

IX. TRIAL

A. JURY SELECTION

§ 84 In general

The best source of justice is the American jury system, and it is the only way to insure a fair and impartial trial. The jurors come from a list of registered voters. They are from all walks of life, and it is the lawyer's responsibility to select people whom he or she believes will be fair to the client's cause. We all form impressions of persons based upon their dress, poise, conduct, speech, and mannerisms. A jury does the same thing, and it tends to "pick a side" early in the case. It is important, therefore, that neither counsel, the client nor the client's witnesses present a negative image to a jury panel. A good trial lawyer capitalizes on the American jury's instinct to "take sides" by his or her mannerisms, dress, and presentation.

The sections in this division discuss the techniques of trying a construction accident case involving a worker's exposure to a toxic substance within the context of the model trial case but only insofar as the case applied against the painting contractor. For the purpose of the following discussion, the reader should assume that the owner of the premises, the general contractor (site manager) and the chemical manufacturer have been dismissed from the action.

§ 85 Selecting a jury

The jury is a group of people assembled to do justice in a particular case.²¹ Jurors are people who are called to render judgments about a conflict concerning people they do not know in a setting away from their families and their businesses. Their lives have been disrupted. If they do not become involved in the case before them, the results are likely to be very inconsistent; they may be inclined to vote for the party whose lawyer has irritated them the least.

When selecting a jury counsel should attempt to impress the jurors with the more interesting aspects of the case by incorporating some of the facts of the case into questions put to the prospective jurors during voir dire. This tends to increase the jurors' curiosity about the case, which makes them more willing to reserve a judgment on the case until they hear more of the facts and circumstances. With a basis for future delibera-

²¹Selecting the Jury—Plaintiff's View, 5 Am. Jur. Trials 143.

tions following the evidence, the jurors are more likely to keep an open mind during the trial, which is one of the principal functions of jury selection.

One of the first questions counsel should ask when selecting a jury panel member is, "What kind of a person is the juror?" People tend to act in certain ways according to their character and background. When representing a client in a personal injury case, people who are engaged in public contact, such as salespeople, people who seem naturally gregarious, and persons of certain ethnic backgrounds, such as southern Italians, tend to have natural empathy for a plaintiff. Artists, social workers, and people of poorer classes also seem to have a special empathy for injured persons and tend to vote according to their feelings in reaching a verdict in a personal injury case. People who appear to have penurious attitudes or who are engaged in conservative occupations, such as bankers, generally will not identify with a plaintiff.

§ 86 Technique of conducting voir dire

Counsel's ability to conduct an individual voir dire of prospective jurors may be restricted by court rules or procedural regulations of the jurisdiction. In some areas, counsel is allowed relatively open access to the prospective jurors; in other areas the right is limited, and in some courts counsel must submit written questions which the trial judge will put to the panel members individually or collectively. Where the opportunity to examine jurors directly during voir dire exists, counsel should establish verbal contact with each potential juror. Asking each juror a question helps to establish rapport between the attorney and the panel member. Individual questioning should be done in a friendly manner, as a harsh examination tends to prevent or diminish the type of rapport the attorney wants to develop with the jury.

The primary purpose of voir dire is to select a fair jury panel. Voir dire questioning, however, is not an effective way of revealing all the possible prejudices of the jurors. At best, only the most blatant prejudices are revealed by way of a voir dire examination. What the attorney should strive to do in voir dire is to try to get a sense of what each juror thinks. The questioning should be directed less towards revealing prejudices than disclosing attitudes. Generally, however, the attorney will have to work more on instinct than on responses to individual questioning to determine which jurors are the most acceptable for the panel.

B. OPENING STATEMENT

§ 87 In general

The opening statement is often crucial to the success of the trial.²² The opening comes at the stage of the trial when the jurors' minds are fresh and uncluttered. Thus, the opening can be very effective in giving the jury a favorable impression. It goes without saying that a strong and effective opening statement is essential.

The groundwork of the opening statement must be laid throughout trial preparation. The attorney must know the facts of the case thoroughly in order to be able to relate those facts accurately during the opening statement. In effect, counsel makes a pact with the jury, whether spoken or tacit, that the evidence that is discussed during the opening statement will be introduced during the trial as represented. The jury will remember evidence what was promised during the opening and the failure to present that evidence may break the bond that the lawyer has forged with the jury. For the sake of credibility, the attorney should only mention those points on opening that will come out at trial.

The opening statement should be brief, clear, and well organized, with a logical connection between each of the points to be made during the presentation. Counsel should not ramble nor jump about from one topic to another. Delivery of a well-organized and thoughtful opening statement will picture the attorney as a reasonable, competent professional.

The style of the opening statement is also important, but it will probably vary from attorney to attorney, according to the type of personality involved. Generally, it is best to maintain a conversational tone for most of the opening statement and save the more volatile statements for final argument. How the attorney presents the opening statement may determine how the jury judges the attorney. The attorney should present a trustworthy, calm, competent, and professional demeanor.

§ 88 Plaintiff's Opening—Illustrative Paragraphs

The plaintiff's attorney should use the opening statement as an opportunity to introduce the theme of the case²³ to the jury. Generally, in presenting the opening statement, counsel should

²²Opening Statements—Plaintiff's View, 5 Am. Jur. Trials 285.

²³See § 77.

sketch clearly the outline of the picture that he or she wants the jury to fill in when it hears the evidence. It is not counsel's function at this time to draw in the complete picture for the jury.

Counsel should begin the opening statement with a factual statement of the most salient points of the theme. As an example, in the model trial case there was evidence that the toxic exposure to the plaintiff was particularly severe. Thus, the introduction of the opening statement immediately should set the scene of the accident and relate the main factual circumstances of liability.

On _____ [date], _____ [plaintiff] was working at _____ [construction site], where he was a carpentry foreman. He was working in an area they called "the well," about twenty feet in the ground and about eighty feet around, when certain employees of _____ [painting contractor] began to spray a product by the name of _____ [brand name of sealant]. They had sprayed before, of course, but this time it was different. This time the fumes were so bad that you will hear them described as a fog. _____ [Plaintiff], given only a surgical mask for protection, tried to leave the well. He made it to the ladder before blacking out. When he was seen two hours later, he was unconscious, blue, and gasping for air. That, ladies and gentlemen, is why we are here. My name is _____ [counsel's name] and the gentleman seated at the counsel table is the plaintiff.

After the introduction, the attorney should briefly sketch the factual basis for this action. The discussion should not be too exhaustive nor attempt to recite passages of testimony verbatim. The idea behind the opening statement is to prepare the jury to receive later information, not to give them the evidence directly. Counsel should stress the highlights of the case and explain how the highlights relate to the issues that have to be proven.

In this case we will prove that _____ [painting contractor] knew of the presence of the carpenters in the well. Despite the presence of those workers, who were unprotected against the harmful fumes that it was known such spraying would cause, _____ [painting contractor], applied the sealant. The _____ [painting contractor], knew this stuff was harmful—his people were given masks, respirators, protective clothes, the whole shot—and they sprayed knowing that there were others there who were not wearing protective equipment. And because they sprayed _____ [plaintiff] was overcome by fumes.

The attorney should also take the initiative and raise the weaker points of the case during the opening statement. Generally, the jury should not hear of them for the first time from defense counsel. They should be discussed in a positive way, however. Counsel should inform the jurors of how the plaintiff's case will deal with the admitted weaknesses. For example, there is nearly always a serious proximate cause issue in a toxic exposure case. Plaintiff's counsel should inform them of that before defense counsel does, and they should be informed that plaintiff will deal with the issue in a positive way.

Now, I told you that _____ [*plaintiff*] suffers from _____ [*condition or illness caused by the toxic exposure*].

The attorney for the defendant company will tell you that no one knows what causes that condition and that we won't be able to prove it was caused by the exposure to _____ [*hazardous chemical*]. Well, you'll get to hear a lot of medical and scientific evidence on that point from the expert witnesses, and one thing will become clear: this chemical causes _____ [*illness or condition*].

Counsel should also briefly discuss the defendant's case by stating the basic contentions of the defense claims. Although it may seem dangerous to ask the jury to pay attention to the opponent's case, it has some advantages. The jury will pay attention to opponent's case without being told. By telling the jury to do so, the jury will tend to see counsel as a fair person, and will tend to project a feeling of confidence in the client and in the client's case.

Of course, they'll have more to say than what I have just told you. I expect _____ [*defense counsel*] can fill you in a bit better on what they'll say. But listen to what they say. Listen to which facts they admit and the facts they deny, and examine the facts that we both present, you'll have no difficulty coming to a proper conclusion for this matter.

The final aspect of the opening statement is to prepare the jury for the damages portion of the case. In discussing the client's injuries and damages, understatement is the preferred approach. In an injury case, the client's suffering should be presented in sympathetic terms and the client's efforts to rehabilitate himself emphasized.

§ 89 — Checklist

Counsel may find the following checklist helpful in preparing the opening statement for the plaintiff in a toxic exposure case.

- Give a good introduction

- State the theme of the case
- Make a pact with jury
- Discuss the facts of the case
- Relate the facts to the legal positions
- Refer to the witnesses and indicate what they will say
- Discuss the documentary evidence
- Refer to any anticipated negative evidence in a positive way
- Discuss opponents' evidence
- Discuss admissions, denials, etc.
- Underplay, but discuss damages

C. PRESENTING PLAINTIFF'S CASE

§ 90 In general

The order in which the witnesses should testify has already been discussed.²⁴ Counsel, however, should not adhere to a rigid schedule. Within the general framework decided on, there should be considerable leeway. Thus, once a general plan for the trial has been mapped,²⁵ and the order of witnesses selected, the plaintiff's attorney should concentrate on how best to bring out the information which needs to be presented, even if that means that changes in the overall plan will need to be made as he or she goes along.²⁶

Cases

Judgment on jury verdict in favor of manufacturer of DuPont Imron paint was reversed on plaintiff's strict-liability product-defect claim, and summary judgment for defendant was reversed on plaintiff's strict-liability failure-to-warn claim. Plaintiff, employee of truck manufacturer, worked adjacent to area in which truck chassis were painted. Defendant's paint was used, containing isocyanates, which were ingredients in certain activators in paint that shortened its drying time. As result of exposure to vapors from paint, plaintiff suffered permanent obstructive lung disease. Expert testimony established that isocyanates were extremely toxic substances and inherently dangerous to human health. Isocyanates irritated lungs, and body's immune system attacked them, causing lung damage. Expert testimony also noted that isocyanates were most common cause of occupational asthma in this country. That evidence established submissible case that DuPont's paint, containing isocyanates,

²⁴See § 82.

²⁵See § 78.

²⁶Presenting Plaintiff's Case, 5 Am. Jur. Trials 611.

was unreasonably dangerous and therefore defective. With respect to plaintiff's failure-to-warn claim, trial court erred in excluding evidence of DuPont's labels for its activators, placed in use after plaintiff's exposure. Those labels stated that products could produce permanent lung injury. They were relevant to and probative of whether activators were unreasonably dangerous, and thus defectively designed, and whether warnings were adequate at time of plaintiff's injury. *Stinson v E. I. DuPont de Nemours & Co.* (1995, Mo App) 904 SW2d 428, CCH Prod Liab Rep ¶ 14273.

§ 91 Plaintiff's demeanor as a witness

Counsel should bear in mind that the plaintiff will be watched closely by the jury both to determine credibility and as to whether or not the plaintiff is a person worthy of being awarded substantial damages. Thus the plaintiff's counsel should direct much of the testimony to create for the jury a sympathetic portrait of plaintiff.

The ideal image of the plaintiff prior to a toxic exposure is one of a hardworking, healthy person, in contrast to the person before them who may actually be dying as a result of the effects of the exposure. It is important that the jury see the pre-exposure plaintiff as an honest, hardworking family man, if applicable, rather than a malingerer or sluggard. The jury should be presented a picture of the plaintiff that will compel it to ask, "How could anyone have done that to this person?"

It is usually not difficult to paint an ideal picture of the injured post-exposure plaintiff. Counsel should be able to present the picture of a person racked with physical pain attempting to cope with the disease. The view can be one of defiance, of a person who is fighting the disease and refuses to give up, or it may be one of defiant, but grim, resignation to the inevitable. Where the plaintiff has died as a result of the effects of the disease caused by the exposure, this aspect can be particularly effective where the plaintiff's testimony can be presented by a videotaped pretrial deposition. The effect of the absence of the plaintiff will become overwhelming immediately following the showing of the tape, particularly if it pictures a person who has come to grips with the inevitability of death or is attempting to do so.

Where the plaintiff has died before trial, the presentation of the surviving family members in a favorable light is important. The attorney should show how the lives of the survivors have been deeply effected. They should be shown to be struggling to rearrange their lives in an effective way. Showing how a family that has suffered a devastating loss is trying to rebuild its life

together is far more effective than merely showing that a family is mired in grief.

§ 92 Preparing the trial witnesses

Counsel should not permit any witness to testify at trial who has not been adequately prepared for his or her appearance on the witness stand. Since generally several years will have passed between the plaintiff's toxic exposure and the time for trial, most witnesses will have forgotten many of the details of the case, making it imperative that counsel make a strong effort to refresh their recollection during trial preparation.

The pretrial preparation of a witness also gives the witness an opportunity to become familiar with counsel's style of questioning at trial. Putting sample questions to the witness after an interview and informing the witness how his or her testimony will fit in with the theme of the trial can accomplish this objective very well. This type of preparation will inform counsel whether the witness can respond to questions in a confident and forthright manner. It also tells counsel precisely the answer that the witness will give to the questions at trial. The procedure followed should not be such as to produce testimony in court that sounds rehearsed or manufactured for the occasion, however. The goal is to have a relaxed, confident, and prepared witness at trial. This can often be accomplished by determining the witness' familiarity with court testimony and explaining to the witness the procedure he or she will undergo while testifying.

In preparing the plaintiff's witnesses, counsel should take advantage of the trial preparation materials available, such as witness statements and deposition transcripts. This material should be gone over thoroughly with the witness with respect to how it fits in with the theme of the case. The witness should be aware of the importance of the testimony and how that testimony will relate to evidence expected from other witnesses. If the witness understands the expected role, the testimony from that witness is likely to be more focused on important material facts. It is important that the witness understand the overall framework of the case during the trial preparation because the defense will probably request an order excluding the witnesses from being in the courtroom except while testifying.

During the trial preparation conference with a witness, counsel should also determine if the witness possesses any ad-

ditional information that may have been overlooked during investigation or discovery or which the witness acquired since the last meeting with counsel. With knowledge of the entire case in mind, information the witness previously had rejected as inconsequential may take on new meaning.

In the process of preparing each witness, counsel should prepare a checklist or outline of the witness' testimony to work with during trial.

§ 93 Presenting plaintiff's witnesses

Counsel's first step in presenting the testimony of a witness for the plaintiff is to introduce the witness to the jury. The first questions should deal with the witness' identity, place of residence, nature of his or her occupation, and other general information. These questions have two very important functions. First, they allow the jury to see the witness as a person, which is essential for developing the individual's credibility as a witness. Second, preliminary questions help the witness to overcome nervousness, build confidence, and adjust to the courtroom situation.

Most courts allow counsel to take the witness through the preliminary matters by asking leading questions.²⁷ Where the witness is capable of relating such matters clearly and concisely, however, leading questions should be dispensed with and the information should come directly from the witness in order to reinforce credibility.

The second step in the development of the witness' testimony is to establish the witness' connection with the case, either through a relationship with the plaintiff or to the events which resulted in the plaintiff's injury. This gives the testimony a foundation and allows the jury to understand the relevance of the testimony to the case. The attorney should allow the witness to narrate the testimony in his or her own words with a minimum of interference. Should the witness begin to ramble during the testimony, however, counsel should switch tactics and ask more limited questions.

In developing the witness' testimony it is generally better to present the facts and circumstances in chronological order. With some witnesses, however, the evidence may be particularly strong on one or more of the theories of recovery. In that case, counsel should consider developing that evidence either

²⁷See Am. Jur. 2d, Witnesses §§ 429, 430.

at the beginning or the end of the witness' testimony, where it is more likely to be remembered by the jury.

The attorney should also keep alert for other uses of the testimony of a witness. For example, although family members of the victim will often testify regarding damages, their testimony may also help on the issue of causation. Thus, testimony of the family establishing that the victim of a toxic exposure was in good health prior to the incident may help create an inference of causation when that testimony is contrasted to the evidence of debilitation and illness of the victim following the exposure.

§ 94 Presenting expert testimony

A toxic exposure case almost always succeeds or fails on the strength or weakness of the expert witness testimony.²⁸ It is therefore vital that the attorney do a thorough and effective job of presenting the expert testimony.

In presenting expert testimony, the attorney must first qualify the expert.²⁹ Occasionally the opposing counsel may offer to stipulate to the expert's qualifications. Although this may tempt counsel, since it will mean that he or she will not have to go through what may seem like a tedious procedure, counsel should insist on presenting the expert's credentials. It is important that the jury knows that the person telling them about causation is eminently qualified to give that opinion. The jury will judge the expert not only on the weight of his or her testimony, but also on the strength of the expert's qualifications.

Cases

District Court did not abuse its discretion in excluding expert scientific testimony, offered by electrician as evidence that his cancer resulted from exposure to polychlorinated biphenyls (PCBs), based on studies indicating that infant mice developed cancer after receiving massive doses of PCBs injected directly into their peritoneums or stomachs;

²⁸Selecting and Preparing Expert Witnesses, 2 Am. Jur. Trials 585.

Admissibility of opinion evidence as to cause of death, disease, or injury, 66 A.L.R. 2d 1082.

²⁹Qualification of Medical Expert Witness, 33 Am. Jur. Proof of Facts 2d 179; Qualification of Toxicologist, 12 Am. Jur. Proof of Facts 629.

Qualifications of chemist or chemical engineer to testify as to effect of poison upon human body, 70 A.L.R. 2d 1029.

Siegel, The Chemist as a Technical Expert, 9 Lawyer's Med J 2d 495 (Mar 1981).

electrician was adult human being with far less alleged exposure to PCBs, and he developed different type of cancer than that developed by mice. Fed.Rules Evid.Rule 702, 28 U.S.C.A. General Elec. Co. v. Joiner, 118 S. Ct. 512 (U.S. 1997).

Appellate court deciding question of admissibility of expert testimony regarding excessive levels of organic solvents as cause of toxic encephalopathy, in FELA toxic tort litigation, was not required to engage in highly detailed level of critical analysis of each epidemiological study as part of its de novo review; while analysis of each study for relative risk, confidence interval, biases, confounders, criteria of causality and other numerous factors might be appropriate in considering sufficiency of evidence, it was not appropriate or necessary at initial stage of litigation which focused on admissibility of expert testimony. Federal Employers' Liability Act, §§ 1 et seq., 45 U.S.C.A. §§ 51 et seq.; West's F.S.A. § 90.702. *Berry v. CSX Transp., Inc.*, 709 So. 2d 552 (Fla. Dist. Ct. App. 1st Dist. 1998).

Expert testimony based on epidemiological studies regarding link between exposure to excessive levels of organic solvents and toxic encephalopathy was based on reliable scientific evidence, and thus was admissible under *Frye* in action brought by railroad workers who had been exposed to solvents during their work; studies on which testimony was based were conducted independently of litigation and were peer-reviewed and accepted by journals, and any errors in such studies would principally affect weight to be accorded opinions based on them. West's F.S.A. § 90.702. *Berry v. CSX Transp., Inc.*, 704 So. 2d 633 (Fla. Dist. Ct. App. 1st Dist. 1997), opinion superseded, 1998 WL 85601 (Fla. Dist. Ct. App. 1st Dist. 1998).

§ 95 Experimental evidence

The expert must be able to discuss clinical studies and laboratory experiments that are received in evidence from both the scientific and medical viewpoints.

Note: Generally, in cases involving hazardous chemicals and toxic substances, "clinical studies" refers to clinical trials or tests involving human subjects, while "laboratory experiments" refers usually to tests involving animals, such as dogs, monkeys, mice, rats, and other animals. The processes of the studies and their results should be explained to the jurors in simple terms.³⁰

The expert should be able to deal with any particular difficulty of a study as it relates to the scientific issues at trial. For example, a study may be subject to criticism because of a small sampling size, because it was a test on nonhumans, or because of larger exposure to the chemical on the part of the test subjects than was the case with plaintiff. If a study

³⁰Admissibility of experimental evidence to determine chemical or physical qualities or character of material or substance, 76 A.L.R. 2d 354.

involved a prolonged, high-volume exposure, the expert should be ready to explain the scientific process involved and how that process required that type of experimentation.

One strategy consideration is the handling of negative information. In general, the attorney should deal with negative aspects of the scientific studies on direct examination.³¹ This has several advantages. First, it allows the expert to deal with the problem in a favorable way, so that the impact is softened. Second, it removes an important portion of the defendant's cross-examination. By the time defense counsel asks about the negative studies, the expert has already explained them. Third, discussing the negative aspects of the study can improve the credibility of both the expert and the attorney.

It should be borne in mind that where counsel has made a pledge either expressly or impliedly to the jury during opening statement to prove the plaintiff's claims on direct examination, a part of that pledge is to lead the jury to the truth, as counsel sees it. By bringing out the negative aspect of the evidence and dealing with it on direct examination, counsel is in effect making good on that pledge. The testimony acquires additional credibility when it indicates that the witness has considered contrary or opposing views and, for good cause, has rejected them.

Cases

Trial court abused its discretion in allowing expert witness, who had conducted experiment regarding whether manipulation of asbestos insulation could release asbestos fibers, to also testify concerning amounts of asbestos fibers so released, where experiment was designed to determine only whether fibers could be released and not the level of asbestos exposure. Rules of Evid., Rule 702. *Ball v. Consol. Rail Corp.*, 142 Ohio App. 3d 748, 756 N.E.2d 1280 (8th Dist. Cuyahoga County 2001); West's Key Number Digest, Evidence ¶557.

§ 96 — Illustrative Testimony

In some cases the scientific link between the plaintiff's exposure to a particular hazardous chemical and the condition or illness that subsequently developed rests on experiments that may have been conducted on animals and not on human patients. As a result such experiments may be challenged by the defense in a toxic exposure case as not sufficiently valid to support the opinions and conclusions of the plaintiff's experts on causation. That problem may be handled in the following way:

³¹See § 96.

- Q. Now doctor, with reference to _____ [*particular experiment*], were those test conducted on humans?
- A. No, they were not.
- Q. What were they conducted on?
- A. On rats.
- Q. Does that detract from the validity of the test insofar as it was used by you in forming your opinions in this case?
- A. No, it doesn't.
- Q. Would you please tell us how a study on rats can relate to this case?
- A. Well, of course, we can't experiment on humans. We can study humans that have been exposed to _____ [*a particular hazardous chemical or toxic substance*], but they are usually few in number and the human life span is too great for an effective study within a reasonable time. The _____ [*clinical study*] which showed that there was an increase in the rate of _____ [*condition or illness*] for exposure to _____ [*hazardous chemical or toxic substance*] is such a study. It took 15 years and involved less than 200 people. We have a similar problem when we conduct experiments with monkeys. They are hard to find, are expensive, tend to live too long for study. Rats, on the other hand are cheap, plentiful, and have a much shorter life span. We can get a better sampling from these animals. Enough, for example, to draw accurate conclusions. Their physiology, the means of absorption of the chemicals and such are close enough to man physiologically that their use constitutes a valid study.
- Q. Doctor, you mentioned the _____ [*clinical study*] of humans exposed to _____ [*hazardous chemical or toxic substance*]. Do you find that study to be invalid because of the problems you discussed?
- A. Well, invalid is the wrong word. I would say that, if it was all we had, it would be inconclusive. You can't draw valid conclusions from a study of two hundred people. Also, it wasn't conducted under laboratory conditions. There are too many variables. The primary use of a study like that, however, isn't the assertion of a connection between the exposure and the illness, but to check up on work in the laboratory. You see, we have these rats developing _____ [*particular illness or condition*], in the lab. Now we look to see if there is

any evidence of that condition in humans. So we look at a study like the one referred to. If we find a significant increase in the rate of _____ [*particular illness or condition*], it is evidence that what was done in the lab is on the right track. It confirms it. It's another piece of evidence.

Q. So your primary use of the _____ [*clinical study*] was to confirm the rat study?

A. Right. It shows precisely what I would have projected from that study.

§ 97 Handling the Causation Issue—Direct Examination

The biggest hurdle for a plaintiff's attorney in a hazardous chemical or toxic exposure case is the issue of causation.³² The causation issue in a toxic exposure case presents difficult problems of expert testimony that must be carefully presented and dealt with in order for counsel to be able to submit the case to the jury.³³

Generally, particularly in malpractice cases, the courts require the expert to testify "within a reasonable degree of medical probability."³⁴ This is usually defined as "more likely than not" or "at least 50 percent."³⁵ The attorney must carefully instruct the witness on the law of the state and on any traps that might lie ahead during testimony. For instance, the expert should be advised to avoid the word "could." An expert's opinion stated in the form that an exposure to a hazardous chemical "could have caused" the illness or condition that

³²Toxic tort cases are most often successfully defended on the issue of medical causation. Royal, *The Defense of Medical Causation*, 23 *Trial* 40 (Oct 1987).

Gold, *Causation in Toxic Torts: Burdens of Proof, Standards of Persuasion, and Statistical Evidence*, 96 *Yale L J* 376 (1986); Hawes & Chu, *Proximate Cause in Toxic-Tort Cases*, 23 *Trial* 69 (Oct 1987).

³³See the cases collected in *Admissibility of opinion evidence as to cause of death, disease, or injury*, 66 *A.L.R.* 2d 1082.

³⁴See generally, *Causation—Medical Opinion*, 3 *Am. Jur. Proof of Facts* 161.

³⁵See, for example, *Cooper v Sisters of Charity, Inc.* (1971) 27 *Ohio St* 2d 242, 56 *Ohio Ops* 2d 146, 272 *NE2d* 97.

subsequently developed in the plaintiff or the plaintiff's decedent may not be sufficient.³⁶

To make an effective presentation of the expert's opinion on the issue of causation, the testimony must have an inner consistency and logic. The causation testimony must be supported by a sound understanding, a discussion of the available literature and studies, and by a proper presentation of the surrounding circumstances. For that reason, the expert must relate a precise and accurate medical history of the client, a precise and accurate presentation of the facts of the exposure, and the expert witness must be able to deal adequately with the problems that will arise.

The best way to avoid the causation difficulties is to have the expert give testimony in clear, simple terms indicating confidence in the opinion. While there will usually be some doubts as to causation on scientific terms, carefully planned and phrased testimony can contain what the expert's testimony would be if he or she were asked to place qualifications on it.

Thus, a tactic that counsel should consider in such a case is to have the qualification as to direct causation come from counsel in the framing of his question. This will allow the expert to testify directly that the condition or illness was caused by the exposure. The jury would then be free to reach the conclusion that the words of qualification are a term of art that can be disassociated from the expert's testimony:

- Q. Now doctor, you've examined the plaintiff, read his chart and history, and reviewed the research on this chemical and the plaintiff's illness. In light of what you've seen and read, do you have an opinion regarding the cause of _____ [*illness or condition*]?
A. Yes.
Q. Do you hold that opinion within a reasonable degree of medical probability?
A. Yes.
Q. What is your opinion, Doctor?
A. The _____ [*hazardous chemical*] caused the _____ [*illness or condition*].

³⁶On the form of the expert's testimony on the issue of medical causation, see Admissibility of opinion evidence as to cause of death, disease, or injury, 66 A.L.R. 2d 1082 § 7.

Cases

Expert's testimony that plaintiff cleaning employee's injuries were probably caused by exposure to two cleaning solvents, trichloroethane (TCA) and perchloroethylene (Perc), did not meet *Daubert's* requirement of reliability; expert conceded that only five organic solvents, none of which was involved in instant case, had been proven to be neurotoxic, that it would be improper to infer conclusions as to toxicity of TCA and Perc based on toxicity of other solvents, and that repeated exposure to nonpersistent toxins such as organic solvents over long period must be documented to establish causal relationship. *Schudel v. General Elec. Co.*, 120 F.3d 991 (9th Cir. 1997).

While expert in fields of toxicology and internal medicine could testify generally, in toxic tort case, as to symptoms associated with and harmful effects of exposure to benzene, toluene, styrene, and xylene, he would not be allowed to testify that claimants alleged exposure to these substances, at any level, had significantly increased their risk of developing cancer and required that they be examined twice a year by specialist; such testimony, offered in support of medical monitoring claim, was not based on any existing studies or extrapolated from them, and was not shown to have any support in medical or scientific literature. *Fed. R. Evid.*, Rule 702. *In re Ingram Barge Co.*, 187 F.R.D. 262 (M.D. La. 1999); *West's Key Number Digest*, Evidence ¶555.10.

Evidence and expert testimony regarding scientific theory demonstrating that exposure to solvents may cause toxic encephalopathy was admissible in FELA action in which 84 employees sought damages for alleged brain damage due to exposure to solvents, despite fact that theory had been criticized by some experts, where scientific theory had been frequently tested over 25 year period, no other precise diagnostic device had been developed to show causation, experts testified at length regarding theory, and research was conducted independently of litigation. *Federal Employers' Liability Act*, §§ 1 et seq., 45 U.S.C.A. §§ 51 et seq.; *Rules of Evid.*, Rules 702, 703. *McDaniel v. CSX Transp., Inc.*, 955 S.W.2d 257 (Tenn. 1997).

Epidemiological studies indicating that exposure to a substance more than doubled risk of injury may be part of evidence supporting causation in toxic tort case; however, other factors must be considered, and to raise fact issue on causation, and thus to survive legal sufficiency review, plaintiff must show that he or she is similar to those in studies, including proof of exposure to same substance, that exposure or dose levels were comparable to or greater than those in studies, that exposure occurred before injury, and that timing of onset of injury was consistent with that experienced by those in study, and also must offer evidence excluding other possible causes of disease with reasonable certainty. *Merrell Dow Pharmaceuticals, Inc. v. Havner*, 953 S.W.2d 706 (Tex. 1997), reh'g overruled, (Nov. 13, 1997).

Admission of expert's conclusion that worker's inhalation of organic solvent containing 57% gamma-butyrolactone (BLO) and three other chemical compounds in smaller quantities caused worker's short-term symptoms was not abuse of discretion in worker's toxic tort action against solvent's manufacturer, even though there was no epidemiological support for conclusion that inhalation could cause worker's symptoms, expert considered case reports, and expert did not quantify

amount of solvent to which worker was exposed, given district court's thoughtful and thorough inquiry into validity of expert's conclusion and absence of anything in the record to suggest that it was result of unreliable methodology. Fed R Evid Rule 702. *Bonner v. ISP Technologies, Inc.*, 259 F.3d 924 (8th Cir. 2001), reh'g and reh'g en banc denied, (Sept. 19, 2001); West's Key Number Digest, Evidence ¶555.10.

§ 98 —Cross-examination

The defense attorney will invariably attack the expert's testimony on causation and the plaintiff's attorney must prepare the witness thoroughly for the cross-examination. Defense counsel's task will be to compel the expert to admit that a "probability" in the particular case actually means something less than 51 percent.

- Q. Doctor, you stated that the chemical caused the plaintiff's illness and you related it to something called a "reasonable degree of medical probability." What is that?
- A. Well, just what it says, medical probability.
- Q. So your statement was more precisely that the chemical "probably" caused the condition, is that correct.
- A. Yes.
- Q. That means you aren't certain it caused the illness?
- A. Not with absolute certainty, right.
- Q. And it's possible the chemical didn't cause the condition.
- A. Possible? Yes, it's "possible" that the chemical did not cause the condition.
- Q. A lot of things could have caused the illness, right?
- A. Within reason, yes.
- Q. You said the exposure "probably" caused the illness. By that do you mean a fifty percent chance of this causing cancer?
- A. About there, yes.

§ 99 —Redirect examination

In a jurisdiction where reasonable medical probability is equated on a quantitative standard to mean more than 50 percent or at least 51 percent, and the witness has failed to define probability precisely in percentage terms, as in the il-

lustrative testimony during cross-examination,³⁷ counsel must attempt to repair any damage done on cross-examination on redirect examination of the witness. Simply stated, the witness must be willing to testify that the probability is more than 50 percent.

Q. Doctor, you testified on cross-examination that the probability of causation was around 50 percent. Would you say that it was a greater than 50 percent chance of causation?

A. Yes.

Without such a clarification, the expert's testimony on causation obviously would be in jeopardy. The plaintiff's attorney must, of course, be aware of such a pitfall, and must be ready to cope with it.

§ 100 — Checklist

The thread of logic and consistency in an expert's testimony on causation is required for the connection between exposure and illness to be made. Thus, if the expert can present a logical progression of the disease suffered by the plaintiff from the time of the exposure to when the symptoms first manifested themselves, the expert's testimony can help win the case for the plaintiff. The framework developed in the following checklist should help build a logical consistency.

CHECKLIST

- Establish lack of pre-existing health problems
- Establish lack of other toxic exposures
- Establish the facts of the exposure, including length, frequency, and intensity
- Link the incriminated chemical to the illness in clinical studies or laboratory experiments
- Show the expected path of absorption of the chemical and why the type of illness can be related to the chemical
- Show development of the disease within any latency period
- Present firm testimony of causation

³⁷See § 98.

D. CLOSING ARGUMENT

§ 101 In general

During closing argument plaintiff's counsel has an opportunity to explain to the jury that a corporation, as well as an individual, under the American system of jurisprudence is responsible for acts that cause harm to others. Counsel should point out that there is a mechanism in place in our society to help enforce corporate responsibility,³⁸ and that it has the opportunity and duty to remedy harm caused by a negligent corporation by an award of damages to the hapless victim of such conduct.

A good technique to help secure an adequate award for a plaintiff is to ask the jury rhetorically who is in the better position to remedy the problem created by mishandling a toxic substance, an ordinary person with no training or experience in the technology of the industry or the corporation who through mishandling of it negligently allows such person to be exposed to a toxic substance.

Large corporations all too often show a willful disregard for the safety and rights of the consumer. Some of these corporations knowingly continue their hazardous operations because to remedy the situation would result in a loss of, or perhaps less, profits for the corporation.

§ 102 Illustrative Summation Highlights—Plaintiff

The success of a summation for a plaintiff in a toxic exposure case depends on how well counsel is able to weave the facts of the case into a unified and logical pattern that the jury can both perceive and believe. If the evidence is complex, it is counsel's job to simplify it on summation, rather than to go over it again in all its complexity, confusing the jury instead of helping it to understand what counsel is trying to get across. Obviously, the nature of the evidence presented to the jury in the course of the trial will have been piecemeal, making it imperative that counsel reiterate it in a brief, logical fashion at the end of the case, making certain to repeat the essential theory of the case, together with the evidence in support of that theory.³⁹

Our case is basically this: Did _____ [*plaintiff's decedent*]

³⁸Principles of Summation, 28 Am. Jur. Trials 599.

³⁹Summations for the Plaintiff, 6 Am. Jur. Trials 641.

injure his lungs; did his injury result from the inhalation of the toxic poisons we have shown was used at his place of work; and did the aggregate amount of such inhalation hurt him to the degree of disability it has been shown he has suffered? If you believe he did receive his disabling injury from such inhalation, then you will have a decision to make about what the case is worth.

We now know that asbestos is dangerous. We know that if you inhale it, if you work in a building that has asbestos, you will get the fibers in your lungs and you will eventually get lung cancer. That has finally been agreed on. We know that the Surgeon General has warned us about smoking cigarettes. His studies show, and his studies are impartial, that if you smoke a lot of cigarettes over a long period of time, you will get lung disease, whether it be emphysema or cancer.

Then there is the Love Canal, ladies and gentlemen, or how about Diamond Alley right out there? When they poisoned the water the people drink, the only way we found out about it was when they did a study on the children in Lake County and they found out that more of the children had leukemia than should have had. If it wasn't for the study, nothing would have been done. It seems that the only time something gets done is when somebody dies.

In this case _____ [*plaintiff*] was told to work where he was working when the area in which he was working was sprayed by a deadly, toxic substance. It was known that he was working there. It was known that he was wearing no protective clothing. Those who were doing the spraying were wearing protective clothing. They knew the danger. Their employer knew the danger. Everyone but this unfortunate person knew the danger. But no one wanted to stop the work long enough for _____ [*plaintiff*] to be fitted with protective clothing, or even for long enough for him to leave this dangerous area in which he was working. Of course not, this would have cost someone some money.

When this deadly toxic substance was sprayed in the area in which _____ [*plaintiff*] was working, it had a predictable result. _____ [*Plaintiff*] fell to the ground, unconscious. He was carried out by his fellow workers, and from that day his health problems began. Not before that day, mind you, but from that day. Before that time he was in prime health. He seldom had missed a day of work because of illness in the _____ [*number*] years that he had worked.

You have heard _____ [*expert*] testify that this toxic

substance inhaled in the lungs can cause the type of injury from which _____ [plaintiff] suffered immediately after his exposure to the substance. You have heard him testify that in his expert opinion this exposure was the cause of such injury.

So how do we go about doing something to stop this type of injustice? How do we protect our people against the greed of those who would profit at the expense of our health? We do it through our courts, through our jury system.

Our impartial jury system gives the jury the right by their award to say to the rest of society and all the big corporations and the multinational companies, that these tragedies must stop, that the businesses that are killing our children and our workers are no longer going to be allowed to do so without paying a price, a price big enough to make it unprofitable for them to continue doing it. And that's what this case is all about.

Even so, of course, nobody goes to jail, and so some companies will probably continue to operate in the same way because they make a great deal of money doing so. They will keep doing the same things all over, and probably that will go on. But you can stop this company from doing it by making it so expensive to do so that they will have nothing to gain from continuing it.

In your wisdom, in your consummate wisdom and experience, you can say to yourself, well, I am just going to award _____ [plaintiff] enough to make them pay for their negligence. I am going to award _____ [plaintiff] enough to make them think twice before they do this to another person.

What all this means is that if you feel from the evidence that has been presented to you, as complex as it was, that something wrong happened to _____ [plaintiff] as the result of the negligence of _____ [defendant], and that he really didn't have anything to do with what happened to him, you will award him an amount that will help to compensate him for his injury; an amount large enough to make it unprofitable for this company to do it again. An amount large enough to give this defendant a lesson; large enough to make sure they won't do it again.

E. JURY INSTRUCTIONS

§ 103 In general

Many jurisdictions today have adopted pattern jury instructions which cover virtually all of the introductory and concluding instructions that are used in civil cases as well as most of

the major areas of tort and contract liability.⁴⁰ Pattern jury instructions are frequently prepared or approved by a judicial body, and they therefore tend to be preferred by trial judges although their use is seldom obligatory.

Pattern jury instructions, while extensive, do not cover all cases, and use of pattern jury instructions does not insure against judicial error in the giving of instructions. Often it may be necessary or even desirable for counsel to offer specially prepared jury instructions. In the following sections, the article sets forth for illustrative purposes jury instructions from the model trial case. They are intended to provide a guide to the drafting of instructions in a similar case. Counsel should check local law requirements prior to adaptation or use of such instructions.

§ 104 Liability

Originally, suit was brought against the owner of the premises on which the injury occurred, the general contractor, and the paint manufacturer, but before trial it was decided to dismiss the actions against all but the painting contractor. Thus, the various theories of liability first considered were reduced to two: (1) negligence of the painting contractor in spraying the sealant in a partially enclosed area knowing that there were other unprotected workers in the area who might be affected by the fumes, and (2) wanton and willful misconduct justifying an award of punitive damages. Thus, these issues were tried on traditional common-law principles and did not require the application of special rules of law such as were involved in suits against the owner, general contractor or the paint manufacturer.⁴¹

Instructions dealing with liability for negligence, including the contentions of the parties, burden of proof, definition of negligence, and proximate cause follow below. Instructions concerning right to recover damages for negligence and for willful and wanton misconduct will be found in the section dealing with punitive damages.⁴²

CONTENTIONS OF THE PARTIES

Plaintiff contends that while employed by _____ [*em-*

⁴⁰Instructing the Jury—Pattern Instructions, 6 Am. Jur. Trials 923.

⁴¹See §§ 10–14.

⁴²See § 105.

ployer], he worked as a foreman at the construction site of the _____ [type of construction] at _____ [location]. _____ [Defendant] was the painting subcontractor at the site.

Plaintiff further contends that through the negligence of the defendant he was exposed to toxic chemicals, to wit: _____ [toxic chemicals] at the site, and that as a direct and proximate result of this negligence he was permanently injured.

The defendant admits that the plaintiff was employed by _____ [employer] at _____ [construction site] but denies that it was negligent.

BURDEN OF PROOF

The burden of proving by a preponderance of the evidence that the defendant was negligent rests with the plaintiff. Conversely, the burden of proving by a preponderance of the evidence that plaintiff was negligent rests upon the defendant. The court will define the concept of comparative negligence later in this charge.⁴³

DEFINITION OF NEGLIGENCE

Negligence is a failure to use ordinary care. Ordinary care is that degree or amount of care which a reasonably prudent person would have used taking into consideration all of the facts, circumstances, and conditions in which such person was placed at the time of the happening in question, if a happening occurred.

In determining whether ordinary care was used, you will consider whether the defendant ought to have foreseen under the attending circumstances that the natural and probable result of an act or omission would cause some damage.

You will observe that ordinary care has relative meaning: The degree or amount of care required increases in proportion to the danger that should reasonably be foreseen. However, the test is still the amount of ordinary care under the circumstances and conditions at the time the accident occurred, if it occurred.

The test for foreseeability is not whether a party should have foreseen the damage in its precise form or as to the specific property. The test is whether in the light of all the circumstances a reasonably prudent person would have anticipated that damage was likely to result to some person from the performance or nonperformance of the act.

⁴³See § 106.

Where a party by the use of ordinary care, should have foreseen some injury and in the exercise of ordinary care would have taken precautions to avoid the accident, then his performance or failure to have taken precautions would constitute negligence.

PROXIMATE CAUSE

Proximate cause is an act or omission which, in the natural and continuous sequence of events, produces the injuries and without which the result would not have occurred. Proximate cause exists when the injuries are the natural and foreseeable result of the act or failure to act.

There may be more than one proximate cause. When the negligent act of one party combines with the negligent act of another to produce plaintiff's injuries, the negligence of each is a cause. It is not necessary that the negligence of each occur at the same time, nor that there be a common purpose or action.

§ 105 Damages

The following instructions deal with the plaintiff's claims of special and general damages and the claim for punitive damages, which required a showing of actual malice.⁴⁴

DAMAGES

If you find for the plaintiff, you will determine from the preponderance of the evidence an amount of money that will reasonably compensate him for the actual injury and damage proximately caused by the negligence of the parties involved.

In determining the amount, you will consider the nature and extent of the injury; the effect upon physical health; the pain that was experienced; the ability or inability to perform usual activities; the earnings that were lost; and the reasonable cost of necessary medical and hospital expenses incurred by the plaintiff. From these you will determine what sum will compensate the plaintiff for his damages to date.

You will note that the plaintiff claims that his injury is

⁴⁴**Note:** In the model trial case there was evidence that the foreman of the painting contractor's crew deliberately ordered spraying with the sealant used by that company at the time plaintiff was exposed in order to create problems of exposure that would justify another shift at the construction site to increase the company's profits and overtime pay or shift differential pay to the company's crew. This evidence formed the basis of a claim for punitive damages.

permanent. As to such claim, no damage may be found except that which is reasonably certain to exist as a proximate result of the incident. Regarding permanent damages, you are not to speculate. The law deals in probabilities and not mere possibilities. In determining permanent damages, you may consider only those things that you find from the evidence are reasonably certain to continue.

LIFE EXPECTANCY

If you find for the plaintiff and if you find that the injury is permanent, you may consider how long the plaintiff is likely to live.

The evidence of the life expectancy of people _____ years of age is an estimate of the average remaining length of life of all persons in this country based upon a limited number of persons of that age. It is an incomplete figure and does not indicate the future life span of any individual. Such evidence is not conclusive; however, it may be considered along with all other evidence.

LOSS OF EARNINGS

You will consider whatever loss of earnings the evidence shows that the plaintiff sustained as a proximate result of the injury.

You will also consider whatever loss, if any, of earnings the plaintiff will, with reasonable certainty, sustain in the future as a proximate cause of the injury. The measure of such damage is what the evidence shows with reasonable certainty to be the difference between the amount he was capable of earning before he was injured and the amount he is capable of earning in the future in his injured condition. You should consider only those things that you find from the evidence are reasonably certain to continue.

PUNITIVE DAMAGES

If you find for the plaintiff and award actual damages, you may also consider whether you will separately award punitive damages. If you do not find actual damages, you cannot consider punitive damages.

Punitive damages is an amount which a jury may, but is not required to award as a punishment to discourage others from committing similar unlawful acts. Punitive damages may be awarded only where a party intentionally and with actual

malice injured another without lawful justification or excuse. Actual malice means anger, hatred, ill will, a spirit of revenge, or reckless disregard of the consequences of legal rights of others.

A corporation acts through its officers and employees. It is responsible for their acts or failures to act when they act within the scope of their employment. A principal's liability for willful, wanton, and malicious acts of its agent does not extend to a liability in punitive damages unless the principal has authorized, ratified, acquiesced, or participated in the agent's conduct.

If you award punitive damages, the amount should be fair and reasonable under all the facts and circumstances. It should not be excessive, nor actuated by passion or prejudice. The amount of punitive damages rests in the sound judgment of the jury and should be determined from all the evidence in the case. If no amount is awarded for punitive damages, write the word "none" in lieu of an amount in the space provided.

If you award punitive damages, you may consider and include in the award for actual damages a reasonable amount for the attorney fees of counsel employed by the plaintiff in the prosecution of this action.

§ 106 Comparative Negligence

Although any claim of comparative negligence in the model trial case will be very weak, it was an issue that had to be dealt with by the jurors.⁴⁵ The following instructions cover the issue in the model trial case:

HOW JURY IS TO ARRIVE AT A VERDICT

If you find that the plaintiff was not negligent and that defendant was negligent and said negligence was the proximate cause of plaintiff's injuries, then your verdict must be for the plaintiff.

However, if you find that plaintiff failed to prove that defendant was negligent, or that defendant's negligence proximately caused plaintiff's injuries, or if you are unable to determine

⁴⁵Trial of a Personal Injury Case in a Comparative Negligence Jurisdiction, 21 Am. Jur. Trials 715.

Liability of manufacturer or seller for injury caused by paint, cement, lumber, building supplies, ladders, small tools, and like products, 78 A.L.R. 2d 696 § 6.5 (comparative negligence).

how the accident occurred, if it occurred, then your verdict must be for the defendant.

If you find that the plaintiff was negligent, that the plaintiff's negligence directly and proximately caused his own injury and damage, and that his negligence was more than 50 percent, you will return a general verdict for the defendant. If you find that the plaintiff's negligence was 50 percent or less, you will enter a verdict for the plaintiff according to my further instructions.⁴⁶

NEGLIGENCE COMPARED

Defendant claims that the plaintiff committed an act or acts of negligence which directly and proximately caused plaintiff's injuries and damages. I have instructed you on the subject of negligence. If you find by the greater weight of the evidence that the plaintiff was negligent and that plaintiff's negligence contributed to and was a direct and proximate cause of his own injuries and damages, you will then be required to determine to what extent plaintiff's injuries and damages resulted from his own negligence compared with the negligence, if any, of the defendant.

If you find that both the plaintiff and the defendant were negligent, that plaintiff's negligence was 50 percent or less, and that the negligence of both plaintiff and defendant proximately caused plaintiff's injuries, then you must continue your deliberations and answer written interrogatories about the total amount of damage and the percentages of negligence attributable to each party.⁴⁷

ANSWERING SPECIAL INTERROGATORIES

I will give you written questions called interrogatories, on which you will decide by the greater weight of the evidence, the percentage of plaintiff's negligence, if any, that directly and proximately caused his own injuries and damages and the percentage of negligence, if any, of the defendant which directly and proximately caused plaintiff's injuries and damages.

⁴⁶In many states a "pure" form of comparative negligence exists under which the plaintiff is not barred from a recovery unless the defendant is totally exonerated of negligence. If the defendant is adjudged 10 percent at fault for the accident, the plaintiff may recover 10 percent of the total actual damages suffered. Trial of a Personal Injury Case in a Comparative Negligence Jurisdiction, 21 Am. Jur. Trials 715 § 3

⁴⁷Special Verdicts, 6 Am. Jur. Trials 1043 § 3 (written interrogatories to jury).

Your first duty regarding these questions will be to decide by the greater weight of the evidence the total amount of damages you find that the plaintiff sustained, regardless of which party caused those damages. I have previously instructed you on the subject of damages and ask that you apply those instructions here.

After arriving at the total amount of damages which you find that plaintiff sustained, you will then decide to what extent plaintiff's negligence, if any, directly and proximately caused the injuries and damages and to what extent defendant's negligence, if any, caused the injury and damage. You will express that decision in the form of percentages. The percentage of plaintiff's negligence, if any, plus the percentage of defendant's negligence, if any, must total 100 percent.

Based on the percentages you find, the court will compute any damages to be awarded by applying those percentages to the total damages.

[Further instructions on comparative damages and answering special interrogatories omitted.]