
Bruce E. Krell
INTRODUCTION

The videotape is a device capable of recording picture images and sounds on magnetic tape. The recorded material can be replayed instantaneously.

A videotape recorder can receive pictures from a television camera and sound tracks permit audio recording from a microphone or a T.V. set speaker. The result is very much like sound motion pictures.

The equipment necessary for videotaping is now being produced inexpensively. Business and industry have led the way in

---


Transverse recording, which was developed in 1956 by the Ampex Corporation, is presently the standard used in the broadcasting industry. Under this system, a two inch wide videotape is moved past recording heads at 15 or 7 1/2 inches per second. There are four record/playback heads mounted on a disc and rotated rapidly across the tape in a direction perpendicular to the tape. This process increases the relative tape to head speed to 1,500 inches per second, thus achieving frequencies of more than 5,000,000 cycles per second.

This was the first successful video recorder to be used commercially. It employed the transverse-system and was introduced at the National Association of Broadcasters Convention in Chicago. This transverse system has since been developed and is now a sophisticated technique for recording monochrome and color television signals on tape.

In 1963 smaller recorders for closed circuit use were introduced. These recorders use a helical recording technique. The helical recording technique takes its name from the following method of operation: one or two record/playback heads are mounted on a moving drum and record across the moving tape in a diagonal curve known as a helix. There are full helical and half-helical systems, the helical system using a single transducer on a drum around which tape is wrapped on a scanning assembly. Audio and control tracks occupy narrow spaces near the edge of the videotape. The drawback is that the head must have the tape for a short instant during which no signal will be available. The half-helical utilizes two head transducers on the drum to scan the videotape signal with sufficient overlap so that the electronic switching will permit sequencing the signal from the tape into continuous form with only switching time transient from one head to the next.

2 Wortman, Video Tape Recording Methods, ELECTRONICS WORLD, May 7, 1966 at 32.

An audio tape recorder picks up sounds from a microphone, radio receiver, or direct pick up from another sound recording. In the same way, the video tape recorders are capable of recording pictures from a television camera, from a television receiver, or by direct pick up from another recording. Sound tracks permit audio recording from microphone or television sets which result in sound motion pictures.

Recording on magnetic tape is an outstanding method for capturing sound and pictures for storage and repetition since it provides a high dynamic range, excellent fidelity, immediate playback, time expansion or concentration and the economy of a re-usable medium. The tape can easily be erased and re-used hundreds of times when the recorded material is no longer useful. Videotape reproductions on television have been indistinguishable from live television shows. The tape image on the video screen is not identifiable as a tape cast.

3 The development of the videotape recorder began in the early 1950s
accepting the conveniences that the videotape has to offer and have expanded the uses of the basic videotaping systems.\textsuperscript{4} in response to needs of the rapidly growing television industry. In 1963 smaller recorders for closed circuit use were introduced. Closed circuit recorders were developed and are still used for producing original videotapes. The following minimal equipment is necessary: a camera for converting the visual images into electrical signals; a microphone for picking up sound; a videotape recorder for recording the signals; a reel of magnetic tape for the recording surface; and a television set to play back the pictures and sound.

Interoffice Memorandum of Ampex Corp, from Perry dated Dec. 1, 1969 and maintained in the files of The John Marshall Journal of Practice and Procedure. The simple, less sophisticated systems range in price from $1,150 to $22,000. Other larger and more complicated systems may cost up to $100,000. Documents may be recorded by videotape recorder when desirable by placing the document face down on a glass plate. Underneath the plate is a high resolution television camera which scans and televises the document. The image is shown on a television screen in front of the operator to assure that the document is being televised properly. The camera converts the image to television signals that are guided by the system control section to a tape recording and playback machine and recorded on magnetic video-tape. This type of video recording is known to many people as instant replay.

In the 1950s many major companies both in the United States and abroad undertook engineering and development programs to employ magnetic principles to recording pictures and sound.

Although video recording is more complex and demands higher electrical frequencies, mechanical precision, and more sophisticated circuitry than does audio and instrumentation recording, the basic principle of the magnetic videotape recorder remains similar to the latter.

Audio tape recording frequency responses move at rates up to 18,000 cycles per second (e.g. in the production of stereophonic music) with the tape moving past the recorder's stationary heads. In such audio tape recording, a tape speed of 7\(\frac{1}{4}\) inches per second is the standard for high quality performances. But, television pictures require much higher frequencies and to achieve this requires moving the tape past rotating heads. This increases the frequency response, permitting the recording of picture information.

\textsuperscript{4} For a comprehensive list of the uses to which the videotape has already been introduced see Morrill, Enter — The Video Tape Trial, 2 JOHN MAR. J. PRAC. & PROC. n. 15, 16 at 249, 250 (1970).

The first network use of videotape recording was a news program broadcast over CBS on November 30, 1956. The program was originated in New York City, recorded at Television City in Hollywood, and played back later the same night for the West Coast.

Producers quickly began utilizing videotape to record much of the programming on network television. Today, approximately 50 percent of all programs are aired via tape, retaining the live quality frequently lacking in filmed presentations.

When videotape was still considered in its infancy, it was practically indistinguishable from live shows on TV and only a few months after the first videotape recorder was introduced, a technical expert from Television Magazine remarked that the tape image on the video screen was practically perfect and hardly identifiable as a tape-cast rather than a live show.

The original videotape recorder was a relatively simple device compared with the evolutionary products available today.

The early models lacked flexibility for wider uses in the production of television programs. In 1958 the first conversion units for color recording and playback were brought out. Today, taped commercials, syndication of programs by non-network producers, and on-the-spot taping of news and other events are becoming more and more common.

In the years since 1956 videotape recording has expanded and consolidated its role in broadcasting and other fields through a series of technical improvements. The technique of recording movies and sound for playback is used in a wide range of fields including education, medicine, business and industry, government and law.
The legal system has been slow to adopt the videotape and at the present time its use has largely been confined to law enforcement. However, at least two courts have ruled as to the admissibility of videotapes into evidence.\(^5\)

The Illinois Act governing evidence depositions by recording device makes no provision for videotapes,\(^6\) but only minimal changes in the Act would be necessary to make the videotaping of evidence depositions admissible.

Because the courts seek to avail themselves of every trustworthy scientific device in order to ascertain fact and truth, the videotape seems to offer a worthwhile means of recording testimony that should be accepted by our courts.

**BUSINESS USES**

Business and industry have found many purposes for the videotape. Companies can now demonstrate products to both sales personnel and prospective customers while observing their reactions. Service companies use videotape programs to train their servicemen and inform their employees of any changes in methods of servicing the products.\(^7\)

Large corporations have held executive level meetings in several cities at the same time with the use of a videotape and telephone unit.\(^8\)

Businessmen now tape educational programs for schools, professional societies and chambers of commerce. Many college professors are kept abreast of the latest technical, scientific and industrial developments through videotape films of in-plant operations.

Insurance companies and banks are given accurate and up to the minute data on finance and market trends.\(^9\)

Educational institutions have been using the videotape to teach large classes and children in underprivileged areas.

The medical field, too, has found important uses for the videotape involving clinical studies, patient progress reports, information tapes, case histories, treatment files and doctors' conferences.\(^10\)

The uses of videotape for business and industry, medicine and education\(^11\) are more sophisticated and widespread than those of law enforcement, lawyers and courts.

---

\(^{5}\) Paramore v. State, 229 So. 2d 855 (Fla. 1969).
\(^{8}\) Id.
\(^{9}\) Id.
\(^{10}\) Id.
\(^{11}\) Id.
LAW ENFORCEMENT AND COURT USES

In Douglas County, Oregon, several men charged with various offenses ranging from drunken driving to rape, changed their pleas from innocent to guilty because videotape was used by the police. According to the Douglas County district attorney, defense attorneys shown videotapes of their clients under the influence of alcohol or making confessions have been convinced of the strength of the county's case.1

In the Florida case of *Paramore v. State* 13 the state obtained a murder conviction through the use of a videotaped confession.14 The Florida Supreme Court upheld the conviction as well as the admissibility of defendant's videotaped confession.15 The defendant had been awaiting the electric chair for 18 months and had twice been sentenced to die, once for murder, the second time for rape. The defendant's court appointed attorney argued in vain that the state should not have been allowed the use of the videotape made of defendant when he was arrested. A jury had watched the taped confession, heard defendant's explanation that he confessed because of police threats, and resolved the question of fact for the state.16

The court in the Paramore case specifically stated that the introduction of the videotaped confession was not improper in spite of the allegation that it was obtained only after false in-

12 Schiffman, the Douglas County District attorney, said:
In the few months I've had the records, camera and monitor, we've been teaching police officers how to take statements and how to give the proper legal advisements to suspects, in accordance with the most recent court rulings. We record drunken driving tests, using both the audio and video capabilities of the equipment. In the past, we used movie films for this, but the tape is faster, it provides a sound record of the suspect's voice, and it can be reused. One of the most important uses we've made of our equipment is recording confessions. The impact of these recordings is threefold. In the first instance, they show that the legal advisements have been properly given to the suspect. Secondly, we find that if an officer takes a confession verbally, the defense tries to impeach the credibility of the officer and his version of the confession. The tape provides an objective record. Lastly, we are able to show these confessions to defense attorneys and replay them again and again if necessary. We haven't been able to test this technique in court yet because the defense attorneys who have seen our tapes have advised their clients to plead guilty. Perhaps, this is the best proof of the validity of the technique. The sight of a drunken driver disheveled, the inability to coordinate his actions during tests, the usual and audible record of advisements being given, and the facial expressions and voice of a suspect confessing are difficult to question. And it is difficult to alter this videotape recording without leaving some trace.

13 Anderson, *Court OKs Tape Confession in Death Penalty of Miamian*, the Miami Herald, Sept. 11, 1969, at 3, col. 2. In this article the paper mentions Paramore v. State, 229 So. 2d 855 (Fla. 1969).
15 *Id.*
16 *Id.*
ducement by a police officer claiming that it would be a benefit to defendant. The officer explained that the tape would be used for court purposes and would be an exact statement of what defendant said so that there would be no mistake.\(^\text{17}\)

The court held that it is not necessary for the state to prove continuity of possession in order to have the videotape admitted into evidence, where it is thus shown that the tape of defendant's confession was an accurate reproduction of the entire interview between the officer and the defendant.\(^\text{18}\)

In perhaps its most significant ruling the Paramore court stated that the rule governing the admissibility of photographs in evidence applies to both motion pictures and videotapes.\(^\text{19}\)

For this proposition, the court relied on People v. Hayes,\(^\text{20}\) where a sound motion picture of defendant's voluntary confession was held admissible against defendant's contention that he was denied the right to be confronted by witnesses against him in court. The contention that a filmed confession is unsworn testimony was also found to be without merit.\(^\text{21}\) The same result should meet similar conditional and evidentiary objections to videotape.

Defendant in Hayes was convicted of manslaughter and appealed his dismissal of a motion for a new trial. The court permitted motion pictures of defendant making the confession. The law is settled that a properly made confession can be received in evidence.\(^\text{22}\) The Hayes court stated that as long as the motion picture is an accurate reproduction of that which occurred (an orthodox mechanical medium), the trial judge has the discretion. It is the court's policy to avail itself of each and every aid of science for the purpose of ascertaining the truth; thus, the practice is commended as of inestimable value to triers of fact in reaching accurate conclusions. When a confession is presented by means of a movietone the trial court is enabled to determine more accurately the truth or falsity of such claims and rule accordingly.

Where a movie is taken without artificial reconstruction, \emph{i.e.}, at the time and place of the original event, it is entitled to be admitted on the same principles as still photographs. The only circumstance then to be considered is that in a few matters, such as speed and direction of human movement, or relative size in the focus, the multiple nature of the films requires special allowances of error to be made; but these allowances are no

\(^{17}\) Id. at 858.

\(^{18}\) Id. at 859.

\(^{19}\) Id.


different in kind from the elements of error inherent under certain conditions in still photographs.23

Two other cases have admitted videotape into evidence for limited purposes. Judge Robert Gardner of Santa Ana, California allowed a jury to view a videotape of a mother accused of killing her child.24 The tape showed a reenactment of the crime while defendant was under drug influence at the direction of a psychiatrist. Although the jury was cautioned against considering the tape as direct testimony, the jury viewed the film and then took into account all the other evidence and considered it only for its bearing on the psychiatrist's testimony.25

In a Kansas courtroom, Thomas Kidwell had been convicted by a judge and jury of the first degree murder of his wife.26 When he was granted another trial, his attorney brought him to Menninger's Clinic hoping that a psychiatrist could learn more about the incident than others had.27 Under sodium amobarbital, the suspect recreated the crime while the psychiatrist took a videotape recording.28 The tape was shown to the jury, not as inculpating evidence, but as supportive evidence for the prosecuting attorney's reducing the charge to manslaughter. The tape clearly showed that deceased had shot defendant first, according to the re-enactment of the crime by defendant.29

There have been statements made by courts in many jurisdictions concerning the uses and help that sound motion pictures are to a fair trial. It appears that the videotape is a logical extension of the motion picture, the major difference being in the method of recording.30

One court31 highlighted the problem that the videotape was to have regarding acceptance and admission by discussing the role that a color motion picture plays in a trial. In a case involving prosecution for homicide the court stated that a color motion picture film portraying a voluntary re-enactment of the crime was admissible as tending to supplement and explain the confession. The court further stated:

Motion picture films and photographs are admissible in evidence if they tend to illustrate or explain the testimony of a witness. The rule governing admissibility in evidence of photographs applies in equal force to the admission of motion pictures . . . [W]hen the events which are being photographed consist of voluntary re-enactment . . . there is little, if any, danger of misleading

23 Id. at 328.
24 Time, Jan. 5, 1968, at 47.
25 Id.
28 Id.
29 Id.
30 See note 1 supra.
31 Grant v. State, 171 So. 2d 361 (Fla. 1965).
emphasis which is unfavorable. Moreover, as a method of presenting confessions, sound motion pictures appear to have a unique advantage in that, while presenting the admission of guilt, they simultaneously testify to facts relevant to the issue of volition.

Where a motion picture involves reconstruction and re-enactment it may be subject to the same objection as posed photographs of the scene, viz.: That the bias of the party or agent preparing the scene, directing and taking the pictures had intruded and affected the accuracy of pictures. However, where, as here, the defendant himself has voluntarily acted out the crime at the scene, the danger of one-sided or inaccurate presentation is minimized.\textsuperscript{32}

The reasoning process which necessitates such a result in the case of motion pictures has as its basis still photographs. In \textit{State v. Palmer},\textsuperscript{33} the Louisiana Supreme Court reasoned as follows:

\begin{quote}
It is significant that the defendant went to the scene of the crime where these photographs were taken, voluntarily and without protest. There is no denial of that fact. There is no proof or suggestion that the defendant was promised, induced or coerced in any manner to enact the facts surrounding the crime. Manifestly, the words and actions of the defendant in describing how and in what manner he had committed the crime charged was a recapitulation of his oral confession of an hour previous and can be correctly held to be a second and separate confession. The photographs taken alone, in connection with the demonstrated actions of the defendant, with his voluntary statements, were also nothing less than a pictured confession, the admissibility of which is approvingly received by a great majority of our states. The testimony of the officers explaining these photographs and what transpired at that time, is not to be considered irrefutable proof of what in fact occurred, but as an illustration by the defendant himself in proof of his motive and intent.

Let us assume that the statements and actions of the defendant at the scene of the crime were made in the presence of these officers without the use of photography, can it be said that the preferred testimony of these officers detailing these facts at the trial would be inadmissible? We readily think not. . . .\textsuperscript{34}

Locally, a three-week test in Skokie found that the quality of maintaining a complete court record on videotape far surpassed court reporter's transcripts or audio recording of the proceedings.\textsuperscript{35}

The Illinois Revised Statutes giving witnesses the right to

\textsuperscript{32}Id. at 363-64.

\textsuperscript{33}227 La. 691, 718, 80 So. 2d 374, 382-84 (1955).


\textsuperscript{35}Sullivan, \textit{Court Record by Videotape Experiment — A Success}, 50 Chi. B. REC. 336 (1969). Judge Sullivan and six magistrates agreed that the transcriptions of the proceedings were far superior to anything they had experienced before. The judges stated that because people knew they were being recorded they conducted themselves with much more dignity than they otherwise might have. The cameras were not obvious enough to
refuse to testify in front of a camera \(^{26}\) does not cover the situation where the cameras were being used to preserve the standard court recording. Once a court can effectively control tapes, the evils sought to be avoided are not involved.\(^{37}\)

An experiment of the Akron Bar Association dealt with a trial court case in which a videotape was admitted. The trial court case arose prior to Paramore v. State. Commentary on the case stated:

The reaction by judges to dry runs has been lively, with special interest in the taped testimony of such expert witnesses as doctors and ballistic specialists. Trials are often delayed because an expert cannot testify at a time convenient to the court. By videotaping his testimony before the two opposing lawyers, he can appear whenever he has time. So far, apparently, only one court has admitted any videotaped evidence. In Charleston, West Virginia, the police had taped a drunk driver after his arrest. At his trial, Municipal Judge John Charnock allowed the videotape as secondary and corroborating evidence. He found the man guilty.\(^{38}\)

Soon, other courts will have to decide what uses of videotapes are admissible. Professor Charles Joiner, Associate Dean of the University of Michigan Law School, sees no reason why tapes should be barred:

In the not so distant future the testimony of each party and witness could be taken at his convenience and when all is in readiness the jury could be shown the tape. Lawyers will still probably want most witnesses to appear live in court but further persuasive advantages of tape is that the jury would see and hear only those parts of the testimony that were properly admissible, thereby blocking those attorneys who introduce clearly objectionable material so that juries will hear it before it can be ruled out.\(^{39}\)

**THEORETICAL BASIS FOR VIDEOTAPE AS EVIDENCE**

Videotapes, when they are admitted as evidence, will undoubtedly be accepted by reasoning similar to that employed in admitting photographs, moving pictures, sound recordings, and X-rays. Of course, the closest parallel is to motion pictures. But the theoretical basis for the admission of motion pictures is largely by analogy to photographs.

Photographs may be either direct or circumstantial evidence. Direct evidence is that evidence which proves a fact in dispute without inference or presumption.\(^{40}\) If it is true, it conclu-

---

\(^{26}\) ILL. REV. STAT. ch. 51, §57 (1969) note infra.

\(^{37}\) See note 14 supra.

\(^{38}\) TIME, Dec. 22, 1967 at 47. The case never came up for appeal. (emphasis added.)

\(^{39}\) Id.

\(^{40}\) J. WIGMORE, EVIDENCE §792 (Chadbourn rev. 1970).
Legal Use of Videotapes

sively establishes the fact. Direct evidence immediately points to the question at issue. It is positive in its character, while it often depends upon the credibility and intelligence of the witnesses who testify to a knowledge of the facts, it may also be documentary in character. Direct and circumstantial evidence differ merely in their logical relations to the fact. Circumstantial evidence is composed of facts which raise a logical inference as the existence of the fact in issue. Generally, still photographs are admissible as either direct or circumstantial evidence, yet where the fact evidenced by the photograph is not admissible, naturally the photograph isn't either. Usually, objection is based on contentions that the outward appearance of the place or person is not evidence of the inward condition, but such objections are seldom favorably considered by the court.

The objection to the admissibility of photographs based on the proposition that they may misrepresent the object is misplaced because the criticism goes to credibility and not admissibility. The problem is one of authentication. In other words, a photograph can falsify no more than the human being who verifies it. Where a qualified observer states that the photograph represents the facts as he saw them, the effect is the same as a witness' oath.

Perjury cannot be determined in advance by the judge, but is a jury question for photographs as well as for verbal testi-

---

41 People v. Chadwick, 4 Cal. App. 63, 87 P. 384 (1906).
43 3 J. WIGMORE, EVIDENCE §792 (Chadbourn rev. 1970); Dept of Pub. Works and Bldgs. v. Chicago Title & Trust Co., 408 Ill. 41, 95 N.E.2d 903 (1950). The court held that aerial photographs of certain property sought to be condemned by the city were properly excluded as it was a matter of discretion with the judge. However, in this action the jurors had ample opportunity to inspect the premises and felt that nothing could be gained in light of the jury's first hand inspection; People v. Crowe, 390 Ill. 294, 61 N.E.2d 348 (1945). It is not error to refuse to admit photographs if the scene has been arranged just for the purpose of taking a picture if the picture would not show the locus as it existed at the time of the crime. Here the way the surroundings and parties were posed was taken merely to support defendant's case; People v. Maffioli, 406 Ill. 315, 94 N.E.2d 191 (1950). The court rejected the defendant's contentions in this, a criminal case. Defendant contended that it was prejudicial error to introduce "mug" shots from which defendant was identified. The court was apparently convinced of the admissibility of photographs discussing only the prejudice which might attach to police department pictures.
44 Id.
45 Foster v. Bilbruck, 20 Ill. App. 2d 173, 155 N.E.2d 366 (1950). The courts in Illinois have long admitted photographs for a better presentation of evidence but the photos are not evidence in themselves. They are allowed for the purpose of enabling the jury to understand and apply the testimony. Cf. People v. Crowe, 390 Ill. 294, 61 N.E.2d 348 (1945) where the court held that photographs of a scene or objects taken while posed or arranged by one party, for the purpose of taking the photograph, in a way or manner sought to be shown are not admissible.
47 State v. Fox, 25 N.J.L. 566 (1856).
mony.48 The judge can warn the jury as to deceptive possibilities of photographs, but no more, and the opponent is sufficiently protected because he has a greater opportunity to expose photographic perjury than other sorts.49 Likewise, there can be warnings to the jury as to any deceptive possibilities of the videotape, but the chances are lessened by the method of transcription.

Regarding the X-ray photograph, personal knowledge supplied by such scientific instruments is always admissible provided that the instrument or process is known to be a trustworthy one.50

To justify testimony as to such instruments, the following is needed: (1) professional testimony as to the trustworthiness of the process; (2) the correctness of the particular instrument (as testified to by the same person as in number 1).51

Where the science has advanced to a certain degree of general recognition, the trustworthiness can be judicially noticed. There has been no such judicial notice taken of the videotape as a scientific advancement that merits trustworthiness to date, but there seems to be no difference in the qualifications necessary for the machine or the operator.

Thus, any individual operating the videotape could qualify the particular machine used and, at the same time, qualify himself by testifying as to his prior training and experience. If necessary, such operators could be state registered or even tested and licensed.

The type of qualification necessary to the admission of X-rays, maving pictures and sound recordings could thus be adopted by the courts to qualify the videotape machine and its operator.

A brief survey of the rules of admission for these analogous recording means may therefore be helpful for comparative purposes.

MOVING PICTURES

Moving pictures have most often been used in personal injury cases, showing a plaintiff behaving in an active way inconsistent with his alleged disability.52 In a criminal trial, a

---

48 Id.
The court reversed the findings of the trial court assigning as error the admission of an X-ray because there was no proof as to the correctness and accuracy of the results. The court noted that to be admissible there must be a showing that the picture was taken by a competent technician.
51 3 J. WIGMORE, EVIDENCE §795 (Chadbourn rev. 1970).
52 Sweet, The Motion Picture as a Fraud Detector, 12 A.B.A.J. 653 (1921).
When an investigation (by a party or claims department of an
movie of the accused making his confession can demonstrate his freedom from compulsion. The moving picture also is often used in patent litigation.

Since the value of posed pictures depends on the correctness of the artificial reconstruction, and moving pictures are a series of complex movements involving several actors, the reliability, as identical with the original scene, is decreased and may be minimized to the point of worthlessness. A party's hired agents may so reconstruct an original scene as to go considerably further in his favor than the witness' testimony has gone.

Where a moving picture is taken without artificial reconstruction, that is, at the time and place of the actual event, it is entitled to be admitted on the same principles as still photographs. Allowances such as speed, direction of human movement, or relative size in the focus are no different in kind from the elements of error inherent under certain conditions in still photographs.

Videotapes of testimony should be as readily accepted as filmed confessions.

---

insurance company) and a physician's report point to a strong possibility of fraud, a special investigator who is tactful, honest and able to use a motion picture camera should be employed. The picture industry has now reached the stage where films taken with a proper camera reveal the activities of an individual and furnish indisputable evidence. Many jurors are patrons of movie theaters and give their utmost attention to a movie in a courtroom.

When a person comes into a courtroom in a wheel chair claiming that he has been confined to it since leaving the hospital, it is diverting and persuasive to see this cripple doing the running broadjump, or a backflip from a springboard.

Often, the operator must induce a short vacation because it is only in such a setting that the party will return to normal, unguarded activities.

In California, both claims examiners and trial attorney find the motion picture camera a most powerful weapon in combating fraud and malingering. The courts have ruled that motion pictures are admissible. Science and inventive genius have placed this weapon in man's hands and it is the only means that demonstrates beyond question that a clever claimant is a malinger.

53 J. Wigmore, Evidence §798A (Chadbourn rev. 1970); State v. Paramore 229 So. 2d 855 (Fla. 1969).

54 Id.

55 See, Morris v. E. I. DuPont De Nemours and Co., 346 Mo. 126, 139 S.W.2d 984 (1940). The dangers of false perspective or intentional fabrication were thought by the court to be greater in moving pictures than still pictures. In the instant case all problems of admissibility were, however, avoided by stipulation of the parties.


The court rejected the defendant's contention that moving pictures are misleading as they do not show a continuity of action. The court felt this objection was baseless in light of the fact that the operator of the camera described how the movie was shot. The court took notice of the fact that everyone realizes this fact that movies take a great deal of time to make because of the care required in setting up cameras and proper exposure.

58 Kennedy, Motion Pictures in Evidence, 27 Ill. L.R. 424 (1932-33).

Since a motion picture is nothing more than a moving testimony of
The admissibility of sound recording devices has been recognized by text writers, advocated by commentators, and accepted by some courts for over 50 years. Sound recordings

the subject as to the fact portrayed in the picture, it generally has been admissible. A motion picture, cannot falsify any more than a person who takes it and verifies it by his verbal testimony, and for this reason, such evidence is almost the best obtained.

An Illinois court admitted into evidence in the late 1920s a motion picture which showed the plaintiff's case.

In order that motion pictures be admissible, there must be a proper foundation in oral testimony to give credence, and the motion picture must be properly identified. It must be shown that it is an accurate portrayal, material and relevant to the issue of the case.

The competence of the operator is the first step in establishing the accuracy of the pictures which are to be offered in evidence. This can be shown by oral testimony showing the extent of his experience in taking and portraying this type of picture. Knowledge of the mechanism of the camera and projector is also proof of such competency.

The operator must fully describe the mechanism and operation of the camera used in taking the pictures. This would include the type of lens used, the adjustments used on the lens, and that the camera was in perfect working condition at the time the films were taken. The types of film must be described as to size, consistency, and the manner in which it is exposed before the lens of the camera. This testimony should show the number of pictures which pass before the lens to create normal speed and thus accurately record, as to speed, the movements of the objects photographed.

The operator should next describe the weather and similar conditions under which the film was exposed. Included would be an explanation of the adjustment of the lens, the speed at which the camera was set, and the distance of the object from the camera. He can also testify, as to what he saw through the direction finder of the camera with his naked eye, that he viewed the pictures after development, and that they correctly and accurately portrayed what he saw through the direction finder, while the pictures were being taken.

If the film was developed by the operator, he should make a general statement as to his competency in developing, the manner in which he developed it, and what happened to it afterwards. If someone other than the operator developed the picture, that person should be brought in to likewise testify as to his competency. The witness describing the development of the film should testify that after the film was developed, it constituted a continuous roll of pictures not mutilated or cut in any manner.

Although all the foregoing requirements need not be met in every given case in order that motion pictures be admitted, when there is no case which sets up requirements for the admissibility of motion pictures, caution dictates expansive rather than restrictive proof.

After the film has been identified and received in evidence, it may be portrayed on the screen if evidence has been introduced to establish the accuracy of the pictures.

The projector should be shown to be in perfect working condition and the jury might even be shown how the projector works. The size and type of screen which is to be used should also be described showing the distance which the screen has been placed from the projector.

The foregoing should establish sufficient foundation for the admission of motion pictures as evidence.

"3 J. WIGMORE, EVIDENCE §795A (Chadbourn rev. 1970); MCCORMICK, EVIDENCE §181 (1954). The author recognized the admissibility of moving pictures with accompanying sound.

"Fuller, Let's Hear the Witness, 44 ILL. B.J. 260 (1955).

"Boyne City G. & A. R. R. v. Anderson, 146 Mich. 328, 109 N.W. 429 (1906). It is interesting to note that this case was decided barely twenty years after Edison had developed his first working model and at a time when the quality of reproduction still left much to be desired.
have been received in both civil and criminal cases. The type of device admitted has varied from turn-of-the-century disc recorders to modern wire recorders and tape recorders. The sound recording has not always been that of a human voice and in fact many interesting cases can be found involving a variety of sounds.

The proper foundation must, of course, be laid. The courts appear to be in agreement as to what is the proper foundation. Steve M. Tolomon Jr., Inc. v. Edgar, in admitting a sound recording, appears to have made rules universally followed. To be admissible there must be: (1) a showing that the recording device was capable of taking testimony; (2) a showing that the operator of the device was competent; (3) establishment of the authenticity and correctness of the recording; (4) a showing that changes, additions, or deletions have not been made; (5) a showing of the manner of the preservation of the recording; (6) identification of the speakers; and (7) a showing that the testimony elicited was voluntarily made without any kind of inducement.

With the courts' present acceptance of recordings it would appear that re-recordings will be admissible under the proper
circumstances, but the state of the law is uncertain at the present time.

THE X-RAY

In all courts, the X-ray is recognized, but the following requirements are theoretically necessary:

1. The particular instrument must be testified to have been of a type of construction accepted as dependable for the purpose at hand and also to have been in good condition when used.

2. The witness operating the apparatus and taking the photograph must be qualified for that work by training and experience.

3. The operator of the apparatus must be called as a witness to the photograph in order to testify, unless the technician is locally well-known.

4. The operator taking the photograph must verify the identity of the person or object.

5. The operator may be required explicitly to identify the photograph shown in court as the photograph taken of the person or object in issue to guard against the wrong photograph being selected from a file of many.

6. The condition of the person or object at the time of being photographed may be required to be evidenced as being substantially the same as at the time in issue in the case.

7. Because X-ray photographs reveal a shadow, interpretation is of great importance. The significance of the shadow depends on the nature of the anatomical or pathological data existing within the body that is X-rayed, so not all X-ray pho-

This line of reasoning is interesting for two reasons:

1. While the recording itself cannot be cross-examined the operator can be.

2. If this reasoning were universally applied, courts would never admit scientific demonstrative evidence whose purpose was to prove the out of court occurrence of some fact. This decision has never been overruled hence remains the law in New Jersey although this decision was questioned in State v. Driver, 38 N.J. 255, 183 A.2d 655 (1962).

71 Hurt v. State, 303 P.2d 476 (Oka. Crim. App. 1956). A tape recording was made of a conversation containing privileged matter. The privileged matter was apparently deleted with no difficulty.


73 Quadlander v. Kansas City Public Service Co., 240 Mo. App. 1134, 1135, 224 S.W.2d 396, 397 (1949).


75 Id.

76 Kennedy v. Bay Taxi Cab Co., 325 Mich. 668, 39 N.W.2d 220 (1949); Florence v. City of Chicago, 76 Ill. App. 2d 43, 221 N.E.2d 790 (1966). The court refused to allow the examining doctor to testify because the X-rays which were not accessible at the time of trial had been destroyed in a fire. However, the case really turned on the fact that there could be no effective cross-examination.

77 Arkansas Amusement Corp. v. Ward, 204 Ark. 130, 111 S.W.2d 178 (1942).
toographers are qualified. A specialist only in such interpretation is the roentgenologist. Interpretation by a witness qualified to interpret is always a necessity. A photograph of an X-ray should not be shown to the jury without the testimony of a witness qualified to interpret, and the ordinary technician is not so qualified merely because of his skill as a technician.

8. A witness who testifies orally to knowledge obtained by studying an X-ray photograph must be prepared to produce the photoprint and the original plates if desired for cross-examination as to the grounds of his interpretation. These same photographs and plates may then be used by other experts for other interpretation.

9. A point often noted is that the witness who qualifies as to knowledge, after observing personally through an X-ray apparatus, need not have taken the photograph, but this lessens the value of his testimony.

10. Enlarged photographs are usable, precisely as with ordinary photographs.

---

78 Quadlander v. Kansas City Public Service Co., 240 Mo. App. 1134, 224 S.W.2d 396 (1949).
79 Scott, Roentgenograms and Their Chronologic Legal Recognition, 24 Ill. L. Rev. 674 (1929-30):
A roentgenogram is, in reality, nothing more or less than a picture of shadows, and if the term shadowgraph or skiagraph were used, it would give a much clearer idea and would perhaps afford a better understanding of its legal value. There is but little doubt that this failure to understand just how these pictures are produced leads to much misconception of their value as evidence.

Radiographs have shown what appeared to be a fracture when none existed. In other cases, a demonstrable fracture showed no signs of a break on radiographing. The callus which is thrown about a fractured bone is very translucent and may show a space which resembles an un-united fracture; at the same time, the bone may have sufficient strength to bear the weight of the body.

A skiagraph needs to be interpreted properly with due regard to limitations; hence, allowing it to go to a jury without explanations may lead to an erroneous interpretation. Even surgeons who are familiar with the normal relations of joints may fail to interpret a radiograph correctly. Those who are most skilled in estimating the value of radiographs are unanimous in the opinion that they should be taken only by skilled operators, and their interpretation should be entrusted to someone who has had practical experience in radiographic work. From a practical standpoint, I believe that a surgeon who is skilled in radiographic work is in a better position technically to interpret an X-ray film than an individual whose sole training has been merely in the taking and interpretation of X-ray films. This is no argument against their admissibility in evidence, but simply that it should be subject to certain limitations.

80 Howell v. George, 201 Miss. 783, 80 So. 2d 603 (1947); Chailland v. Smiley, 363 S.W.2d 619 (Mo. 1963).
82 Id.
84 Accord, Abbott Laboratories v. Bank of London and South America, Ltd., 351 Ill. App. 227, 114 N.E.2d 585 (1953). Over the defendants' ob-
11. To establish a standard of normality to judge an abnormal condition, other X-rays of the corresponding part in other normal persons may be received.\textsuperscript{85}

12. If the original is obtainable and has not been produced, an ordinary photograph is inadmissible.\textsuperscript{86}

**Statutory Enactments**

At the present time in Illinois, the revised statutes do not make mention of whether depositions may be videotaped. The Illinois Revised Statutes are also unclear as to the necessity for subsequent transcription.

Sound recording devices are permitted under the statute for the recording of testimony, if the parties agree. An officer of the court must be present to duly swear the deponent.\textsuperscript{87}

The manner in which discovery can be recorded in Illinois is governed by section 206 (e),\textsuperscript{88} which provides:

The officer before whom the deposition is to be taken shall put the witness on oath and shall personally, or by someone acting under his direction and in his presence, record the testimony of the witness. The testimony shall be taken stenographically or by sound recording device unless the parties agree otherwise, and shall be transcribed at the request of any party. Objections made at the time of the examination to the qualification of the officer taking the deposition, to the manner of taking it, to the evidence presented, or to the conduct of any person, and any other objection to the proceedings, shall be included in the deposition.\textsuperscript{89}

Although this statute has not been construed on appeal, it is apparent that:

1. If the parties agree, discovery may be recorded by any method, including audio and video tape recorders.

2. Absent agreement of the parties, testimony must be taken stenographically.

3. Even if the parties can agree that discovery testimony will be taken other than stenographically, this statute makes no provision for the admission of the testimony in a transcribed form.

The former statute in Illinois provided that all depositions must be transcribed.\textsuperscript{90} The present Illinois Act\textsuperscript{91} provides:

The officer shall certify on the deposition that the deponent was duly sworn by him and that the deposition is a true record of the testimony given by the deponent. A deposition so certified requires

---

\textsuperscript{85} State v. Mihoy, 98 N.H. 38, 93 A.2d 661 (1953).

\textsuperscript{86} 3 J. WIGMORE, EVIDENCE §795 (Chadbourn rev. 1970).

\textsuperscript{87} See statement of the Illinois statute in text at note 89.


\textsuperscript{89} Id. (emphasis added).


no further proof of authenticity. At the request of any party, the
officer shall then securely seal the deposition, together with all ex-
hibits, or copies thereof, in an envelope bearing the title and num-
ber of the action and marked 'Deposition(s) of (here insert the
name of deponent(s) )' and promptly file it or send it by registered
or certified mail to the clerk of the court for filing.  

This statute then makes it apparent that at the present time
in Illinois not all depositions need be transcribed. On the other
hand, this does not imply that unless the testimony is transcribed
it would be admissible. As to this point the Appellate tribunals
of Illinois have not yet spoken.

Illinois also has enacted a statute which provides that no
witness can be compelled to testify in a judicial proceeding if
the testimony is to be broadcast or if there is to be made a
moving picture of the testimony. This is a reaction to the
McCarthy hearings, but nevertheless provides a stumbling block
to the taking of a deposition by videotape recorder.

The federal statute provides in part: 

The officer before whom the deposition is to be taken shall put the
witness on oath and shall personally, or by someone acting under
his direction and in his presence, record the testimony of the wit-
ness. The testimony shall be taken stenographically and tran-
scribed unless the parties agree otherwise. All objections made
at the time of the examination to the qualifications of the officer
taking the deposition, or to the manner of taking it, or to the
evidence presented, or to the conduct of any party, and any other
objection to the proceedings, shall be noted by the officer upon the
deposition. 

This statute differs from the Illinois act in one significant
respect: That is, absent agreement of the parties, testimony
must be taken stenographically. Illinois, on the other hand, al-
 lows discovery to be recorded stenographically or by sound re-
cording device.

In the case of United States Steel Corp. v. United States, this fact became painfully clear. The plaintiff attempted to re-
cord its witnesses' deposition by the use of a videotape recorder.

---

92 Id. §207(b) (1).
93 Fuller, Let's Hear the Witness, 44 ILL. B. J. 260 (1955). However,
the testimony must be transcribed in some manner for purposes of appellate
construction and considerations.
94 ILL. REV. STAT. ch. 51, §57 (1967); which provides:
No witness shall be compelled to testify in any proceeding conducted by
a court, commission, administrative agency or other tribunal in this state
if any portion of his testimony is to be broadcast or televised or if mov-
ing pictures are to be taken of him while he is testifying.
95 Numford, Changes in the Illinois Law of Civil Rights, 10 DePaul
96 Fed. R. Civ. P. 30(e).
97 Id.
98 ILL. REV. STAT. ch. 110A, §206(e) (1967).
99 Id.
The defendant was given notice of the deposition and the manner in which it was to be taken. The defendant sought a ruling on the propriety of recording the deposition by a means other than stenographically under the federal rules. The court distinguished various New York decisions, which had allowed the use of recording devices to record depositions on the ground that the statute was different.

While the New York statute was unclear as to the allowance of recording depositions by recording device, the federal statute was construed to be, and is, clear in its limitations of recording depositions only by stenographic means.

The court also felt constrained to follow the precedent of A. L. Galley v. Pennsylvania Railroad Company. This case involved a deposition by means of an audio tape recorder. The court noted:

Testimony taken by a tape recorder is not taken stenographically. Failure to have a stenographer record the deposition would therefore not be a compliance with the rule. The defendant was justified in refusing to proceed unless the deposition was taken in accordance with the rule.

At the present time, then, in the federal courts a deposition may not be recorded by any recording device, notwithstanding the fact that it is to be transcribed later, nor the fact that it is being taken by a stenographer simultaneously.

The bulk of the litigation regarding the manner of perpetuating discovery has arisen in New York. Again the problem was one of interpretation of a statute. The New York statute, unlike the Illinois act or the federal act, is not explicit as to the manner in which discovery is to be recorded. The New York act merely provides that an oral examination by deposition

101 Id. at 450:
Please take further notice that said testimony will be taken in a room equipped with closed circuit television cameras capable of recording the testimony on an electronic tape. You are invited to inspect the television equipment before the commencement of the session, to have an observer or observers present, and to supervise the technical operation of the television camera and recording equipment.

Please take further notice that the television tapes, recording the examination, will be turned over forthwith in your presence to the officer authorized to take depositions before whom said deposition on oral examination is taken.

Please take further notice that said examination will be recorded stenographically in the usual course by the officer authorized to take depositions.

102 FED. R. CIV. P. 30 (c) (amended 1970).
103 N.Y. C.P.L.R. §3113 (b) (McKinney 1970).
105 Id. at 557.
106 See note 51 supra.
107 N.Y. C.P.L.R. §3113 (b) (McKinney 1970).
109 FED. R. CIV. P. 30 (c).
110 N.Y. C.P.L.R. §3113 (c) (McKinney 1970).
shall be conducted in the same manner as at trial.

The ambiguity of this language is widened by the fact that at one time in New York the courts were following two different views depending on the judicial district.111

The Supreme Court, Appellate Division, First Department in *Gotthelf Hillcrest Lumber Company*,112 was the first court to allow the taking of a deposition by the use of a sound recording device. The court felt that the New York act, when saying that the deposition shall be conducted in the same manner as at trial, referred to the traditional question and answer form of examination and not to the mechanics of recording testimony. This court took judicial notice of the fidelity of recording devices. This court also noted that tampering with the recording will result in an easy detection and that not recording all the testimony could be guarded against.

That did not, however, settle the question and despite this decision trial courts in other departments refused to allow the taking of depositions by sound recording devices.113

However, a Second Department, Appellate Division case114 agreeing with *Gotthelf* seems to have settled the question in New York.115

The Illinois courts have the authority to make a change in the rules of procedure that would result in the use of videotapes for evidence depositions.116 The Judicial Article of the Illinois constitution provides:

The judicial powers, except as in this article are otherwise provided, shall be vested in one supreme court, circuit courts, county courts, justices of the peace, police magistrates, and such courts as may be created by law in and for cities and incorporated towns.117

*City of Chicago v. Coleman*118 specifically stated that the power to make rules with regard to the function and procedure of Illinois courts is not a legislative, but rather a judicial function.

Aside from the case law eliciting the courts' inherent judicial power, the Civil Practice Act explicitly provides for this rule making power:

---

111 See note 113 infra.
114 Catapano v. Shapiro, 6 App. Div. 2d 1054, 179 N.Y.S.2d 458 (1958). It is permissible to take a deposition by the use of a tape recorder, but to be admissible a typed transcript must be made.
116 In Agran v. Checker Taxi Co., 412 Ill. 145, 105 N.E.2d 713 (1952), the Supreme Court declared a legislative enactment unconstitutional as encroaching on judicial prerogative. The enactment required a five day notice to attorneys in order that ex parte actions be taken to dismiss cases for want of prosecution.
118 254 Ill. 338, 98 N.E. 521 (1912).
(1) The Supreme Court of this State has power to make rules of pleading, practice and procedure for the circuit, Appellate and Supreme Courts supplementary to but not inconsistent with the provisions of this Act, and to amend the same, for the purpose of making this Act effective for the convenient administration of justice, and otherwise simplifying judicial procedure, and power to make rules governing pleading, practice and procedure in respect of small claims, including service of process in connection therewith. Unless otherwise indicated by the text, references in this Act to rules are to rules of the Supreme Court.

(2) Subject to rules the circuit and Appellate Courts may make rules regulating their dockets, calendars, and business. 

Thus, it would appear that the Supreme Court of Illinois has the power to permit the use of the videotape for an evidence deposition. Therefore, the legislature must modify the existing statutes in order that changes and additions by the Supreme Court be commensurate with the Illinois Revised Statutes. The writer’s suggestions for these statutory modifications are as follows:

PROPOSALS

The following statutory changes should be made:

1) Chap. 110A, §206(e) should be amended to read as follows:

a) The officer before whom the deposition is to be taken may, when practicable, put the witness on oath and shall personally or by someone acting under his direction and in his presence record the testimony of the witnesses on a videotape recorder equipped with non-erasure qualities, the machine to be outfitted with a non-stop reel for a given time period.

The testimony shall be taken stenographically or by a sound recording device or by a videotape recording device unless the parties agree otherwise and shall be transcribed at the request of any party, but the videotape shall be admissible; the transcript of the videotape to be used only to preserve the record on appeal.

2) All of any part of the evidence deposition may be used for any purpose for which a discovery deposition may be used and may be used by any party for any purpose. The witness shall, however, be recalled at the request of any party and if he is available, the videotape recorded deposition shall not be admissible. Failure to object to the deposition at the time for trial is a waiver of any error.

3) Chap. 51, §57 should be repealed.

\(^{119}\text{ILL. REV. STAT. ch. 110, §2 (1969).}\)
ADVANTAGES

The advantages of pre-recording witnesses on videotape, particularly those witnesses who will not be present at the trial, are manifold.

Every major city in the U.S. is faced with the administrative problem of jury trial backlog. Often parties with no meritorious defense are able to take advantage of the fact that their trials will not reach the courtroom for between three and five years by waiting for witnesses to die, forget, or remove themselves from the court's jurisdiction.

At the present time, the transcript of a witness' former testimony is admissible into evidence provided that the witness is dead, removed from the court's jurisdiction, unable to be located, sick or insane. By videotaping all possible witnesses shortly after the event in controversy occurs, similar problems that could occur at the original trial would be alleviated. In other words, a case being tried for the first time although docked for years, would be guaranteed the same advantages from the videotape that a retrial is from transcripts of former testimony.

With the use of tapes, it can clearly be shown that a suspect has been advised of his civil rights in a manner complying with the law.

A fairer trial would result if impertinent remarks by counsel could be deleted before reaching the juror's ears. The Paramore case involved contempt citations when both attorneys disobeyed a direct order from the judge. Any improper statement that has been videotaped could be edited. In this way, innuendos of

---

120 Study by Institute of Judicial Administration, Calendar Status Study vi-vii, State Trial Courts of General Jurisdiction — Personal Injury cases 1969. See also O'Connell, Jury Trials in Civil Cases?, 58 ILL. B. J. 796 (1970.).

121 Id.


123 See note 12 supra. Tapes are also made for sobriety examinations given when the suspect refuses to take a chemical test. When the suspect is brought in, he is informed of his rights and asked to take a chemical test. If he refuses, he is notified that under Section 13353 of the California Vehicle Code he has the option of a blood, urine or breath test. Refusal may result in suspension of driving privileges for six months. If the suspect takes the chemical test, he is not recorded on videotape since the result of the chemical test is used as corroborative evidence.

124 Paramore v. State, 229 So. 2d 855 (Fla. 1969). The court promptly rebuked counsel in the jury's presence so as to impress on them the gross impropriety of being influenced by such statements. The court did point out, though, that the better practice is to require retirement of the jury before such a rebuking.
inadmissible evidence, as, for example, that a defendant has insurance could be cut. Such a system might be far more effective than the mere instruction that "the jury will disregard that statement." Striking a statement from the record does not erase its effect from one's mind.

The writer could conceive of myriad other uses and advantages, such as eliminating evidentiary problems by refreshing memory after years have elapsed and a better organized trial so that laymen could more easily understand the proceedings, but they are beyond the scope of this paper.

The videotape is strikingly similar to sound motion pictures. Sound motion pictures are currently admissible as evidence. They represent an outgrowth from tape recordings, still photographs, X-rays, and the like. Each time that the analogy has been extended in the past the courts have been concerned with the same factors to qualify the machine and its operator. The philosophy that the courts will utilize any technological developments proven reputable within the scientific community has prevailed. The only addition that the videotape makes to scientific technology over and above that contributed by sound motion pictures is the instant replay feature. Hopefully, the courts will look into the possibilities of admitting the videotape in evidence in the near future.

Bruce E. Krell