide testimony concerning the anatomic structure and functioning of the lung from a pathologic perspective, the defense mechanisms and functioning of the lung in health and otherwise, the responses of the lung to various stimuli, and the role of various components of the respiratory system in the proper functioning of the lung. Dr. Churg is expected to describe and distinguish various types of asbestos fibers; to describe the things which affect the ability of asbestos fibers to affect various structures within the respiratory system; and to describe the body's specific responses to fibers of asbestos that are inhaled, whether or not they are retained.

It is further believed that Dr. Churg will define and distinguish various conditions, such as asbestosis, pleural changes and other non-malignant changes that may be attributable in some persons to the results of long term inhalation and retention of some forms of asbestos fiber. Dr. Churg is further expected to be able to testify concerning the circumstances under which exposure to certain forms and types of asbestos may be associated with the incidence of some forms of mesothelioma in some persons, and will testify concerning the results of his own experiences, the medical and scientific literature, and existing epidemiologic studies concerning associations that are alleged to exist epidemiologically between exposure to asbestos in some populations and the mortality and/or incidence of some forms of cancer.

Dr. Churg is further expected to offer testimony concerning the effects of inhaled tobacco smoke and other factors on the occurrence of disease in populations who are also alleged to be exposed to asbestos containing products, and additionally concerning how the effects of inhaled tobacco smoke and other factors can confound the apparent results of certain epidemiologic studies.

Dr. Churg is also expected to testify that it cannot be said, to a reasonable degree of medical probability, that any hypothetical person's alleged "exposure" to products that may have contained asbestos was of importance to that individual, without reference to that specific person's individual work history, medical history, findings on physical examination and pathological examination of tissue, if any, information concerning the individual's use of protective equipment, specific types of asbestos containing product(s) used and/or handled, resolution of questions regarding exposures to substances other than asbestos-containing products, and other known etiologies for whatever conditions are found to exist.

It is further expected that Dr. Churg's testimony will generally respond to the pathologic, scientific and epidemiologic testimony which may be offered by plaintiffs' experts, and in that sense his testimony is dependent upon the prior testimony of such experts and cannot be specifically predicted.

Dr. Churg may testify as to the general medical aspects of the diagnosis and treatment of asbestos-related disease and the pathological effect of asbestos on the lung. He may also testify as to the relationship of asbestos exposure and the incidence of cancer. Dr. Churg is expected to provide testimony in the following areas:

1. Anatomy and function of the respiratory and circulatory systems and the diagnosis and treatment of disease affecting such systems;

2. The nature of asbestos and asbestosis;

3. The symptomology, disease process and diagnosis of asbestosis and cancer associated with the respiratory system peritoneum and peritoneal cavity;

4. The nature and extent of medical and scientific knowledge regarding any association of obstructive pulmonary disease with asbestos fiber exposure;

5. The effect of exposure to substances other than asbestos on the development and manifestation of obstructive and restrictive conditions and diseases of the respiratory system and other causes of obstructive and restrictive disease or defects of the respiratory system;

6. Methods of diagnosis of various diseases, particularly means of establishing the differential diagnosis of alleged asbestos-related diseases with other non-asbestos related diseases;

7. Incidence of lung cancer among individuals with asbestosis or asbestos exposure without asbestosis, compared with non-asbestotic asbestos workers, non-asbestos exposed workers, and with the general population;

8. The import of any exhibit (including without limitation, corporate documents of defendants) introduced as evidence, or any items prepared for use or used for demonstrative purposes by any witness;

9. Cigarette smoking and its effect on the lung and other organs;

10. The relationship of cigarette smoking to cancer of the lung and cancers of the other sites with reference to epidemiological studies and physiologic effect;

11. Difference between impairment and disability;

12. Effect of asbestosis, or asbestos exposure without asbestosis, on disability and life expectancy; effect of pleural plaques or other pleural manifestations of asbestos exposure on lung function or life expectancy;

13. The lack of relationship between presence of pleural plaques and a later development of any form of cancer;

14. Cancer incidence in the general population and among asbestos workers and its potential causes;

15. The history of evolution and knowledge of asbestos-related diseases;

16. The fiber types and exposure levels considered to be substantial in causing asbestos-related disease, specifically mesothelioma.

Additionally, Dr. Churg may testify concerning the diagnosis of the plaintiff. Dr. Churg may also testify as to his findings and diagnosis after examination and analysis of tissue, slides or other pathologic materials, medical records, reports, radiographs and plaintiffs' work history. He may give testimony concerning his review of any report purported to be diagnostic of any oncological condition and the methods of and procedures for conducting fiber counts. He may give testimony regarding malignancies associated with asbestos exposure or cigarette abuse and other malignancies from which they must be differentiated, the appropriate protocols for the diagnosis of those conditions, prognosis and information relating to the known cause of those malignancies. He may testify concerning the text and other literature relevant to any malignancy purported to be asbestos-related and any other malignancy from which it must be distinguished, including data relevant to contentions of increased risk of asbestos-related disease or cancer, prognosis, the relevant standards of care and considerations relating to medical monitoring. His testimony may include discussions of any relevant epidemiology, anatomy and physiology. He may testify regarding the pathology of the plaintiffs and/or plaintiffs' decedents, causation of the plaintiffs' and/or plaintiffs' decedents' illness and asbestos-related diseases.

Finally Dr. Churg may render various opinions relevant to a *Daubert/Havner/Robinson* Analysis.

The observations and opinions offered by Dr. Churg in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Churg's training, education, professional experience, research and publications.

As defendant becomes aware of additional facts and the opinions of plaintiffs' experts, this witness may testify as to the opinions suggested by the additional facts or in response to the opinions of plaintiffs' experts.

Dr. Joseph Cimino
New York Medical College
50 Willard Avenue
North Tarryton, NY 10591
(914) 993-4253

Dr. Cimino is presently Professor and Chairman of the Department of Community and Preventive Medicine, New York Medical College, Valhalla, New York. Dr. Cimino may be expected to testify generally about research in the area of pulmonary pathology and about the process by which medical knowledge evolved. He may also be expected to testify regarding the state of medical knowledge from the early part of the century to the middle 1960's as it regards pathological changes due to exposure to asbestos and about his conclusions regarding the studies conducted by the Saranac Laboratories as they related to the state of medical knowledge at that time. This defendant believes that Dr. Cimino is of the opinion that prior to the 1960's the state of the medical art was that exposure to large amounts of asbestos over an extended period of time could cause asbestosis; however, there was an accepted, safe level of exposure below which there was no risk of harm; that this level was accepted by the medical and scientific community; and that there was no acceptance of a link between asbestosis and mesothelioma or any form of cancer until the 1960's. The opinions of Dr. Cimino are based upon his training in medicine, his extensive professional qualifications, his research in pulmonary pathology and his review of the relevant medical literature.

Warren Cole
Pannell, Kerr & Forster
5847 San Felipe, Suite 2300
Houston, TX 77057
(713) 780-8007

Mr. Cole is an accountant. He may testify regarding the percentages or amounts of the various asbestos-containing products that were used at the various locations where the plaintiff/decedent claimed exposure to such products.

Dr. William S. Cole
821 Sunnbrook
Melbourne, Florida 32935

Dr. Cole is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Cole may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Cole may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Cole in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Cole's education and professional experience.

Mr. John E. Craighead
Department of Pathology
University of Vermont
Burlington, Vermont 05405
(802) 656-2210

Dr. Craighead is a pathologist and the former Chairman of the Department of Pathology at the University of Vermont College of Medicine. Dr. Craighead is Board Certified in Anatomic and Clinical Pathology by the American Board of Pathology. He will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Craighead's mental impressions and opinions and a summary of the basis for them are as follows. Dr. Craighead will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation

of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those employed during the Second World War. Thus, in 1965 when the first significant series of publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's when Dr. Craighead was training in Pathology in Boston, an urban community where significant ship building activity had occurred during the Second World War. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema)-- the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy.

No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered *a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Craighead may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Craighead may provide testimony regarding his examination of plaintiffs' medical records and pathology material. Dr. Craighead may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Craighead may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. Dr. Craighead may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Craighead in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Craighead's education and professional experience.

Dr. George L. Delclos
6550 Fannin, #2403
Smith Tower
Houston, TX 77030
(713) 790-6250

Dr. Delclos is a medical doctor. Dr. Delclos will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence

of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Delclos will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Delclos will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Delclos will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including. but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Delclos mental impressions and opinions and a summary of the basis for them are as follows. Dr. Delclos will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that

are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those employed during the Second World War. Thus, in 1965 when the first significant series of publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which

an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

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among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Delclos may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Delclos may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Delclos may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Delclos in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Dr. Harry Demopoulos
New York University Medical Center
550 First Avenue
New York, NY 10016
(212) 340-6314

Dr. Demopoulos will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the

respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Demopoulos will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Demopoulos will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Demopoulos will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Demopoulos mental impressions and opinions and a summary of the basis for them are as follows. Dr. Demopoulos will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an

extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

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Dominick J. DeSalvo
Philip Services Corporation
Fourth Gateway Center 12th Floor
Pittsburgh, PA 15222
(412) 771-4475

Mr. DeSalvo is an expert in the design, construction, and reconstruction of steel mills, including the use of asbestos in the construction and reconstruction of steel mills.

Dr. Scott R. Donaldson
North Texas Pulmonary Associates
375 Municipal Drive
Suite 140
Richardson, TX 75080
(972) 680-0666

Dr. Donaldson is a medical doctor. Dr. Donaldson will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

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In addition, Dr. Donaldson may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Donaldson may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of

asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Donaldson may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Donaldson in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

William L. Dyson, Ph.D., CIH
Workplace Hygiene, LLC
1022 Jefferson Road
P.O. Box 49176
Greensboro, NC 27410
(336) 297-1642

Dr. Dyson is an industrial hygienist who will testify concerning the state of the knowledge concerning industrial hygiene practices concerning asbestos as it has existed from time to time. Dr. Dyson may also give testimony about the historical "state-of-the-art", the development of medical knowledge about asbestos, and presence or absence of medical consequences relating to low dose exposure to asbestos emanating from asbestos-containing products. He may offer general testimony relating to the development of asbestos related disease, cigarette smoking, cancer of various organs, pneumonia, chronic obstructive lung disease, the pathology of cigarettes and asbestos, the pathogenesis of cigarette related diseases, and the pathogenesis of asbestos related diseases. Dr. Dyson may also testify generally about specific abnormalities that might be in the medical records of the decedent. Dr. Dyson may also testify about the presence or absence of health disease or health risks associated with exposure to low levels of asbestos emanating from asbestos containing products. Dr. Dyson may also testify specifically about diseases, such as chronic obstructive pulmonary disease, even though he may not have seen plaintiff, or reviewed plaintiff's medical records.

Dr. Charles Henry Drummond, III
Department of Ceramic Engineering
Ohio State University
2041 College Road
Columbus, OH 43210
(614) 292-6732

Dr. Drummond is an associate professor in the Department of Ceramic Engineering at Ohio State University. He is expected to testify regarding the physical characteristics of asbestos-containing products as well as the history and feasibility of substitute ingredients.

William Emory, M.D.
Ochsner Clinic
1514 Jefferson Highway
New Orleans, LA 70121
(504) 842-4111

Dr. Emory is a medical doctor. He may testify regarding the medical condition of the plaintiff and about asbestos-related diseases.

Robert E. Farris, Ph.D.
511 West 84th Drive
Merriville, Indiana 46410

Robert E. Farris has expertise regarding the physical characteristics, propensities, and behavior of certain products at issue during exposure to elevated temperatures.

Dr. Allan Feingold
Chief of Pulmonary Medicine
South Miami Hospital
6200 SW 73rd Street
Miami, FL 33143
(305) 662-8145

Dr. Feingold is a physician who specializes in pulmonary medicine and internal medicine. Dr. Feingold has written and lectured on asbestos medicine issues. He is expected to testify regarding the historical development of medical knowledge regarding adverse health effects associated with asbestos and regarding the studies commissioned the Saranac Laboratories in the 1940s and 1950s. He may also testify regarding the general nature, causes, diagnosis, and clinical course of asbestos-related diseases and conditions as well as issues pertaining to plaintiff's diagnosis, the medical causation of plaintiff's condition, and plaintiff's care, prognosis and damages.

Dr. David Feigin
Walter Reed Medical Hospital
7000 Georgia Avenue, NW
Department of Radiology
Building 2, Suite 1X65
Washington, D.C. 20307
(800) 759-8888 (1653317)

Dr. Feigin is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Feigin may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Feigin may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Feigin in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Feigin's education and professional experience.

Henry C. Field, M.S.
1304 Wren Place
Virginia Beach, VA 23451
(757) 428-7073

Mr. Field will testify about the subject of naval architecture and specifically as to U.S. Naval vessel construction, overhaul, repair and maintenance. He is familiar with Navy manuals and specifications for construction and overhaul and repair of U.S. Navy vessels. He is knowledgeable concerning the use of asbestos-containing materials on board ship, work practices regarding the use of insulation products and the types of asbestos products required by various Navy specifications and manuals. He is familiar with and will testify concerning Navy and military specifications for the types and quantities of materials used in naval construction and repair including insulation materials. He also will testify as to the specifications, including the types and grades, which certain types of pipe covering and block met and the Navy testing procedures and test results related to the approval of products to be used on naval vessels.

William Z. Fluck
122 Inverness Avenue
Lompoc, CA 93436
(805) 733-2640

Mr. Fluck was employed in the 1940s as an industrial hygienist by the Industrial Hygiene Unit of the Wisconsin State Board of Health. He may testify concerning the state of knowledge at various times of the effect of asbestos exposure; application and interpretation of the American Conference of Governmental Industrial Hygienists ("ACGIH") historical standards for the safe level of exposure to asbestos dust (i.e., "maximum allowable concentration" or "threshold value"); the ACGIH standards in effect at various times and the interrelationship of those standards with the concept of time weighted average; testing of industrial sites, historically accepted safety practices; the need for warnings; and related topics. Mr. Fluck may also testify concerning his personal involvement with a 1940s dust study.

Dr. Gregory Foster
North Texas Pulmonary Associates
375 Municipal Drive, Suite 140
Richardson, TX 75080
(972) 680-0666

Dr. Foster is a medical doctor. He may testify regarding his review of the medical records and/or his examination and diagnosis of the physical condition of the plaintiff(s) and the relationship, if any, to the plaintiff exposure to asbestos. It is expected that he will support Defendants' position that plaintiffs alleged exposure to certain products made by the former Kaiser Refractory Divisions was not a cause of plaintiffs' alleged injuries. It is expected that if his testimony is needed at trial, he will have been provided all available medical records regarding the plaintiff.

Dr. Foster will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Foster will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Foster will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Foster will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Foster mental impressions and opinions and a summary of the basis for them are as follows. Dr. Foster will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation

of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those employed during the Second World War. Thus, in 1965 when the first significant series of publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the

cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH.

This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Foster may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Foster may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Foster may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Foster in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Douglas P. Fowler, Ph.D.
Fowler Associates
Bayport Marina Plaza
643 Bair Island Road, Suite 305
Redwood City, CA 94063
(415) 369-3955

Dr. Fowler is an industrial hygienist. He may testify about levels of asbestos exposure experienced in various occupations and trades, the fiber emitting propensities of various asbestos-containing products, levels of exposure experienced by difference occupations, factors affecting levels of exposures, and industrial hygiene practices. Dr. Fowler may be called upon in specific cases to do a retrospective exposure analysis to determine the likely levels of asbestos exposure, if any, experienced by particular plaintiffs and/or plaintiffs' decedents. Dr. Fowler may testify as to the state of the art during the 1940's, 1950's, and 1960's, and as to the hazards associated with use of asbestos containing products. He may

testify regarding the state of scientific and medical knowledge during the time asbestos was used commercially in high temperature insulation products and the availability and feasibility of using materials other than asbestos in high temperature insulation products during the 1940's, 1950's, and 1960's. Dr. Fowler may also be called upon to offer rebuttal testimony in response to testimony offered by plaintiffs' experts. Dr. Fowler may also testify to the availability, or lack thereof, of substitutes for asbestos in high temperature/thermal insulating products. His opinions are set forth in depositions and transcripts of testimony he has given at trial, copies of which this defendant believes are in the possession of plaintiffs' counsel.

Edward A. Gaensler, M.D.
Professor of Surgery and Physiology
Boston University Medical Center
School of Medicine
70 Concord St.
Boston, MA 02118
(617) 638-4630

Dr. Gaensler is a thoracic surgeon. He will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals. Dr. Gaensler will describe his original research into the field of asbestos-related disease as part of the foundations for the opinions he will offer. Dr. Gaensler will also testify regarding the state and development of scientific and medical knowledge regarding health hazards associated with asbestos.

Dr. Gaensler also is expected to provide testimony concerning the anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. David Garabrant
1420 Washington Heights
Room 6017
Ann Arbor, MI 48109-2029
(734) 668-0381 (home)

Dr. Garabrant is a medical doctor. He may testify regarding matters relating to epidemiology of asbestos-related diseases in steel workers.

Dr. Joe G. N. Garcia
Department of Medicine
Wilshard Memorial Hospital
Indianapolis, Indiana 46202

Dr. Garcia will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Garcia will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Garcia will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Garcia will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify

about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Garcia mental impressions and opinions and a summary of the basis for them are as follows. Dr. Garcia will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

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of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease.

Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Garcia may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Garcia may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Garcia may also provide testimony

regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Garcia in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Dr. Bernard Gee
Yale University
333 Cedar Street
New Haven, Connecticut 06510
(203) 785-3627

Dr. Gee will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Gee will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Gee will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to

asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Gee will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Gee mental impressions and opinions and a summary of the basis for them are as follows. Dr. Gee will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

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exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent.

Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Gee may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Gee may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Gee may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Gee in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Dr. Allen Goldstein
Pulmonary Medicine Associates, P.C.
860 Montclair Road, Suite 862
Birmingham, Alabama 35213
(205) 802-7676

Dr. Goldstein is a pulmonologist. He may testify about the medical condition of the plaintiff(s) based on his examination of the plaintiff(s) and/or review of the plaintiff(s)' medical records, and about asbestos related diseases.

Leonard J. Goldwater, M.D.
Route 3, Box 197
Chapel Hill, NC
(919) 933-9718

Dr. Goldwater has more than 50 years of experience teaching medicine and is certified in both internal and occupational medicine. In addition to the M.D. degree, he has a Master of Public Health degree and has worked as a U.S. Navy Industrial Health Officer. He may testify about the state-of-the-art of medical and scientific knowledge, the history and knowledge of asbestos-related disease and industrial hygiene practices.

Barry Gordon, M.D., Ph.D.
Department of Neurology & Cognitive Science
The Johns Hopkins University
Baltimore, MD
(410) 325-4200

Dr. Gordon is Professor of Neurology and Cognitive Science at The John Hopkins University. He is also the director of The Memory Clinic at Johns Hopkins. Dr. Gordon will testify about what is scientifically known about human memory. In particular, he will discuss various factors that need to be taken into account in determining whether alleged "memories" are likely to be correct, how memories are altered, distorted. and even constructed, and the relationship between confidence in a memory and the accuracy of that memory.

Dr. Milton Gray
1111 Hermann Drive
Houston, Texas 77004
(713) 874-0526

Dr. Gray is a medical doctor and a board certified specialist in internal medicine. His testimony will discuss the structure and function of the respiratory system, the effects of cigarette smoking, and the diseases of the lungs, including asbestos-related diseases.

Joseph D. Green, CIH, CSP, LIH
P.O. Box 2430-1425
Pensacola, Florida 32513
(800) 422-4663

Mr. Green is an industrial hygienist. He may testify about levels of asbestos exposure experienced in various occupations and trades at various premises at issue in this case, levels of exposure experienced by different occupations there, factors affecting levels of exposure, and industrial hygiene practices.

Dr. Donald Greenberg
One Baylor Plaza
Baylor College of Medicine
Houston, Texas 77030
(713) 799-4661

Dr. Greenberg will testify about asbestos-related diseases and the effect of other substances, such as cigarette smoke, upon the respiratory system.

Andrew T. Haas
1300 Connecticut Avenue, N.W.
Washington, D.C. 20036

Mr. Haas is the General President of the Asbestos Workers International Union. Mr. Haas will testify about the union's knowledge of the potential hazards of asbestos fibers, and the dissemination of information about potential health problems from the union to its members.

Dr. Kathyrn Hale
Baylor College of Medicine
Texas Medical Center
Department of Internal Medicine and Critical Care Section
6500 Fannin
Smith Tower #1236
Houston, Texas 77030
(713) 790-2076

Dr. Hale is a specialist in the area of respiratory diseases. Dr. Hale may testify as to all matters pertaining to her examination of plaintiff and/or review of plaintiffs medical records, x-rays and reports and supplemental reports of plaintiffs' experts; any communications with plaintiff or plaintiffs family members; the diagnostic criteria used to diagnose asbestos-related diseases; her opinions as to whether plaintiff suffers from asbestos-related diseases and the basis of such opinions; plaintiffs medical conditions. Dr. Hale may also testify regarding the anatomy and function of the respiratory and circulatory systems; the symptomatology, disease process and diagnosis of asbestosis and cancer of the respiratory systems, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos in the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases with non asbestos-related disease; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; the evolution of the medical community's awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure. In addition, Dr. Hale may also offer various opinions relevant to a *Daubert/Harner/Robinson* Analysis.

Dr. Hale may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to friction materials and their alleged propensity to release fibers.

Dr. Hale may further testify regarding radiology as a diagnostic aid in asbestos-associated disease as well as to her review and opinions of the radiographic findings and the correlation of those findings with plaintiffs' medical records, work history and other diagnostic studies.

The observations and opinions offered by Dr. Hale in this matter will be based on her review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Hale's education and professional experience.

Raymond D. Harbison, Ph.D.
The Progress Center, Room N103
One Progress Blvd., Box 13
Alachua, FL 32615
(904) 462-4040

Dr. Harbison currently teaches at the University of Florida College of Medicine. He may briefly describe or explain the disciplines of Pharmacology and Toxicology. Dr. Harbison may testify about the concepts of risk assessment, toxicity, dose response, threshold limit value, and carcinogenicity. Dr. Harbison is expected to testify about the Saranac Laboratory studies, including the significance of the methodology of the studies, the results of the studies, and the conclusions of the studies. Dr. Harbison is also excepted to testify that it was believed that at that time individuals who were exposed to asbestos dust levels below the threshold limit value of five million particles per cubic foot were not at risk of contracting asbestos related disease. The opinions of Dr. Harbison are based upon his training and experience, and his extensive review of the Saranac documents and the Hazard deposition.

R. Brent Harrison, M.D.
The University of Mississippi Medical Center
Department of Radiology
2500 North State Street
Jackson, MS 39216
(601) 984-2550

Dr. Harrison is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Harrison may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Harrison may also be asked to respond to the testimony of certain witnesses offered at the

time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Harrison in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Harrison's education and professional experience.

Willis G. Hazard
(Deceased)

Mr. Hazard may testify by deposition about the corporate history, operations, products, and product testing of Owens-Illinois, Inc.

Dr. Peter Heidbrink
Southwest Pulmonary Associates
St. Paul Professional Building #2
5959 Harry Hines Blvd., Suite 711
Dallas, TX 75235
(214) 879-6555

Dr. Heidbrink will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Heidbrink will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Heidbrink will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the

human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Heidbrink will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Heidbrink mental impressions and opinions and a summary of the basis for them are as follows. Dr. Heidbrink will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are tvpical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those employed during the Second World War. Thus, in 1965 when the first significant series of

publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who

were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Heidbrink may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Heidbrink may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Heidbrink may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Heidbrink in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Dr. Michael D. Henderson
330 Rittirnan Road
San Antonio, Texas 78209

Dr. Henderson may testify regarding the relationship of asbestosis and smoking to the development of cancer. Dr. Henderson may also testify concerning the incidence of lung cancer among individuals with asbestosis or exposure to asbestos-containing insulation products. Dr. Henderson may also testify concerning general pathology of the plaintiff(s) and/or plaintiffs decedent.

Dr. Pat Hessel
Alberta Asthma Center
P.O. Box 4033
Edmonton, Alberta T6E 6K2
(403) 470-0081

Dr. Hessel is a medical doctor. He may testify as to the epidemiology of asbestos-related diseases among various populations and matters relating to epidemiology.

Dr. Elliott Hinkes, M.D.
301 N. Prairie Avenue
Suite 311
Inglewood, CA 90301
(805) 259-2990

Dr. Hinkes is a Board Certified Oncologist and Hematologist. Dr. Hinkes will testify generally about the risks of asbestos-related cancer, depending upon different levels of exposure, periods of exposure and occupations, whether asbestos exposure is medically and scientifically linked on a cause-and-effect basis with various types of cancer, whether exposure to specific amounts of asbestos is a substantial factor in causing the particular cancer, risks of cancer from carcinogens other than asbestos, including the risk of cancer from cigarette smoking and other industrial pollutants, and changes in the risk of cancer resulting from the cessation of cigarette smoking or cessation of asbestos exposure. Dr. Hinkes will offer his opinion about whether lung cancer in the absence of asbestosis in a particular individual can be causally linked to asbestos exposure, whether asbestos exposure is causally linked to cancers other than lung cancer and mesothelioma, and the fiber type of asbestos causally linked to mesothelioma. Where appropriate, Dr. Hinkes will also testify to an apportionment of causation between asbestos exposure and cigarette smoking. Dr. Hinkes will also testify regarding the state and development of scientific and medical knowledge regarding health hazards associated with asbestos.

Horton Corwin Hinshaw, Sr.
Retired Emeritus Professor of Medicine
University of California - School of Medicine
P.O. Box 546
Belvedere, California 94920
(415) 435-9512

Dr. Hinshaw is expected to provide testimony concerning the anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

William Hughson, M.D.
UCSD Center for Occupational and Environmental Medicine
114 West Arbour Drive
San Diego, California 92103
(619) 294-6206

Dr. Hughson may testify as to the state-of-the art knowledge concerning the health effects of asbestos exposure among companies engaged in the manufacturing of electrical equipment, and component parts of such equipment, during the relevant time periods of plaintiff's employment.

Dr. Hughson is a pulmonologist who may testify to the standards for diagnosing asbestos-related disease, including but not limited to discussion of chest x-ray, pulmonary function, pathological and clinical techniques. He may also discuss the literature relative to diagnosis of asbestos-related diseases and the techniques and literature on the diagnosis of other diseases suffered by plaintiff.

Dr. Hughson may also review the pertinent medical records and pieces of medical evidence, including but not limited to medical records from health care providers, chest x-rays, pulmonary tests, and other types of evidence, and offer his opinions on the medical conditions of the plaintiff based on such review.

Dr. Hughson may also offer his opinion on other simulating or coexisting conditions, including but not limited to cardiac, congenital, or neurological disorders or diseases of other organ systems.

His testimony may include a medical presentation of lung diseases including but not limited to those caused by tobacco abuse, other inhaled agents, heredity, or environment. In addition, Dr. Hughson may discuss the epidemiology of asbestos-related disease and other diseases which the plaintiff may have suffered from, including but not limited to analysis of plaintiff's exposure to asbestos and other potential agents, discussion of the latency of exposure to asbestos and other potential agents, discussion of the latency of asbestos and other diseases, discussion of the contribution of this defendant's dust, if any, to the illness of the plaintiff, discussion of various models of risk versus time, duration, and extent of exposure, and other related topics.

He may also discuss the prognosis, risk of cancer of various forms, risk of progression, including but not limited to discussion of risk of cancer from asbestos versus tobacco; risk of cancer from heredity and environment; and risk of death or impairment from other causes. An analysis of plaintiff's work environment, work history, occupational history, including but not limited to discussion of the significance, intensity, and disease causing potential arising from exposure to this defendant's products versus other types of exposure may also be discussed.

Dr. Hughson may discuss various concepts such as dose response and fiber years. He may testify concerning the levels of asbestos fibers necessary to cause, or create a risk of causing, diseases associated with asbestos exposure, and will compare those levels to the levels encountered during plaintiffs' alleged use of asbestos-containing products.

Dr. David Jarvis
First Medical Group
2400 Patterson Street, Suite 400
Physicians Park
Nashville, Tennessee 37203
(615) 342-5900

Dr. Jarvis is a pulmonologist. He may testify about the medical condition of the plaintiff(s) based on his examination of the plaintiff(s) and/or review of the plaintiff(s)' medical records, and about asbestos related diseases.

Dr. Stephen Jenkinson
UT Health Science Center at San Antonio
7703 Floyd Avenue Drive
San Antonio, Texas 78284-7885
(210) 617-5256

Dr. Jenkinson will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Jenkinson will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Jenkinson will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods

of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Jenkinson will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Jenkinson mental impressions and opinions and a summary of the basis for them are as follows. Dr. Jenkinson will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those

employed during the Second World War. Thus, in 1965 when the first significant series of publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there

were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time. Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Jenkinson may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Jenkinson may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Jenkinson may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Jenkinson in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Robert N. Jones, M.D.
Tulane University School of Medicine
Pulmonary Diseases Section
1700 Perdido Street
New Orleans, LA 70112
(504) 586-3840

Dr. Jones is a medical doctor. He may testify regarding the medical condition of the plaintiff and about asbestos-related diseases in general.

Gerald Kerby, M.D.
University of Kansas Medical Center
3900 Cambridge
Kansas City, Kansas 66103
(913) 588-6044

Dr. Kerby will testify about the anatomy and function of the respiratory and circulatory system, the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the

differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Arthur M. Langer, Ph.D.
Environmental Sciences Laboratory
Brooklyn College of the City University of New York
Brooklyn, New York 11210
(718) 951-4242

Dr. Langer is Professor and Director of the Environmental Sciences Laboratory of the Brooklyn College of the City University of New York. He also serves as Deputy Director for the Center for Applied Studies of the Environment within the Applied Sciences Coordinating Institute of City University. He has a Ph.D. in geology from Columbia University and over the years has specialized in the carcinogenity, or lack thereof, of inorganic naturally occurring substances in the environment. His research in this area has focused in particular upon asbestos.

Dr. Langer may testify generally concerning asbestos, different fiber types and the various means by which humans have been and continue to be exposed to asbestos. He may testify concerning the relative carcinogenity of different types of asbestos fibers and may analyze the scientific and medical literature concerning the relationship between exposure to chrysotile asbestos and the development of mesothehoma.

Dr. Langer also may testify concerning the development of knowledge in the scientific and medical communities regarding asbestos exposure and disease. In this regard, he may explain the historical uses of asbestos and the industries upon which scientific and medical studies first focused in attempting to understand the relationship between asbestos exposure and the development of disease in humans. He is expected to testify that the industries that were regular and heavy users of refractory products, including in particular steel mills, were not the focus of any such studies.

Dr. Langer also may explain the aerodynamic and thermodynamic characteristics of asbestos, including thermal destruction and/or transformation of asbestos when exposed to the elevated temperatures typically encountered in furnaces and vessels designed to hold or transport hot metals.

Dr. Langer also may comment upon contentions asserted by any plaintiffs' experts regarding the development of knowledge concerning the relationship between asbestos exposure and disease in humans.

Dr. William L. Lea

Dr. Lea was Director of the Industrial Hygiene Unit of the Wisconsin State Board of Health in the 1950s and 1960s. He may testify concerning the state of knowledge at various times of the effect of asbestos exposure; application and interpretation of the American Conference of Governmental Industrial Hygienists ("ACGIH") historical standards for the safe level of exposure to asbestos dust (i.e., "maximum allowable concentration" or "threshold value"); the ACGIH standards in effect at various times and the interrelationship of those standards with the concept of time weighted average; testing of industrial sites, historically accepted safety practices; the need for warnings; and related topics.

James E. Lockey, M.D., M.S.
Institute of Environmental Health
University of Cincinnati Medical Center
Clinical Studies Division
5251 Medical Science Building
M.L. 182, 231 Bethesda Avenue
Cincinnati, OH 45267-0182
(513) 558-0030

Dr. Lockey will testify concerning the state of the available medical knowledge regarding asbestos-related disease at the relevant historical periods of time. His opinions are set forth in depositions and transcripts of testimony he has given at trial, copies of which this defendant believes are in the possession of plaintiff's counsel. Included in his testimony may be discussion of the respiratory system asbestos-related diseases, and the effect of other substances on the respiratory system.

William A. Lowell
Augusta, ME
(207) 622-5479

Mr. Lowell may testify as to U.S. Naval vessel construction, overhaul, repair and maintenance. He is familiar with Navy manuals and specifications for construction and overhaul and repair of U.S. Navy vessels. He is knowledgeable concerning the use of asbestos-containing materials on board ship, work practices regarding the use of insulation products and the types of asbestos products required by various Navy specifications and manuals. He is familiar with and may testify concerning Navy and military specifications for the types and quantities of materials used in naval construction and repair including insulation materials. He also may testify as to the specifications, including the types and grades, which

various products met, and the Navy testing procedures and test results related to the approval of products to be used on naval vessels. Mr. Lowell may testify regarding departure reports and ship histories regarding specific ships. Mr. Lowell is also of the opinion that all insulation products used on Navy ships had to be approved for use by the Navy.

Gerald L. Meyers, M.D.
Alta Bates Hospital
3001 Colby Plaza at Ashby
Room 2737
Berkeley, CA 94705
(510) 204-1896

Dr. Meyers is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Meyers may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Meyers may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Meyers in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Meyers's education and professional experience.

Harry M. Mikami, Ph.D
Deceased
(By deposition in Sparrows Point Steel Plant Asbestos Cases, United States District Court - Maryland, BML-3 (7/31/85; 6/27/86))

Harry Mikami had expertise regarding the physical characteristics, propensities, and behavior of certain products at issue, during exposure to elevated temperatures.

Dr. William K. C. Morgan
Director, Chest Diseases Unit
University Hospital
University of Western Ontario
P. O. Box 5339, Postal Station A
London, Ontario N6A 5A5 Canada
(519) 663-3000

(If Dr. Morgan is unavailable to testify live, testimony may be by transcription taken December 18, 1990 in the trial of Faye Skadden and Joseph Walters, Case Nos. H-93455 and H-89278 in the Supreme Court of the State of New York, Eight Judicial District.)

Dr. Morgan is a professor of medicine and director of chest diseases services at the University of Western Ontario. He was educated in England and Scotland, and among other appointments, is a member of the Advisory Board for Occupation Health & Safety Resource Center at the University of Western Ontario. He has knowledge of the pathology, diagnosis, testing and causation of pulmonary and related diseases, including mesothelioma, lung cancer and asbestosis. He will testify about the state-of-the-medical art as it relates to knowledge of health hazards associated with exposure to asbestos dust, based on his review of asbestos-related literature and his own experience. He may testify about the plaintiffs medical condition.

Kenneth W. Nelson
1894 Millcreek Way
Salt Lake City, UT 84106
(801) 485-9745

Mr. Nelson was an industrial hygienist trained by the U.S. Navy in 1942. He can testify as to the knowledge of the government and various shipyards with respect to the asbestos health hazards and the methods for controlling them.

Dr. Robert M. O'Neal
1910 King Bee Road
Perkinston, MS 39573
(601) 928-4972

Dr. O'Neal is a clinical pathologist and will testify regarding general pathology and the pathology of the plaintiffs and/or plaintiff's decedent.

John A. Pendergrass CIH, CSP, PE
Pendergrass Associates
6700 Milkhouse Court
Mobile, Alabama 36695-2709
(334) 607-0946

Mr. Pendergrass is a certified industrial hygienist with OSHA experience who will testify from an industrial hygiene point of view the state of the medical and scientific knowledge regarding asbestos particularly in regard to the time period involved during which the Plaintiff was allegedly on the premises of Defendants in this case. The subject matter will also include the use of asbestos during this timer period, its importance, the lack of substitute products, the employer's responsibility pre- and post-OSHA, and the other matters described in the report attached hereto. He will also testify as to the role of plaintiff's employer as a supplier of asbestos products and their responsibility to provide premises owners with knowledge of the known hazards of the products they were selling and installing to the end users, the premises owners. He will also testify that based on the state of the knowledge and judgment as it has developed over time that Defendants acted appropriately in the circumstances pertaining to their relationship with plaintiffs and their employer as a product supplier.

Jack E. Peterson, C.E., C.I.H., Ph.D.
Peterson Associates
2830 Via Vieyas Oeste
Alpine, CA 91901
(619) 445-9668

Dr. Peterson is an expert in industrial hygiene and engineering. He is expected to testify regarding the proper use and effectiveness of industrial hygiene procedures, the proper use and limitations of warnings, the physical characteristics of various asbestos-containing products, and the history and feasibility of substitute ingredients.

Dr. Stanley M. Pier
Research Statistics, Inc.
5326 Dora Street
Houston, Texas 77005
(713) 522-0633

Dr. Pier is an expert in industrial hygiene and occupational medicine. He may testify about toxicology and the nature and cause of plaintiff's medical conditions, if any; other alternative causes of certain plaintiff's medical condition; and issues raised by plaintiff's expert witnesses whose opinions have not been revealed at this time.

A. Mitchell Polinsky
Stanford University
Professor of Law and Economics
Crown Quadrangle
Stanford, CA 94306-8610
(650) 723-2300

Dr. Polinsky is an expert who will testify about the inappropriateness of punitive damages in this and similar cases based upon research he and others have conducted.

James O. Rasmuson, Ph.D., C.I.H.
Chemistry and Industrial Hygiene, Inc.
4251 Kipling, Suite 110
Wheat Ridge, CO 80033
(303) 420-8242

Dr. Rasmuson has a Ph.D. in chemistry and is a certified industrial hygienist. Dr. Rasmuson is expected to testify concerning the development of industrial hygiene in the United States, the enactment of OSHA and regulations concerning use of asbestos in the workplace, the role of the employer or contractor under OSHA in protecting employees from workplace hazards and the implementation and effect of various OSHA regulations. Dr. Rasmuson. is also expected to explain dose response as a basic consideration in the practice of industrial hygiene and its importance in reaching reliable attribution of cause of disease. Dr. Rasmuson may also testify concerning the development of knowledge over time concerning diseases caused or potentially caused from long term exposure to excessive levels of respirable asbestos fibers. He may reconstruct the levels and frequency of exposure over time to different types of asbestos-containing products of the plaintiff (or decedent) in order to evaluate the potential of all or any of those exposures for causing asbestos-related disease.

Dr. Lee B. Reichman
Profession of Medicine
New Jersey Medical School
2 Brook Road
Tenafly, New Jersey 07670
(973) 972-2500

Dr. Reichman is expected to provide testimony concerning the anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence

of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Jon Ritter
Barnes Jewish Hospital
Surgical Pathology, 3rd Floor, Peters Bldg.
One Barnes Jewish Hospital Plaza
St. Louis, MO 63114
(314) 362-0105

Dr. Ritter is a medical doctor. Dr. Ritter may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may testify regarding the pathology of the plaintiffs and/or plaintiffs' decedents, causation of the plaintiffs' and/or plaintiffs' decedents' illness and asbestos-related diseases. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risks from asbestos containing products. Dr. Ritter may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

Robert M. Ross, M.D., FCCP
17030 Nanes Drive, Suite 214
Houston, Texas 77090-2504
(281) 440-8851

Dr. Ross is Board Certified in Pulmonary Disease. Dr. Ross may testify as to all matters pertaining to his examination of the plaintiff and plaintiff's medical records; any communications with the plaintiff or plaintiff's family; review of x-rays of the plaintiff; the diagnostic criteria used to diagnose asbestosis; his opinion as to whether plaintiff suffers from asbestos related disease and the basis for such opinion; the plaintiff's current medical condition and his prognosis in regard to the plaintiff's medical condition. His opinions are set forth in depositions and transcripts of testimony he has given at trial, copies of which this defendant believes are in the possession of plaintiff's counsel.

Dr. Ross may be called to testify with respect to the anatomy and function of the human respiratory system, pulmonary function testing, diseases allegedly associated with exposure to asbestos and the development of related scientific and medical knowledge. Dr. Ross may also be called to testify with respect to medical condition and causation in these cases.

Dr. Ross may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of expose to friction materials and their alleged propensity to release fibers.

Dr. Ross may further testify regarding radiology as a diagnostic aid in asbestos-associated disease as well as to his review and opinions of the radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history and other diagnostic studies.

The observations and opinions offered by Dr. Ross in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Ross' education and professional experience.

Mr. Wayne Ruhter
Consulting Economist
Sartain & Company
3811 Turtle Creek Centre
Suite 520
Dallas, Texas 75219

Mr. Ruhter is an economic consultant and may testify regarding the economic loss incurred by the death of or alleged injury to the plaintiff(s).

Mr. John Sartain
Consulting Economist
Sartain & Company
3811 Turtle Creek Centre, Suite 760
Dallas, TX 75219
(214) 521-0760

Mr. Sartain is an economic consultant and may testify regarding the economic loss incurred by the death of or alleged injury to the plaintiff(s).

Dr. James Robert Shepherd, III
University of Texas Health Center at Tyler
Department of Radiology
Box 2003
Tyler, TX 75710
(903) 877-7100

Dr. Shepherd is a radiologist and certified "B" Reader and may provide testimony with respect to radiology as a diagnostic aid in asbestos-associated disease as well as his review and

opinions of the plaintiffs' radiographic findings and the correlation of those findings with plaintiffs' or plaintiffs' decedents' medical records, work history, and other diagnostic studies.

Dr. Shepherd may further provide testimony based on his review of the medical and scientific literature that plaintiffs and others are not at an increased risk to develop asbestos-related diseases as a result of their work on or around certain asbestos-containing products. Dr. Shepherd may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from the plaintiffs' experts regarding the alleged hazards of exposure to certain asbestos-containing materials and their alleged propensity to release fibers.

The observations and opinions offered by Dr. Shepherd in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Shepherd's education and professional experience.

Russell P. Sherwin, M.D.
Department of Pathology
2011 Zonal Avenue
H.M.R. - 201
Los Angeles, CA 90033
(213) 257-3599

Dr. Sherwin may testify regarding the pathology of the plaintiff and/or plaintiff's decedent.

Dorsett Smith, M.D.
4301 Colby, Suite 201
Everett, Washington 92203
(206) 259-5171

Dr. Smith is expected to provide testimony concerning the anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Lewis Solmon
Associate Dean
Graduate School of Education
U.C.L.A., 308 Moore Hall
Los Angeles, CA 90024
(310) 825-8326

Dr. Solmon is an expert who will testify about the historical sales and market shares of asbestos insulation manufacturers.

Roy Steinfurth
Room 505, Machinist Building
1300 Connecticut Avenue, N.W.
Washington, D.C.

As the Administrator of the Asbestos Worker's International Health Hazards Program, Roy J. Steinfurth's testimony is offered to show that the insulators' union was, or should have been, aware of hazards associated with inhalation of asbestos fibers, and that this information was distributed to the union members through various means, including the "green sheets."

Dr. Paul Stevens
Professor of Medicine
Baylor College of Medicine
6516 Bernter
Houston, TX 77030
(713) 798-4951

Dr. Stevens is a specialist in the area of respiratory diseases. Dr. Stevens will testify about anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Stevens will testify about the effects of pleural changes on lung function, the progression of asbestos-related lung disease, the risks of lung cancer in asbestos exposed individuals with and without asbestosis, and the risks of cancers other than lung cancer and mesothelioma among asbestos exposed individuals.

Dr. Stevens will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition.

Dr. Stevens will testify generally about the evolution of asbestos disease; the pathology of asbestos-related diseases; the "state-of-the-art" of asbestos-related diseases; and, will testify about other areas of pulmonary pathology including, but not limited to, emphysema, carcinomas, and related matters.

The general substance of Dr. Stevens mental impressions and opinions and a summary of the basis for them are as follows. Dr. Stevens will provide and overview of the history of asbestos utilization in this country for industrial purposes and to relate, in general, the developing concepts regarding its potential role in the causation of disease. The discussion is divided into three units related to the three disease processes attributable to asbestos, or at least some forms of asbestos.

Asbestosis: This disease process is a scarring of the lung which stimulates scarring due to a variety of causes, some of which are unknown. Thus, asbestosis in many respects is similar clinically and pathologically to the fibrotic disease of the lung that occurs in persons who have no environmental exposure to dusts. It develops over a protracted period of exposure and in only a small proportion of the numerous individuals who work with the material. In 1993, we consider asbestosis to be the result of exceedingly heavy exposure to asbestos over an extended period of time. This was the concept that evolved in the early 1900's when asbestos first was used in large amounts in industry.

Historically, asbestosis as a disease process was first recognized in 1900 at autopsy. There was little new information in the literature until the mid 1920's when the asbestos bodies that are typical of the disease were described and more detailed microscopical features of the disease were noted by pathologists. In the -1920's and 1930's, asbestosis continued to be a disease process associated with heavy and prolonged exposure to asbestos in an era where industrial dust controls were largely lacking. From a historical perspective, the Second World War is noted as a landmark, for during the period of hostilities, asbestos was used widely in all types of ships and war vehicles. Consumption of asbestos in this country increased exponentially and few, if any, serious attempts were made to control its use and the inhalation

of the material by workers in the industrial setting. As a consequence of this almost uncontrolled use of asbestos, many cases of asbestosis appeared years after the cessation of hostilities.

In the early 1960's, Dr. Irwin Selikoff and his associates documented the industrial occurrence of this disease process, particularly in insulators. It soon became apparent that the major groups affected were insulators and workers in the ship building industry, particularly those employed during the Second World War. Thus, in 1965 when the first significant series of publications relating asbestos to disease in this country were published, asbestosis was considered a disease process limited to industrial groups, such as insulators who had heavy exposure to asbestos. Little consideration was given whatsoever to exposure occurring in outside air environments or when asbestos was used under controlled situations. In addition, there was no concern with respect to asbestos utilization in situations such as brake shoes, plastering material, electric wire, etc. This was the state of understanding during the period of time in the 1960's. It was only in the 1970's and 80's that concern regarding low levels of asbestos exposure as a cause of asbestosis were voiced by federal agencies. Nonetheless, no definitive epidemiological evidence was available to indicate that asbestosis might be a significant problem for those working with low levels of asbestos or in outside environments. This situation continues today since we continue to recognize asbestosis as being a relatively uncommon condition occurring in individuals whose exposure has been unusually heavy. The list of major industries where asbestosis occurs has grown as we have learned more. We now include individuals who have worked in the asbestos textile industry where the material is readily aerosolized in the working environment and among workers in the mining and milling of asbestos, such as Canadian chrysolite miners and millers. Fortunately, we now are exceedingly cautious in insisting that exposure in these industries is controlled by personal respirator use or industrial controls. Frequently, workers in all types of industries have been shown to exhibit abnormal X-rays, and this, by some, has been falsely interpreted as an asbestos-related disease. Most often, the pulmonary abnormalities in these workers are due to cigarette smoking (fibrosis and emphysema) the major cause of disability among industrial workers.

Lung Cancer: Bronchogenic cancer, a tumor originating from the walls of the airways, is the major cancer occurring in this country among middle-aged men today. It has a high fatality rate and often affects men in the prime of their working life. It is not surprising that concern arose as to the role of asbestos in the genesis of lung cancer. The first reports suggesting this possibility were published in the 1930's and many additional cases were observed in which an asbestos worker who smoked developed the cancer. In 1955, Sir Richard Doll established by epidemiological means a statistically significant relationship between asbestosis and the development of lung cancer. It is important to emphasize that the relationship was based on the disease process asbestosis as demonstrated at autopsy. In 1965, Selikoff and his associates demonstrated a high incidence of lung cancer in workers in trades where exposure was heavy. No attempt was made to define whether or not these individuals had asbestosis. No doubt those that were affected with the cancer often did have asbestosis, whereas in others, the

cancer was related exclusively to cigarette smoking. This was the state of art when Dr. Craighead and his colleagues under-took studies in the early 1970's to elucidate the role of asbestos in lung cancer. These studies clearly showed that asbestos, in and of itself, was not a carcinogen, but in large amounts, enhanced the effects of the polycyclic aeromatic hydrocarbons and other carcinogens in cigarette smoke. This promoter concept is now well-established in the medical literature and relates to the fact that substances such as asbestos, enhance the effects of cigarette smoking but are not the cause of the cancer. Nonetheless, there were epidemiological reports that suggested that individuals with no smoking history who were exposed to asbestos develop lung cancer. No doubt, a few of these instances exist, but there is no clear epidemiological evidence to indicate that asbestos was the responsible agent. Establishment of the promoter concept of carcinogenesis with regard to lung cancer and asbestos awaited definitive studies in the mid- I 980's, the first of which was carried out by Hans Weill and his associates among concrete asbestos workers in New Orleans. These studies and subsequent investigations by Selikoff and his group showed clearly that asbestosis demonstrated radiologically is a necessary precursor for the development of the disease. Asbestosis would appear to be a marker of heavy and prolonged exposure to asbestos as indicated above. The most recent definitive studies by Selikoff and his coworkers which incorporated observations on over 17,000 insulation workers have clearly shown that asbestos exposure in the absence of cigarette smoking cannot be considered a carcinogen. This work was published in abstract form in the late 1980's. In view of these findings, we can consider the lung cancer threat to be limited to those with very heavy and prolonged asbestos exposure in industry, not in those with fight exposure or after outside exposure.

Mesothelioma: Mesotheliomas were first described occurring in members of general population in the 1870's , long before asbestos became a commercially usable industrial product. It was exceedingly rare, pathological curiosity. During the Second World War and after the war, occasional cases of mesothelioma were noted in individuals with asbestosis, but an epidemiological association between the disease and exposure to asbestos was not established until 1960 when studies by Wagner and his associates clearly demonstrated that crocidolite asbestos was responsible for the condition among miners and members of the general population in a unique area of So. Africa. At that time, Wagner showed that amosite asbestos and chrysolite asbestos played no role in the genesis of the disease in So. Africa. Mesotheliomas were next reported in 1965 by Selikoff and his associates among workers heavily exposed to asbestos in the insulation trade. Gradually, additional cases were reported in the medical literature, but few epidemiological studies comprised of large numbers of cases were described. The condition continued to be a sporadically observed cancer occurring among individuals exposed to amphibole asbestos types. A clear relationship of amphibole asbestos with mesothelioma, however, was not established until the mid1980's when careful epidemiological studies discriminated between exposure to the two different types of asbestos among industrial workers.

Mesothelioma was considered to be a sporadic disease even in the late 1970's when Dr. Craighead undertook studies with a committee of experts through a contract with NIOSH. This investigation was an attempt to define the asbestos-associated diseases as carefully as

one could for pathological evaluation. Since that time, increasingly large numbers of mesotheliomas have been reported in individuals who were exposed to asbestos many years in the past in the shipyard or where insulation material was used without careful control of dust. The long latency period of this disease was demonstrated and as time has passed, the latency period of many tumors has been found to be 30 to 50 years or more.

In addition, Dr. Stevens may testify about issues relevant to a *Daubert/Havner/Robinson* Analysis.

Dr. Stevens may provide testimony regarding his examination of plaintiffs' medical records and pathology material. He may also testify regarding the biological effects of asbestos and the evidence of the relationship between the inhalation of various forms of asbestos fibers and asbestos-associated disease and the factors that go into evaluating whether there is any medical risk from asbestos-containing products. Dr. Stevens may also provide testimony regarding animal research concerning asbestos-related disease, the biological effects of asbestos and various other dusts, cancer research, the practices and protocols regarding publication of scientific research and the history of research into such matters in the United States and elsewhere including, state of the art. He may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to asbestos materials and their alleged propensity to release fibers.

The observation and opinions offered by Dr. Stevens in this matter will be based on his review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and his education and professional experience.

Dr. Gail Stockman
701 E. Marshall, Suite 502
Longview, TX 75601
(903) 753-0787

Dr. Stockman is a specialist in the area of respiratory diseases. She may testify as to all matters pertaining to her examination of the plaintiffs, plaintiffs' decedents and/or their medical records, any communication with the plaintiffs or plaintiffs' family, review of x-rays of the plaintiffs and/or plaintiffs' decedents, the diagnostic criteria used to diagnose asbestos-related diseases, her opinion as to whether plaintiffs and/or plaintiffs' decedents suffer or suffered from asbestos-related disease and the basis for such opinion, the plaintiffs' and /or plaintiffs' decedents medical condition, and her prognosis in regard to the plaintiffs' medical condition. Dr. Stockman may also testify regarding the state of scientific and medical knowledge during the time asbestos was used commercially in high temperature insulation products.

Dr. Stockman is also board certified in Internal Medicine. Dr. Stockman may be called to testify with respect to the anatomy and function of the human respiratory system, pulmonary function testing, diseases allegedly associated with exposure to asbestos and the development

of related scientific and medical knowledge. Dr. Stockman may also be called to testify with respect to medical conditions and causation of these cases. Dr. Stockman may also be asked to respond to the testimony of certain witnesses offered at the time of trial including testimony from plaintiffs' experts regarding the alleged hazards of exposure to friction materials and their alleged propensity to release fibers.

Dr. Stockman may further testify regarding radiology as a diagnostic aid in asbestos associated disease as well as to her review and opinions of the radiographic findings and the correlation of those findings with plaintiffs' medical records, work history and other diagnostic studies.

The observations and opinions offered by Dr. Stockman in this matter would be based on her review of the materials provided; a continuing review of the available scientific literature relating to the health effects of materials of interest in this matter and Dr. Stockman's education and professional experience.

Michael J. Wagner
Price Waterhouse
1800 Century Park East
West Los Angeles, CA 90067-1649
(310) 201-1700

Mr. Wagner will testify about the financial aspects of defendant's business in any punitive damages portion of trial.

Herbert E. Walter, II
Price Waterhouse
3110 Fairview Park Drive
Falls Church, VA 22042
(703) 538-7982

Mr. Walter will testify about the financial aspects of defendant's business in any punitive damages portion of trial.

John G. Weg, M.D.
Pulmonary & Critical Care Medicine Division
University Hospital
University of Michigan
Ann Arbor, MI
(734) 936-5245

Dr. Weg will testify concerning the state of the available medical knowledge regarding asbestos-related disease at the relevant historical periods of time.

Dr. David Weill
UAB Division of Pulmonary
1900 University Blvd., THT-Rm 215
Birmingham, Alabama 35294
(205) 934-7941

Dr. Weill is a specialist in the area of respiratory and pulmonary medicine. He may testify as to all matters pertaining to his examination of Plaintiff and/or Plaintiff's medical records; any communication with the Plaintiff or Plaintiff's family; review of x-rays of the Plaintiff, the diagnostic criteria used to diagnose respiratory related diseases; his opinion as to whether Plaintiff suffers(ed) from respiratory related disease and the basis of such opinion; the Plaintiff's current medical condition; his prognosis in regard to the Plaintiff's current medical condition. He may also testify about the general medical issues with emphasis on the respiratory system and the effect that asbestos and other substances have on human health generally and with respect to Plaintiffs specifically.

Dr. Hans Weill
Tulane University
School of Medicine
1700 Perdido Street, 2nd Floor
New Orleans, LA 70112
(504) 588-5265

Dr. Weill is a pulmonary disease specialist. Dr. Weill will testify to all matters pertaining to scientific knowledge, research and study in regards to exposure to asbestos and its effects on the human body; as to the latency periods of asbestos related diseases; as to the various types of asbestos fibers and their effects on the human body; as to the effects of exposure of the chrysotile fiber in regard to asbestos related diseases; scientific criteria used to diagnose respiratory diseases, including but not limited to asbestos, lung cancer, mesothelioma; as to all matters pertaining to the plaintiff's medical condition; and as to all state of the art issues.

Dr. Weill is also expected to provide testimony concerning the anatomy and function of the respiratory and circulatory system; the symptomology, disease process and diagnosis of asbestosis and cancer of the respiratory system, peritoneum and peritoneal cavity; the nature and extent of medical and scientific knowledge regarding any association of pulmonary disease with asbestos fiber and the effect of exposure to substances other than asbestos to the development and manifestation of diseases of the respiratory system; the methods of diagnosis and means of establishing the differential diagnosis of asbestos-related diseases; the incidence of lung cancer in the general population and those individuals exposed to asbestos; cigarette smoking and its effect on the lungs; the difference between impairment and disability; the effect of asbestosis on disability and life expectancy; the lack of relationship between pleural plaques and development of any cancer; the history of evolution and knowledge of asbestos-related diseases; and the evolution of the medical communities awareness of the increased risks for an asbestos-related disease in cases of prolonged exposure.

Dr. Robert Allen Wessels MD, FASCP, FCAP
Houston Northwest Medical Center
710 FM 1960 West, Mall 3
Houston, Texas 77090
(281) 440-2829

Dr. Wessels is a medical doctor. He may testify regarding the pathology of the plaintiffs and/or plaintiffs' decedents, causation of the plaintiffs' and/or plaintiffs' decedents' illness and asbestos-related diseases.

Dr. Thomas M. Wheeler, M.D.
Methodist Hospital
Department of Pathology
6565 Fannin
Mail Station 205
Houston, Texas 77030
(713) 776-5063

Dr. Wheeler is a pathologist. He may testify regarding the pathology of the plaintiffs and/or plaintiffs' decedents, causation of the plaintiffs' and/or plaintiffs' decedents' illness and asbestos-related diseases. Dr. Wheeler will also testify about causes of cancer, and the effect of other substances, such as cigarette smoke, on the plaintiff(s).

Dr. Mark R. Wick
Division of Surgical Pathology
University of Virginia Health Sciences Center
Room 3882 Old Medical School
Box 214, Jefferson Park Avenue
Charlottesville, VA 22908
(804) 924-9038

Dr. Wick is a medical doctor. He may testify regarding the pathology of the plaintiffs and/or plaintiffs' decedents, causation of the plaintiffs' and/or plaintiffs' decedents' illness and asbestos-related diseases.

Dr. Wick is expected to provide testimony concerning the anatomic structure and functioning of the lung from a pathologic perspective, the defense mechanisms and functioning of the lung in health and otherwise, the responses of the lung to various stimuli, and the role of various components of the respiratory system in the proper functioning of the lung. Dr. Wick is expected to describe and distinguish various types of asbestos fibers; to describe the things which affect the ability of asbestos fibers to affect various structures within the respiratory system; and to describe the body's specific responses to fibers of asbestos that are inhaled, whether or not they are retained.

If is further believed that Dr. Wick will define and distinguish various conditions, such as asbestosis, pleural changes and other non-malignant changes that may be attributable in some

persons to the results of long term inhalation and retention of some forms of asbestos fiber. Dr. Wick is further expected to be able to testify concerning the circumstances under which exposure to certain forms and types of asbestos may be associated with the incidence of some forms of mesothelioma in some persons, and will testify concerning the results of his own experiences, the medical and scientific literature, and existing epidemiologic studies concerning associations that are alleged to exist epidemiologically between exposure to asbestos in some populations and the mortality and/or incidence of some forms of cancer.

Dr. Wick is further expected to offer testimony concerning the effects of inhaled tobacco smoke and other factors on the occurrence of disease in populations who are also alleged to be exposed to asbestos containing products and additionally concerning how the effects of inhaled tobacco smoke and other factors can confound the apparent results of certain epidemiologic studies.

Dr. Wick is also expected to testify that it cannot be said, to reasonable degree of medical probability, that any hypothetical person's alleged "exposure" to products that may have contained asbestos was of importance to that individual without reference to that specific person's individual work history, medical history, findings on physical examination and pathological examination of tissue, if any, information concerning the individual's use of protective equipment, specific types of asbestos containing product(s) used and/or handled, resolution of questions regarding exposures to substances other than asbestos-containing products, and other known etiologies for whatever conditions are found to exist.

It is further expected that Dr. Wick's testimony will generally respond to the pathologic, scientific and epidemiologic testimony which may be offered by plaintiffs' experts, and in that sense his testimony is dependent upon the prior testimony of such experts and cannot be specifically predicted.

Dr. Wick will testify that based on his examination of the pathological tissue regarding plaintiff and based on the medical and scientific literature that a certain percentage of mesotheliomas are idiopathic in nature and cannot be attributed to asbestos exposure. Dr. Wick will testify that the criteria for attributing the alleged mesothelioma to asbestos are not present in this case.

Dr. R. Keith Wilson
Pueblo Pulmonary Associates
1925 Orman, Suite 254
Pueblo, CO 81004
(719) 564-1542

Dr. Wilson is a specialist in the area of respiratory diseases. Dr. Wilson will testify as to all matters pertaining to his examination of the plaintiff and plaintiff's medical records; any communications with the plaintiff or plaintiff's family; review of x-rays of the plaintiff; the diagnostic criteria used to diagnose asbestosis; his opinion as to whether plaintiff suffers from asbestos related disease and the basis for such opinion; the plaintiff's current medical condition and his prognosis in regard to the plaintiff's medical condition. His opinions are

set forth in depositions and transcripts of testimony he has given at trial, copies of which this defendant believes are in the possession of plaintiff's counsel.

The Goodyear Tire & Rubber Company also designates the following witnesses, and examining and treating physicians as identified by plaintiff Edward J. Lambert. Additionally, Goodyear designates the custodians of record for all of the providers and facilities named by plaintiffs in this matter:

Dr. Ronald Mahoney
7777 Southwest Freeway, Suite 24
Houston, Texas

Dr. Grover Hubley
813 Sate Street
Madisonville, Texas 77864

Dr. Mitchell
2801 East 29th Street
Bryan, Texas 77802

Dr. Allen K. Young
1404 Bristol Street
Bryan, Texas 77802

Dr. Mark Clark
Pulmonary & Critical Care Consultants
1305 W. 34th Street, Suite 400
Austin, Texas 78705

Dr. Lisa Rouse
707 Hill Country Drive, Suite 606
Kerrville, Texas 78028

Dr. Timothy A. Berg
Surgical Associates
710 Water Street, Suite 606
Kerrville, Texas 78028

Dr. Joseph Vines
Surgical Associates
710 Water Street, Suite 606
Kerrville, Texas 78028

Dr. Rebecca Barrington
218 Sidney Baker Street
Kerrville, Texas 78028

Dr. Michael Jackson
Sid Peterson Memorial Hospital
710 Water Stret
Kerrville, Texas 78028

Dr. Lattimere
Kailua Kona, Hawaii

Dr. Cliff Arrington
P.O. Box 649
Kailua Kona, Hawaii 96750

Dr. Hector Battifora
1752 Wilson Avenue
Arcadia, CA 91006

Treating physicians, staff, and custodian of records at:

Southwest Memorial Hospital
Houston, Texas

St. Joseph Hospital
2801 Franciscan Drive
Bryan, Texas 77802

Sid Peterson Memorial Hospital
710 Water Street
Kerrville, Texas

Kailua Kona Community Hospital
Kailua Kona, Hawaii

Additionally, Defendant identifies the following individuals identified by plaintiffs as having knowledge of relevant facts:

Edward J. Lambert
75-7026 Alii Drive
Kailua Kona, Hawaii 96740

Dana C. Lambert
8501 Leawood Boulevard
Houston, Texas 77072

Cindy Durtyer
Sid Peterson Memorial Hospital
710 Water Street
Kerrville, Texas 78028

Diana Dillard
Sid Peterson Memorial Hospital
710 Water Street
Kerrville, Texas 78028

Mary Hutchison
Sid Peterson Memorial Hospital
710 Water Street
Kerrville, Texas 78028

Henry Earl Holder
Post Office Box 231
Goodrich, Texas 77335

William Joseph Haining
5423 Whispering Creek Way
Houston, Texas 77017

George Edwin Jones
865 Walnut Creek Road
Simsboro, Louisiana 71275

John Theodore Kayda, Sr.
1610 Atlanta Street
Deer Park, Texas 77536

Felix D. Luna
8727 Kirkmont Drive
Houston, Texas 77089

Preston Colvin Powell
607 Caperton Road
Houston, Texas 77022

Harry Max Moore
13934 Amber Lane
Montgomery, Texas 77356-5235

Lee Roy Cervenka
111 Old Angelton Road
Lake Jackson, Texas 77566

Billy Winston Stevens
114 Perth Road
Victoria, Texas 77904

John Flowers
4817 Hummingbird Street
Houston, Texas 77035

Tom Dement, Jr.
Route 1, Box 44-B
Jacksonville, Texas 75766

Harold Wayne Bassham
P.O. Box 262
Cisco, Texas 76437

Goodyear reserves the right to offer and read into evidence prior deposition or trial testimony of any witness designated and put on by plaintiffs and/or co-defendants, whether they be called live or by prior testimony.

Goodyear designates every witness identified by plaintiffs and/or by co-defendants in this matter and any witness identified by any party in Mr. Lambert's previous asbestos case filed in Bexar County, Texas.

Goodyear is in the process of identifying additional experts and will supplement this response in accordance with the Texas Rules of Civil Procedure.

194.2(g) Any indemnity and insuring agreements described in Rule 192.3(f).

RESPONSE:

Goodyear will supplement this response in accordance with the Texas Rules of Civil Procedure.

194.2(h) Any settlement agreements described in Rule 192.3(g).

RESPONSE:

Goodyear has no discoverable settlement agreements.

194.2(i) Any witness statements described in Rule 192.3(h);

RESPONSE:

Goodyear has no discoverable witness statements.

194.2(j) In a suit alleging physical or mental injury and damages from the occurrence that is the subject of the case, all medical records and bills that are reasonably related to the injuries or damages asserted or, in lieu thereof, an authorization permitting the disclosure of such medical records and bills.

RESPONSE:

Plaintiffs' counsel will be notified of records requests and will be offered an opportunity to obtain copies of such records.

194.2(k) In a suit alleging physical or mental injury and damages from the occurrence that is the subject of the case, all medical records and bills obtained by the responding party by virtue of an authorization furnished by the requesting party.

RESPONSE:

Plaintiffs' counsel will be notified of records requests and will be offered an opportunity to obtain copies of such records.

Respectfully submitted,

BAKER BOTTS, L.L.P.

By: _____

George T. Shipley
State Bar No. 18267100
Brady S. Edwards
State Bar No. 00793021
3000 One Shell Plaza
910 Louisiana
Houston, Texas 77002
(713) 229-1234
Fax: (713) 229-1522

ATTORNEYS FOR DEFENDANT
THE GOODYEAR TIRE & RUBBER COMPANY

CERTIFICATE OF SERVICE

I hereby certify that on the 26th day of April, 2001, a true and correct copy of The Goodyear Tire & Rubber Company's First Supplemental Responses to Plaintiffs' Request for Disclosures was forwarded to plaintiffs' counsel by certified mail, return receipt requested, regular mail, facsimile, and/or hand delivery in compliance with Tex. R. Civ. P. 21 and 21a, and to all known counsel of record shortly thereafter.

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_____

Brady Edwards

NO. 12540*BH00

EDWARD J. LAMBERT	§	IN THE DISTRICT COURT OF
	§	
	§	
vs.	§	BRAZORIA COUNTY, TEXAS
	§	
PROKO INDUSTRIES, INC., et al.	§	23RD JUDICIAL DISTRICT

CERTIFICATE OF WRITTEN DISCOVERY

The Goodyear Tire & Rubber Company certifies that on the 26th day of April, 2001 it served plaintiffs, by and through their attorneys of record, Ms. Elizabeth Schick and Mr. William Tapscott, Jr., Baron & Budd, 3102 Oak Lawn Avenue, Suite 1100, Dallas, Texas 75219 with the following:

1) The Goodyear Tire & Rubber Company's Supplemental Responses to Plaintiffs' Request for Disclosure.

Respectfully submitted,

BAKER BOTTS L.L.P.

By: _____

George T. Shipley
State Bar No. 18267100
Brady Edwards
State Bar No. 00793021
One Shell Plaza
910 Louisiana
Houston, Texas 77002
(713) 229-1234
(713) 229-1522 Fax

ATTORNEYS FOR DEFENDANT
THE GOODYEAR TIRE & RUBBER COMPANY

CERTIFICATE OF SERVICE

On April 26, 2001, I served a true and correct copy of Defendants' Certificate of Written Discovery upon plaintiff's counsel by certified mail, return receipt requested, regular mail, facsimile, and/or hand delivery in compliance with TEX. R. CIV. P. 21 and 21a, and to all known counsel of record shortly thereafter.

Brady Edwards

BAKER BOTTS L.L.P

ONE SHELL PLAZA
910 LOUISIANA
HOUSTON, TEXAS
77002-4995
713 229 1234
FAX 713.229.1522

AUSTIN
BAKU
DALLAS
HOUSTON
LONDON
NEW YORK
RIYADH
WASHINGTON

April 26, 2001

001622.0579
(*Lambert*)

BRADY EDWARDS
713.229.1162
FAX 713.229.7762
brady.edwards@bakerbotts.com

BY CERTIFIED MAIL

Stephanie Finch
Mr. William Tapscott, Jr.
Baron & Budd
The Centrum, Suite 1100
3102 Oak Lawn Avenue
Dallas, Texas 75219

Re: Cause No. 12540*BH00; *Edward J. Lambert v. Proko Industries, Inc., et al.*; In the 23rd Judicial District of Brazoria County, Texas

Dear Counsel:

Enclosed please find Defendant The Goodyear Tire & Rubber Company's Supplemental Responses to Plaintiffs' Request for Disclosure.

Thank you for your attention to this matter.

Sincerely,

Brady Edwards

Enclosure

cc: Heather Lohec (*file copy*)

All Known Defense Counsel (*by facsimile*)