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# Lincoln, Kennedy, and the Autopsy

From Washington to Dallas on the Union Line The air was numbing cold. The people listened with fists shoved deep in pockets. They heard their fellow American say, "Ask not what your country can do for you Ask what you can do for your country. The words rang out like a shot.

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Marc S. Micozzi, MD, PhD

Presidential assassinations leave a deep scar on our collective memory and consciousness as a nation. Somehow, the American public in 1992 seems more comfortable with its knowledge of the circumstances of the death of our first assassinated President, Abraham Lincoln, investigated in the mid-1860s, than it does with that of our most recent, John F. Kennedy, investigated in the mid-1960s.

### See also p 2794.

When Lincoln was shot at Ford's Theatre in Washington, DC, on the evening of Good Friday, April 14, 1865, no US President had been assassinated before, and, coupled with the simultaneous bloody attack on Secretary of State William Seward and his family at his home and the attempt on Vice President Andrew Johnson, no one knew guite what to do. Ambulance service did not then exist in Washington and cases like that of the wounded President were generally attended in the home and not the hospital. Instead, President Lincoln was carried across the street and placed in a bed in the Petersen Boarding House where he was attended by army physicians until he died early the next morning.

The only concentration of specialized medical capability in the federal government was at the Army Medical Museum (today's Armed Forces Institute of Pathology) founded barely 3 years before in Washington at the outbreak of the Civil War.<sup>1</sup> Museum physicians were called on to perform the autopsy that then-as now-was done to clearly establish the cause and manner of death.<sup>2</sup> These results were quickly made available to the public and quelled rampant rumors about Lincoln's death, allowing a stricken nation to begin to come to terms with its grief.<sup>3</sup>

When President Kennedy was shot in Dallas in November 1963, during a trip to Texas to open the new US Air Force School of Aerospace Medicine in San Antonio, the federal government had at its command tremendous medical and other resources in a nation replete with the most advanced medical technology, services, and capabilities. Yet the subsequent autopsy at the National Naval Medical Center in Bethesda, Md, and investigation of this death have not left the nation satisfied with the results.

How was the federal government able to accomplish in an 1865 presidential death investigation what was not repeated to the public's satisfaction in 1963? Part of the problem has been public access to correct information. To a trained medical examiner, it is necessary to obtain and study the medical facts of the autopsy and correlate them with the circumstances of the shooting to arrive at a reasonable conclusion.

My first opportunity personally to observe the relevant facts and correlations of the Kennedy assassination, presented as medical examiner evidence, came at the meeting of the American Academy of Forensic Sciences in New Orleans. La, on February 19, 1992. Forensic scientist Michael West. DDS, of Hattiesburg, Miss, gave a special presentation organized by Michael Baden, MD, of New York, NY, that correlated the Kennedy autopsy findings with the circumstances of the shooting as shown frame-by-frame on the Zapruder film.4 For the first time, I was able to rest, personally satisfied with the generally accepted autopsy results of the original death investigation and the Warren Commission report, for the simple reason that I was able to correlate the medical evidence with the observed circumstances.

We have relied on the media to communicate this critical information to the public at large. As conspiracy theories have spread, the public has not yet been satisfied with this information. Open access to the medical information had until recently been denied, leaving only speculation. Now we may finally reach an end to the era of speculation regarding the cause, manner, and circumstances surrounding the death of President John F. Kennedy.

On this April 15, exactly 127 years after Lincoln's death, we convened a second panel in Washington, DC, to carefully study the ethical<sup>5</sup> and technical questions of access to medical information derived from original autopsy materials from 1865 (already on public display in Washington for some decades) regarding the possibility of Abraham Lincoln having had Marfan's syndrome.6 Certainly, the National Museum of Health and Medicine of the Armed Forces Institute of Pathology has the unique capability in the case of President Kennedy, as well, not only to retain autopsy materials and roentgenograms for posterity, but also to make them available to forensic scientists and to accurately and tastefully present them to the public so all can see for themselves the evidence of what really happened in Dallas (and Bethesda) on that fateful day and night. If we are careful in our obligations toward the collection, care, keeping, and access to medical information and materials, we will be able to answer medical questions (when and if such answers are warranted) whether 30 or 130 years later.

#### Marc S. Micozzi, MD, PhD

Editorials 2791

From the National Museum of Health and Medicine, Armed Forces Institute of Pathology, Washington, DC.

Reprint requests to National Museum of Health and Medicine, Armed Forces Institute of Pathology, Washington, DC 20306-6000. (Dr Micozzi)

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At Large With Dennis L. Breo

# JFK's death—the plain truth from the MDs who did the autopsy

There are two and only two physicians who know exactly what happened-and didn't happen-during their autopsy of President John F. Kennedy on the night of November 22, 1963, at the Naval Medical Center in Bethesda, Md. The two, former US Navy pathologists James Joseph Humes, MD, and "J" Thornton Boswell, MD, convened last month in a Florida hotel for two days of extraordinary interviews with JAMA editor George D. Lundberg, MD, himself a former military pathologist, and this reporter about the events of that fateful night. It is the only time that Humes and Boswell have publicly discussed their famous case, and it was the result of seven years of efforts by Lundberg to persuade them to do so.

# Bullets came from above and behind

The scientific evidence they documented during their autopsy provides irrefutable proof that President Kennedy was struck by only two bullets that came from above and behind from a high-velocity weapon that caused the fatal wounds. This autopsy proof, combined with the bullet and rifle evidence found at the scene of the crime, and the subsequent detailed documentation of a six-month investigation involving the enormous resources of the local, state, and federal law enforcement agencies, proves the 1964 Warren Commission conclusion that Kennedy was killed by a lone assassin, Lee Harvey Oswald.

Humes, who was in charge, calls it "probably the least secret autopsy in the history of the world." It was Humes and Boswell who opened the casket when the President's body was brought by ambulance from Andrews Air Force Base after the flight from Dallas. It was Humes and Boswell who lifted the former President from his casket and placed him on the examining table to begin a four-hour autopsy. (They were joined later at the autopsy table by Army Lt Col Pierre Finck, MC, who participated as an expert consultant; Finck, who now lives in Switzerland, declined to come to Florida for the joint interview.) Humes says he is breaking his 29-year silence "because I am tired of being beaten upon by people who are supremely ignorant of the scientific facts of the President's death."

Coincidentally, on the second day of the interviews. Boswell told the group that a Fort Worth physician, Charles Crenshaw, MD, had appeared on TV that very morning to argue the claim in his recent book, JFK: Conspiracy of Silence, that when he allegedly observed the dead President at Dallas' Parkland Hospital, he was positive that the bullets struck Kennedy from the front, not the back, "as the public has been led to believe." Crenshaw, who was a surgical resident in 1963, is not mentioned in the Warren Commission's 888-page summary report and his 203-page, generously spaced paperback was written with the aid of two assassination-conspiracy buffs. Crenshaw's book is only the latest in a long parade of conspiracy theories purporting to tell how Kennedy was really killed, including the 1991 release of Oliver Stone's film, JFK. Humes and Boswell had agreed to the JAMA interview without the slightest idea that Crenshaw's book had been published.

Now, his face incredulous with disbelief, Humes exploded with his summation. Pointing toward the window, the exasperated pathologist said. "If a bullet or a BB were fired through that window, it would leave a small hole where it entered and a beveled crater where it exited. That is what 'J' and I found when we examined the President's skull. There was a small elliptical entrance wound on the outside of the back of the skull, where the bullet entered, and a beveled larger wound on the inside of the back of the skull where the bullet tore through and exploded out the right side of the head. When we recovered the missing bone

fragments and reconstructed this gaping wound where the bullet exited, we found this same pattern—a small wound where the bullet struck the inside of the skull and a beveled larger wound where it exited. This is *always* the pattern of a through-and-through wound of the cranium—the beveling or crater effect appears on the *inside* of the skull at the *entrance* wound and on the *outside* of the skull at the *exit* wound. The crater effect is produced when the bony tissue of the skull turns inside out where the bullet leaves."

#### 'A foolproof finding'

He concludes, "In 1963, we proved at the autopsy table that President Kennedy was struck from above and behind by the fatal shot. The pattern of the entrance and exit wounds in the skull proves it, and if we stayed here until hell freezes over, nothing will change this proof. It happens 100 times out of 100, and I will defend it until I die. This is the essence of our autopsy. and it is supreme ignorance to argue any other scenario. This is a law of physics and it is foolproof-absolutely, unequivocally, and without question. The conspiracy buffs have totally ignored this central scientific fact, and everything else is hogwash. There was no interference with our autopsy, and there was no conspiracy to suppress the findings.'

Though the evidence is less well defined, Humes emphasizes that his autopsy found that the other bullet that struck Kennedy, the so-called "magic bullet" that was the first to hit Kennedy and that also hit Texas Gov John Connally, was also fired from above and behind. He says, "There was an 'abrasion collar' where this bullet entered at the base of the President's neck, and this scorching and splitting of the skin from the heat and scraping generated by the entering bullet is proof that it entered from behind. Unfortunately, at

the time of the autopsy, the tracheostomy performed on the President at Dallas in an attempt to save his life obliterated the exit wound through the front of his neck near the Adam's apple. Soft-tissue wounds are much more iffy than bone wounds. but there is no doubt from whence cometh those bullets—from rear to front from a highvelocity rifle."

Still, the other scenarios continue to be painted. "Recently," Humes notes, "there were about 300 people at a convention in Dallas, each hawking a different conspiracy theory about how the President was killed. I think this kind of general idiocy is a tragedy—it almost defies belief—but I guess it is the price we pay for living in a free country. I can only question the motives of those who propound these ridiculous theories for a price and who have turned the President's death into a profitmaking industry."

Humes and Boswell had a long, long day 29 years ago, and, in many ways, it has never ended. The 6-foot, 4-inch, physically energetic Humes is a commanding presence, and he says, "I was in charge of the autopsy-period. Nobody tried to interfere-make that perfectly clear." The 5-foot, 9-inch, pipe-puffing Boswell is precise and methodical, and he says, "We documented our findings in spades. It's all there in the records. And Jim is not the kind of guy anybody pushes around." Their comments on the record are essential because polls show, in the wake of the film JFK and the glut of conspiracy-theorist authors, that many, if not most Americans disbelieve the Warren Commission finding that Oswald, "acting alone and without assistance," killed Kennedy. To set the record straight, they agreed to relive for JAMA their actions of Friday, November 22, 1963.

On the day the President was shot at 12:30 PM, while riding in an open motorcade through the sunny streets of Dallas, it was cold and gray in the Washington, DC, area. Commander Humes, then 39, was the director of labs of the Naval Medical School in Bethesda, Md. Commander Boswell, then 41, was chief of pathology at the naval hospital, which was part of the Bethesda National Naval Medical Center. Humes was Boswell's boss.

Humes had signed on with the US Navy in 1943 to complete his undergraduate work at Villanova University, Villanova, Pa, as part of the Navy's V-12 enlistment program. After earning his medical degree at Jefferson Medical College, Philadelphia, in 1948, he completed his internship and residency in anatomic and clinical pathology at the Bethesda



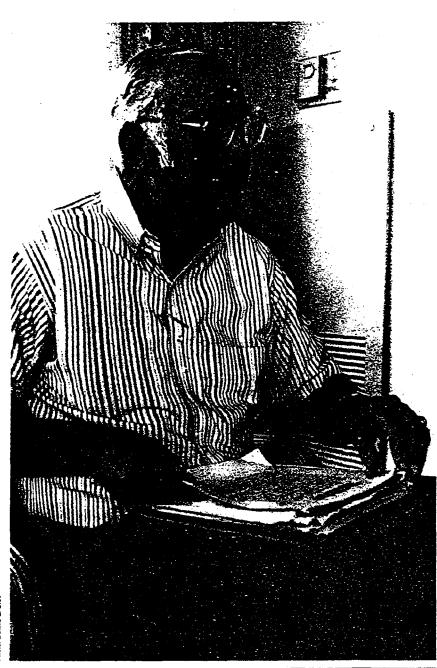
The three pathologists who performed the autopsy on President John F. Kennedy on the night of November 22, 1963, were photographed days later (top photo, from left): US Navy Cmdr J. Thornton Boswell, MC; US Navy Cmdr James Joseph Humes, MC; and US Army Lt Col Pierre Finck, MC. Breaking their 29-year silence on this famous case, Drs Humes (left in bottom photo) and Boswell were interviewed by JAMA last April.



medical center; the US Naval Hospital in Philadelphia; and the Armed Forces Institute of Pathology in Washington, DC. He was certified by the American. Board of Pathology in anatomic and clinical pathology in 1955. His postings included military hospitals in the Canal Zone, Hawaii, and San Diego. He was appointed chief of pathology at the Naval Medical School in 1960 and promoted to director of labs for the medical school in 1961. By 1963, he had performed several autopsies on military personnel killed by gunshot wounds and he had also spent seven years at the Bethesda facility, which he "knew like the back of my hand." Boswell, a graduate of the Ohio State University Medical School, received his certification in anatomic pathology in 1957 and clinical pathology in 1959. He, too, had previously autopsied several gunshot wounds, and most of his military experience was at the naval hospital in Bethesda.

Ironically, shortly before President Kennedy was shot and pronounced dead at 1 PM at Dallas' Parkland Hospital, Humes left the medical center to go

At Large 2795



Dr Humes: "This was the least secret autopsy in the world and the cause of death was blatantly obvious. There is no doubt from whence cometh those bullets—from rear to front from a high-velocity rifle."

home. He had promised to help his wife, Ann, prepare for a dinner party for 24 that evening, almost all of them military personnel. Five of the Humeses' seven children were in school, with the youngest two at home. The radio and TV were off, and the couple did not learn of the tragic news until their older children returned on the school bus. He recalls, "The kids told Ann, "The President's been shot,' and she was telling them, "That's a terrible thing to say,' when we turned on the TV and learned for ourselves. My wife and I were both very upset, and we decided that a dinner party on this evening was out of the question." Washington phone circuits were jammed, and while Ann Humes tried to get a line to call her guests to cancel, Commander Humes took his son out for a haircut; his first communion was scheduled for the next morning. When father and son returned, they found that Ann Humes had finally found an open phone line, only to have the operator interrupt with an emergency call from the Surgeon General of the Navy, Admiral Edward Kenney. It was 5:15 PM and Admiral Kenney said, "Jim, you better hurry over to the hospital."

By the time he arrived at the hospital, Humes was "beginning to get the message that the President's body was en route. There was great commotion and a cordon of Marines and military police." Once inside, he was told by Admiral Kenney, the ranking military officer, " to be prepared to do an autopsy' on the late President."

## 'Find the cause of death'

"My orders were to find the cause of death and I was told to get anyone I thought necessary to help do the autopsy, but to limit it to only the help I needed. Hell, I could have called in people from Paris and Rome if I thought it necessary, but as it turned out, I didn't. About this time, I also received a phone call from Dr Bruce Smith, the deputy director of the Armed Forces Institute of Pathology [AFIP], offering me whatever help I might need. Bruce was a friend and I thanked him, saying I would call later if I needed help."

While Humes had been preparing for his dinner party, Boswell had been at the hospital going over autopsy slides with pathology residents. He recalls, "Early in the afternoon, we received a call from Dr Bruce Smith from AFIP, saying, "The President's body is on its way to Bethesda for an autopsy.' I argued, "That's stupid. The autopsy should be done at AFIP [which was located five miles away at the Walter Reed Army Medical Center].' After all, the AFIP was the apex of military pathology and, perhaps, world pathology. I was told, 'That's the way it is. Admiral [George] Burkley [the President's personal physician] wants Bethesda.' Apparently, Admiral Burkley had called the AFIP from Air Force One en route from Dallas. Later, I was told that Jackie Kennedy selected Bethesda because her husband had been a Navy man.'

#### Humes was in total charge

By 7:30 PM, Humes was in his scrubs in the hospital's new morgue, built only four months earlier. He had selected Dr Boswell as his assistant. The morgue was at the back of the hospital, and, as Dr Humes stepped *outside* the morgue onto the loading dock, he noticed a crowd milling about and an unknown man carrying a large, old-fashioned "Speed Graphic" camera. Still outside the morgue, the pathologist told the unknown cameraman, "Get out!" Then, Humes asked, "Who's in charge here?"

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The answer was only 2 feet away, as a man in full military dress answered, "I am. Who wants to know?" Humes explains, "The man who said he was in charge outside the morgue was some general representing the military section of the District of Columbia. I told him what my assignment was and asked him about the chap with the camera. Well, seconds later, this chap with the camera was sent away."

#### No generals in the morgue

As the general remained *outside* the morgue, Humes stepped back inside to prepare to receive the President's body. He emphasizes, "Nobody made any decision in the morgue except ME. Nobody distracted or influenced me in any way, shape, or form."

Jackie and Bobby Kennedy and a host of others accompanied the motorcade bringing the President's body from Andrews AFB to the Naval Medical Hospital morgue. While Jackie and Bobby Kennedy and the other VIPs were met at the front of the hospital and escorted to upstairs rooms, the casket was brought to the morgue at the rear of the hospital by Admiral Burkley. The bronze casket had one broken handle, and Humes and Boswell opened it. Humes says, "We found the unclothed body of President John F. Kennedy, wrapped in sheets in a swaddling manner, the massive head wound wrapped around and around with gauze and bandages." Together, they lifted the body onto an examining table, and Humes emphasizes, "There was no body bag anywhere near the scene. I cannot imagine how this talk about the President's body being delivered in a body bag got started, but it is absolutely false.'

Opening the casket was a "shocking experience" for Humes, who was a Kennedy supporter. He recalls, "His identifying facial features were all intact and there he was, the President of the United States, now dead at age 46 with a terrible wound of the head. He wasn't that much older than me, and other than the head wound, he looked perfectly normal. He was a remarkable human specimen and looked as if he could have lived forever. It was very, very distressing." After the initial shock, however, Humes and Boswell got down to business. Humes notes, "This is what we are trained to do, and we got down to the task at hand.'

As Admiral Burkley, the President's personal physician, stood by their side, a team of 10 "locked in" and proceeded to start what would turn out to be a thorough four-hour autopsy. Humes emphasizes, "I was in charge from start to finish and there was no interference—



Dr Boswell: 'We documented our findings in spades. It's all there in the records.'

zero. It was myself, 'J' [Boswell], [Dr] Finck, two Navy enlisted men who served as autopsy technicians, three radiologists, including chief Jack Ebersole, MD, and two photographers, including the medical school's chief of photography, John Stringer. We took 14 x-rays of the body from head to toe and we took 52 photos from every possible angle."

He dispels the myth that no photos were allowed. "The medical school's director of photography was a civilian, John Stringer, and, in my opinion, he was one of the best medical photographers in the world. He took 25 blackand-white photos and 27 color photos, all with large 4-by-5-inch negatives. No significant aspect of the autopsy was left unphotographed." He adds, "The wounds were so obvious that there was no need to shave the hair before photographs were taken."

Responding to published reports that photo negatives were seized by the FBI and that the FBI took its own photo-

graphs, Humes is incredulous. He says, "Yes, there were FBI and Secret Service people milling about the room. And, at one point, there was an unauthorized Navy corpsman taking photos in the morgue and the FBI quite properly seized and destroyed that film, since the photographer did not have credentials. However, the official photos taken by John Stringer were never touched, and no one from the FBI even had a camera, let alone the intention to take autopsy photos. These reports are an incredible lie."

He dispels another myth—that the morgue was controlled by generals and other brass in uniform. "The President's military aides from the Air Force, Army, and Navy were all present," Humes says, "and they were all in dress uniforms, but they were not generals and their influence on the autopsy was zero. The only high-ranking officer was Admiral Burkley, and he left shortly after the autopsy began to join Jackie and Bobby Kennedy upstairs."

# See also p 2791.

And a third myth-that he was not qualified to do a gunshot autopsy. "I'd done gunshot wounds before and this one was perfectly obvious-there was a huge hole on the right side of the President's head that only could have resulted from the exit of a high-velocity missile. Dr Bruce Smith [the deputy director of the Armed Forces Institute of Pathology]had initially thought that we might want a neuropathologist as a consultant, but once we opened the casket and saw the devastating nature of the President's head wound, we knew that there was no need for the skills of a neuropathologist. I called Dr Smith back and told him what we had found, and he decided to make available Dr Pierre A. Finck, who was one of the AFIP's experts in ballistics. I had never before met Dr Finck, who arrived at about 9:15 PM."

Finck, a shy, retiring man who had been trained in Europe, was an Army colonel, and he had trouble getting by all the Marines and sailors who were providing security outside the Navy hospital. Once inside, he completed the autopsy team.

Humes emphasizes, "There was a lot of commotion, but we are trained to focus on the task at hand, even under crowded conditions. Bethesda was a large teaching hospital. The morgue room contained an amphitheater which sat 30 to 40 people, and we were used to seeing authorized medical personnel come and go to observe autopsies." Still, he says that the scene in the autopsy room was "somewhat like trying to do delicate neurosurgery in a threering circus." The crowd did not influence the autopsy results, Humes says.

Boswell adds, "Sure, there were FBI and Secret Service people observing the autopsy and talking on their radios to people outside the room, and we could hear a play-by-play of what we were doing and talking about, but nobody tried to interfere and we were able to focus on the matter at hand." He adds, "The FBI and Secret Service told us that two fragments of the President's skull had been recovered in Dallas and were being rushed to Bethesda and that bullet fragments had also been recovered in Dallas."

Humes provides a poignant remembrance of the scene. "The people around the President were totally devastated," he says. "They were still in a state of shock and the reality of what had happened had not yet sunk in. Unless you live in Washington, it's hard to imagine the mind-boggling aura that surrounds the President of the United States. These people thought they had let the President down, and now their hero was gone." Boswell adds, "The people who accompanied the President's body to the morgue were the most disturbed and distressed people I have ever seen."

Humes continues, "We were unfazed by all the commotion and concentrated on getting our x-rays, which we read right at the table, and our photographs, which we relied upon for future documentation. 'J' and I both took down autopsy notes and diagrams."

# Fatal wound 'blatantly obvious'

The pathologists found two wounds from a high-velocity missile that would later be matched to the military-jacketed bullets fired from above and behind the President by Lee Harvey Oswald. The fatal shot entered the back of the President's skull and exploded away almost a 6-inch section on the right side of his head; the second bullet entered at the base of his neck, but its exit-track was not immediately apparent.

"The fatal wound was blatantly obvious," Humes recalls. "The entrance wound was elliptical, 15 millimeters long and 6 millimeters wide, and located 2.5 centimeters to the right and slightly above the external occipital protuberance. The inside of the skull displayed the characteristic beveled appearance. The x-rays disclosed fine dustlike metallic fragments from back to front where the bullet traversed the head before creating an explosive exit wound on the right temporal-parietal area. These fragments were not grossly visible. Two small fragments of bullet were recovered from inside the skull—measuring 3 by 1 millimeters and 7 by 2 millimeters.

"The head was so devastated by the exploding bullet and the gaping jagged stellate wound it created—it blew out 13 centimeters of skull bone and skin that we did not even have to use a saw to remove the skullcap. We peeled the scalp back, and the calvarium crumbled in my hands from the fracture lines, which went off in all directions. We made an incision high in the spinal cord and removed the brain, which was preserved in formalin. Two thirds of the right cerebrum had been blown away.

"After the brain was removed, we looked more closely at the wound, and noted that the inside of the rear of the skull bone was absolutely intact and beveled and that there could be no question from whence cometh that bullet-from rear to front. When we received the two missing fragments of the President's skull and were able to piece together two thirds of the deficit at the right front of the head, we saw the same pattern on the outer table of the skull-a bullet that traveled from rear to front. Every theorist who says the bullet came from the front has ignored this critical irrefutable diagnostic fact. We did everything within the means of reasonable people to record with x-rays and photos what we saw."

The second bullet was more of a puzzle. "If we made a mistake," Humes says, "it was in not calling Dallas before we started the autopsy. Our information from Parkland Hospital in Dallas before we started the autopsy was zero. If only we had seen the President's clothes, tracking the second bullet would have been a piece of cake, but we didn't have the clothes. In hindsight, we could have saved ourselves a lot of trouble if we had known that the doctors at Parkland performed a tracheostomy in an attempt to save the President's life and that this procedure obliterated the exit wound of the bullet that entered at the base of the neck."

### 'Time to quit speculating'

"The tracheostomy was a gaping wound, about 3 to 4 centimeters around, and we didn't think of it as an exit wound. We also noticed that the Dallas doctors had tried to place chest tubes in the front of the President's chest, but the tubes had not gone in and we found no increase of blood or fluid in the pleural cavity. There was a contusion of the extreme apical portion of the right upper lobe of the lung but no laceration.

This article is one of a number of articles on violence that will appear in upcoming issues of THE JOURNAL. The reader is referred to the June 10, 1992, issue, which will be dedicated to studies of violence.

We also noted damage to the neck muscles, trachea, and pleura, but there was no bullet. It was bothering me very greatly, like nothing you can imagine, that we could find neither the second bullet nor its exit track. 'J' and I both knew that bullets can do funny things in the body, and we thought it might have been deflected down to the extremities. We x-rayed the entire body, but did not find a bullet." The autopsy was also criticized because the pathologists did not dissect the President's neck to track the second bullet. Humes says bluntly, "Dissecting the neck was totally unnecessary and would have been criminal.

"By midnight, we decided it was time to quit speculating about the second bullet, and I am very comfortable with this decision. It is true that we were influenced by the fact that we knew Jackie Kennedy was waiting upstairs to accompany the body to the White House and that Admiral Burkley wanted us to hurry as much as possible. By midnight, our task was done—it was perfectly obvious what had killed the man. The second bullet was important, but not of overriding importance. We knew we would find the explanation sooner or later."

The explanation came sooner, the next morning at 7:30 when Humes called Dallas to talk to Dr Malcolm Perry, the surgeon who had performed the tracheostomy. "The light came on when I talked to Dr Perry," Humes says. "Of course, the bullet had exited through the neck." Referring to Dr Crenshaw's contention that the wound in the front of the neck was small and round after the tracheostomy was performed and at the time the President was placed in a casket, Dr Humes says, "We found a gaping wound in the front of the neck where the tracheostomy had been performed, and if Dr Crenshaw was correct, the only possible explanation is that the neck wound was intentionally enlarged while the body was en route from Dallas, and the insinuation of this scenario does not deserve a response."

Humes and Boswell had remained at the morgue until 5 that morning, helping to embalm the President's body. Humes says, "We were able to almost perfectly restore the President's appearance, and a local funeral home brought out a beautiful mahogany casket to replace the bronze one from Dallas. When Admiral Burkley and Bobby and Jackie Kennedy left to take the body to the White House, 'J' and I finally went home." Boswell says, "The mood in Washington was so apprehensive that the commanding officer of the US Naval Medical School, Capt J. H. 'Smokey' Stover, asked me to drive behind Jim to make sure that he got home safely."

Thanks to seven years of pursuit by George Lundberg, MD (center), editor of JAMA, Drs Humes (left) and Boswell finally got together on a grassy knoll in Florida to discuss the 1963 autopsy of President John F. Kennedy. Later, Dr Lundberg said he 'completely believes' the autopsy report that Kennedy was killed 'by only two bullets that struck him from above and behind and caused fatal high-velocity wounds.'

Humes spent most of Saturday, November 23, drafting the autopsy report. In the process, he burned his autopsy notes, but not really. "This is the criticism I keep hearing over and over again," he says, "that I burned my notes and that this means there must have been a conspiracy. Well, it's true that I burned my original notes because they were stained with the President's blood, and I did not want them to become a collector's item, but I burned them *after* I had copied verbatim in my own handwriting the entire contents. I make no apology for this, but I will explain my reason:

"One of my assignments had been to escort foreign Navy officers around US bases. Along the way, we'd always try to show the foreign officers slices of Americana. On one of these trips, we saw an exhibit that purported to be the chair on which President Abraham Lincoln sat when he was shot at Ford's Theater. There were stains on the back of the chair that were reported to be from Lincoln's blood. I was appalled at this type of display, though I later learned that the stains were from macassar, a hair preparation of the day that inspired the antimacassar doily, and not from Lincoln's blood. In any event, when I saw that my own notes were stained with Kennedy's blood, I vowed that this type of revolting object would not fall into the wrong hands. I burned the notes that night in my fireplace."

Admiral Burkley wanted the autopsy report by midnight Sunday, November 24, and early Sunday morning Humes returned to the Naval medical school to go over his handwritten report with Drs Boswell and Finck. The three pathologists met in the office of Adm C. B. Galloway, the commanding officer of the National Naval Medical Center. While talking, they were called to watch a nearby TV set-Jack Ruby had just shot Lee Harvey Oswald in Dallas. Returning to their report, the three experts had no trouble agreeing on the facts of their autopsy. The report, "A63-272," was the 272nd autopsy performed that year at the hospital. The admiral's secretary typed the handwritten report into six pages. Humes says, "Our conclusions have stood the test of time." The cause of death is given as "gunshot wound, head." The summary, as published in the 1964 Warren Commission report, reads as follows:

#### The original 1963 autopsy report

"It is our opinion that the deceased died as a result of two perforating gunshot wounds inflicted by high-velocity projectiles fired by a person or persons unknown. The projectiles were fired from a point behind and somewhat above the level of the deceased. The observations and available information do not permit a satisfactory estimate as to the sequence of the two wounds.

"The fatal missile entered the skull above and to the right of the external occipital protuberance. A portion of the projectile traversed the cranial cavity in a posterior-anterior direction (see lateral skull roentgenograms), depositing minute particles along its path. A portion of the projectile made its exit through the parietal bone on the right, carrying with it portions of cerebrum, skull, and scalp. The two wounds of the skull combined with the force of the missile produced extensive fragmentation of the skull, laceration of the superior sagittal sinus, and of the right cerebral hemisphere.

"The other missile entered the right superior posterior thorax above the scapula and traversed the soft tissues of the supra-scapular and supra-clavicular portions of the base of the right side of the neck. This missile produced contusions of the right apical parietal pleura and of the apical portion of the right upper lobe of the lung. The missile contused the strap muscles of the right side of the neck, damaged the trachea, and made its exit through the anterior surface of the neck. As far as can be ascertained, this missile struck no bony structures in its path through the body.

"In addition, it is our opinion that the wound of the skull produced such extensive damage to the brain as to preclude the possibility of the deceased surviving this injury.

"A supplementary report will be submitted following more detailed examinations of the brain and of microscopic sections. However, it is not anticipated that these examinations will materially alter the findings."

That night, Humes hand-delivered the autopsy report, signed by Humes, Boswell, and Finck, to Admiral Burkley at the White House. On December 6, 1963, Humes alone submitted to Burkley his supplementary report, writing in the final summary: "This supplementary report covers in more detail the extensive degree of cerebral trauma in this case. However, neither this portion of the examination nor the microscopic examinations alter the previously submitted report or add significant details to the cause of death."

Shortly afterward, Humes turned over everything from the autopsy to Admiral Burkley—bullet fragments, microscopic slides, paraffin blocks of tissue, undeveloped film, x-rays—and the preserved, unsectioned President's brain. "Burkley said he wanted everything," Humes says, "and he came out to Bethesda to get it. I gave it to him all in one package. What was left at Bethesda? Zero. I didn't make a copy of anything. Frankly, I was glad to be out from under the responsibility. Admiral Burkley gave me a receipt for the autopsy materials, including the brain. It was my understanding that all the autopsy materials, except the brain, would be placed in the National Archives. He told me that the family wanted to inter the brain with the President's body. I don't know what happened to the brain, but I do know that Admiral Burkley was an honorable man."

The medical autopsy of President John F. Kennedy was concluded. The conspiracy autopsies had yet to begin.

Humes and Boswell concede that Kennedy's body was illegally moved from Dallas, in violation of Texas laws requiring that Texas homicides be autopsied in Texas, and that there would have been less confusion if the autopsy had been performed in Dallas, but Humes emphasizes:

"There was a very, very good reason why this happened. Lyndon Johnson did not know what was going on in Dallas on this day, and for all he knew a cabal could have been in the works. He wanted to get back to his base and his base was Washington, DC. He would not leave without Jackie Kennedy, and she would not leave without her husband's body. Johnson had to get back to Washington, and, ergo, the body had to be brought back. That's that, and I cannot believe that any reasonable person would disagree with this course of action."

He adds, "Several days after the autopsy, I got a call from someone in Dallas demanding that we return the bronze casket that had carried the President's body from Parkland Hospital to Bethesda. I told him I had no idea what had happened to that casket, and I didn't it wasn't my responsibility. He was very insistent, but so was I."

# Autopsy confirmed four times

The autopsy findings have been confirmed many times since 1963, a fact that has been largely ignored in the current hoopla over the film JFK and over Dr Crenshaw's new book and media appearances. The first time was the publication of the Warren Commission report in 1964, and Humes has brought to the interview a copy of his own Warren Commission report signed by Chief Justice Earl Warren. It was only during their interviews with Warren Commission investigators that Humes and Boswell saw for the first time the clothing worn by President Kennedy.

Humes says, "Once we saw the holes in the back of the President's suit jacket and shirt and the nicks on his shirt collar and the knot of his necktie, the path of the second bullet was confirmed. That bullet was traveling very fast and it had to go somewhere. I believe in the singlebullet theory that it struck Governor Connally immediately after exiting the President's throat."

Boswell adds, "Having seen the clothing, I now know that I created a terrible problem with my own autopsy drawings. My drawings of the bullet holes on the night of the autopsy did not precisely match up with the actual holes in the clothing, because we were not aware that the President's suit jacket had humped up on his back while he waved at the spectators. These errors were later exploited by the conspiracy crowd to fit their premises and purposes." The clothing was kept in the National Archives, along with the rest of the autopsy materials.

#### Photos not published

Both Humes and Boswell agreed to the commission's stipulation that the autopsy photos were not to be viewed. Humes explains, "I agreed with the commission's decision not to make the photos part of the official report. I had stated in the autopsy, The complexity of these fractures and the fragments thus produced tax satisfactory verbal description and are better appreciated in photos and roentgenograms which are prepared,' and I meant it. The head wound was devastating, and if the photos were made part of the commission report they would have become public. I did not think that these photos should appear on the front pages of newspapers, and I did not trust the ability of the commission to keep them secret. So, 'J' and I worked with an artist to reconstruct drawings of the President's wounds, based upon our original measurements. These drawings are very accurate and met the purposes of the Warren Commission. In 1964, there were no crazy conspiracy theories about the death of the President.'

It was not until November 1, 1966, that the two pathologists saw the autopsy photos—when they were summoned to the National Archives to help categorize all autopsy materials.

The second confirmation of their autopsy came in 1968, as the result of a request made by Drs Humes and Boswell themselves. In 1968, there were crazy conspiracy theories coming out of the woodwork. On January 26, 1968, Boswell sent a letter to Ramsey Clark, then the US attorney general, in an attempt to put the issue to Fest. The letter read:

"As you are aware, the autopsy findings in the case of the late President John F. Kennedy, including x-rays and photographs, have been the subject of continuing controversy and speculation. Dr Humes and I, as the pathologists concerned, have felt for some time that an impartial board of experts, including

pathologists and radiologists, should examine the available material.

"If such a board were to be nominated in an attempt to resolve many of the allegations concerning the autopsy report, it might wish to question the autopsy participants before more time elapses and memory fades; therefore, it would be my hope that such a board would be convened at an early date. Dr Humes and I would make ourselves available at the request of such a board.

"I hope that this letter will not be considered presumptuous, but this matter is of great concern to us, and I believe to the country as well."

Four physicians were subsequently appointed to a blue-ribbon panel to evaluate the original autopsy. The four included:

• William H. Carnes, MD, professor of pathology at the University of Utah, Salt Lake City, and a member of Utah's Medical Examiner's Commission. He was nominated by J. E. Wallace Sterling, the president of Stanford University.

• Russell S. Fisher, MD, professor of forensic pathology at the University of Maryland and chief medical examiner of the state of Maryland. He was nominated by Dr Oscar B. Hunter, Jr, president of the College of American Pathologists.

• Russell H. Morgan, MD, professor of radiology at The Johns Hopkins University School of Medicine, Baltimore, Md. He was nominated by Dr Lincoln Gordon, president of The Johns Hopkins University.

• Alan R. Moritz, MD, professor of pathology at Case Western Reserve University, Cleveland, Ohio, and former professor of forensic medicine at Harvard University, Cambridge, Mass. He was nominated by Dr John A. Hannah, president of Michigan State University.

None of the four had any previous connection with prior investigations or reports on the President's assassination. After an exhaustive study of all relevant materials, the four members of the panel signed and submitted a 16-page report to Attorney General Clark in April 1968, unanimously concluding:

"Examination of the clothing and of the photographs and x-rays taken at autopsy reveal that President Kennedy was struck by two bullets fired from above and behind him, one of which traversed the base of the neck on the right side without striking bone and the other of which entered the skull from behind and exploded its right side. The photographs and x-rays discussed herein support the above-quoted portions [the conclusion] of the original Autopsy Report and the above-quoted medical conclusions

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Dr Boswell: 'It appears that [filmmaker] Oliver Stone may have taken Dr Finck's mistaken perceptions about the alleged military presence in the morgue and used it as the sole mistaken basis for the autopsy scenes in his movie, JFK.'

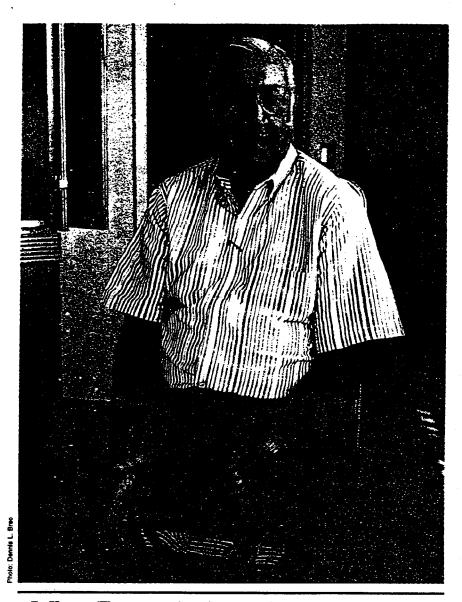
of the Warren Commission Report."

The panel's report noted, "The possibility that the path of the bullet through the neck might have been more satisfactorily explored by the insertion of a finger or probe was considered. Obviously, the cutaneous wound in the back was too small to permit the insertion of a finger. The insertion of a metal probe would have carried the risk of creating a false passage—in part because of the changed relationship of muscles at the time of autopsy and in part because of the existence of postmortem rigidity. Although the precise path of the bullet could undoubtedly have been demonstrated by complete dissection of the

soft tissue between the two cutaneous wounds, there is no reason to believe that the information disclosed thereby would alter significantly the conclusions expressed in this report."

#### The Garrison prosecution

The next confirmation came in 1969 in New Orleans when Pierre Finck was subpoenaed to testify at the trial of Clay Shaw, as part of District Attorney Jim Garrison's conspiracy prosecution. Shaw, of course, was acquitted, and, until the publication of this interview, Finck's testimony was the only *public* airing of the expert medical opinions on the assassination.



Dr Humes: 'There was no interference with our autopsy and nobody tried to suppress the findings.'

Boswell says, "A careful reading of the entire transcript of Dr Finck's testimony shows that he held tightly to the facts of our autopsy and supported its conclusions. However, Pierre was a meek and mild man who had been trained abroad, not in the United States. He was very 'brass conscious,' and he thought that generals were out of this world. At Bethesda, Finck was out of his element-an Army colonel in a Navy hospital-and he apparently mistook the President's military aides and other military personnel for generals. During the trial, Garrison was able to exploit Pierre's misperceptions about the scene to give the impression that it was controlled by generals. Jim [Humes] and I state categorically that there was no

interference with our autopsy. The patient was extraordinary, the autopsy was ordinary, or at least as ordinary as it could be under the circumstances."

Boswell knows because he, too, was in New Orleans in 1969 at the request of the US Justice Department. "The Justice Department was so convinced that Garrison was on a fishing expedition in his prosecution of Clay Shaw," Boswell says, "that it summoned me to New Orleans to refute Finck's testimony, if necessary. It turned out that it wasn't necessary. It now appears, Boswell adds, that filmmaker Oliver Stone may have taken Finck's mistaken perceptions about the alleged military presence in the morgue, as detailed in the transcript of the trial, and used it as the sole basis for the mistaken autopsy scenes in his movie JFK. Humes calls the movie scenes "absolutely false and ridiculous," but we are getting ahead of the story.

The next confirmation of the President's autopsy came from the 1977 House Select Committee on Assassinations. Congress appointed a panel of nine experts chaired by forensic pathologist Michael Baden, MD, to investigate the medical findings. In his 1989 book, Unnatural Death—Confessions of a Medical Examiner, Baden agrees with the findings of Humes-Boswell-Finck but still terms Kennedy's autopsy the "exemplar" of the "bungled autopsy." He writes, "Despite all these errors and for the wrong reasons, Humes came to the right conclusions-that Kennedy had been shot by two bullets from behind. one in the head and one in the back. They [the wounds] were poorly tracked, but he got the two most important things right.'

Humes says he has not read Baden's book and does not intend to. Mindful that this is a rare attack upon an autopsy that was solidly endorsed by an expert panel in 1968, he reacts to this quoted passage by saying, "Imagine that—we got it right, AS DUMB AS WE ARE! What possible purpose can be served by this kind of attack?"

Apprised of Baden's comment, "[Commander Humes] had never done one like it before," Humes incredulously ex-claims, "Who had?" As Baden's written criticisms are read to him, Humes indignantly explodes, "False ... false ... false. My God, where does this stuff come from?" To cite but one example, Baden writes, "He [Humes] also knew that religious Catholics tend to be opposed to autopsies. And he was not in a position to press the issue." Humes replies, "Come on, now. I am a devout Catholic and for 19 years I was director of laboratories at St John Hospital, in Detroit, Mich, which is a Catholic hospital with a very active autopsy service. This autopsy was requested by the Kennedy family, who are Catholics."

# JFK, the film, termed a 'hoax'

Then, there is the film, JFK. Jack Valenti, a former aide to President Lyndon Johnson and the current president of the Motion Picture Association of America, recently described JFK as based on the "hallucinatory bleatings of an author named Jim Garrison, a discredited former district attorney in New Orleans." He also calls it a "hoax," a "smear," and "pure fiction," rivaling the Nazi propaganda films of Leni Riefenstahl.

Syndicated columnist George Will says, "JFK is cartoon history by Stone,

who is 45 going on 8. In his three-hour lie, Stone falsifies so much he may be an intellectual sociopath, indifferent to truth." New York Times columnist Anthony Stone says, "Oliver Stone used as his mouthpiece, Jim Garrison, the former New Orleans district attorney, who in real life bribed witnesses to prosecute an innocent man-and was laughed out of court. Stone alleges a conspiracy among the Army, the CIA, Lyndon Johnson, and countless others-without a shred of evidence." Stone has been quoted as saying his critics are motivated by a "fear of facts." Chicago Tribune reporter Paul Galloway responds, "Nope. They were angry with the way he disregarded the facts."

Humes does not disagree with these criticisms of Stone, which he finds mild. His son had recently persuaded him to see JFK, and now he tells his colleague, Boswell, "'J,' if you see this movie, believe me, you'll need heavy sedation. The autopsy scene bears no relation to reality, the man they have playing me looks older than I am now, and the triangulated shooting scene is preposterously impossible."

Conspiracy fanciers, including Stone, have tried to make much of the fact that the privately owned Zapruder film of the assassination shows Kennedy's head lurching backward after being hit. Humes and Boswell have both seen the Zapruder film "30 to 40 times," and they note that studies published two decades ago by surgeon John Lattimer demonstrated that an object struck in the rear by a high-velocity missile similar to the bullets that hit Kennedy always falls backward as a result of the jet-propulsion effect created by tissues exploding out the front.

JAMA's Lundberg, a stickler for detail, poses some questions that remain official mysteries:

# Who ordered the autopsy?

Who ordered the autopsy?

"It must have been Jackie Kennedy," says Humes. "She made the request through Admiral Burkley." Boswell says, "It must have been Robert Kennedy. He was acting on behalf of the family." Lundberg counters, "Well, we have a lot of 'must haves,' but no answer." Humes says, "Well, George, I hope you're not saying that we shouldn't have done the autopsy! My orders came from Ed Kenney, the surgeon-general of the Navy. The President's personal physician, Admiral Burkley, was standing beside me at the autopsy table. Jackie Kennedy was waiting upstairs for the body with Robert Kennedy, and what greater authority can you have than the Attorney General of the United States [Robert Kennedy]?" Lundberg concludes, "OK, there were verbal OKs all over the place." Boswell adds, "Captain Stover [the medical center's commanding officer] was very thorough, and I'm sure he had someone complete the paperwork."

Who made the absolute identity?

Humes chuckles, "Well, the President's face was not exactly unknown. And the body was accompanied by the FBI, the Secret Service, military aides, and Kennedy family members. We saw no need for dental x-rays."

What happened to the brain?

Boswell says, "I believe that it was buried with the body." Humes says, "I don't know, but I do know that I personally handed it over to Admiral Burkley and that he told me that the family intended to bury it with the body. I believe Admiral Burkley."

What was the condition of Kennedy's adrenal glands?

Humes says, "I am not prepared to answer this question now, except to say that the President was *not* 'cushingoid' and did not have the appearance of a man with the odd fat deposits and facial puffiness associated with the cushingoid appearance. As his activities indicate, he was a very healthy and vigorous man. At some time in the near future, 'J' and I will have to sit down and write for history our report of the condition of the President's adrenal glands."

Should the body be exhumed for another autopsy to remove all doubts?

Humes is appalled. "That suggestion is ridiculous on the face of it. There is nothing further to be learned." Boswell adds, "The family would never permit it, anyway."

Boswell concludes, "In hindsight, we might have called in a civilian pathologist like Russell Fisher, who was right next door in Baltimore. We didn't need him to confirm our findings, but it might have removed the doubts about military control." Humes says, "Russell was a friend and we easily could have asked him to come in to help, but we had no problem in determining the cause of death."

#### 'Irrefutable evidence'

Lundberg says, "I am extremely pleased that, finally, we are able to have published in the peer-reviewed literature the actual findings of what took place at the autopsy table on November 22, 1963. I completely believe that this information, as personally given by Jim [Humes] and 'J' [Boswell], is scientifically sound and, in my judgment, provides irrefutable evidence that President Kennedy was killed by only two bullets that struck him from above and behind and that caused fatal high-velocity wounds."

Humes concludes, "I really have not had much ongoing interest in the autopsy. We did what we had to do in 1963, and we did it right. And, I can't say that the criticism has hurt my career." Indeed, Humes retired from the Navy in 1967 with the rank of captain; worked 19 years at Detroit's St John Hospital as vice president for medical affairs and director of laboratories; and served from 1986 through 1989 as a field inspector for the Accreditation Council for Graduate Medical Education. In 1980, he was awarded the Distinguished Service Award presented jointly by the College of American Pathologists and the American Society of Clinical Pathologists (ASCP). He was president of ASCP from 1974 to 1975; president of the Michigan Society of Pathologists in 1974; the first president of the American Registry of Pathology from 1976 through 1978; and a member of the AMA House of Delegates from 1978 through 1988. Now semiretired, he is a clinical professor of pathology at the University of Florida School of Medicine, Jacksonville, and lives in nearby Ponte Vedra, Fla, where he has his choice of playing 105 golf holes, including the Tournament Players Championship course at Sawgrass. Boswell retired from the Navy in 1965, with the rank of commander, and worked in supervisory pathology positions at Suburban Hospital, Bethesda, Md, from 1965 through 1972; and with a large pathology group in Fairfax, Va, from 1972 to 1983. Now retired, he lives in Bethesda.

Humes stops the interview where he started. "The President was killed by a devastating gunshot wound to the head fired from above and behind by a highvelocity rifle. The second bullet that struck him in the back of the neck was also fired from above and behind. That's it. Everything else is adventitious."

It is an apt description. The adventitia, of course, are the external coatings of the blood vessels, giving rise to the adjective, "adventitious," for "added from another source and not inherent or innate... arising or occurring sporadically or in other than the usual location."

It is the perfect description for the growing industry of conspiracy theories from people who are ignorant of the essential facts and yet purport to know how President Kennedy must have been killed, at least in their minds.  $\Box$ 

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# JFK's death, part II— Dallas MDs recall their memories

O nly 90 minutes passed in Dallas from the time Lee Harvey Oswald raised his rifle at 12:30 PM until the slain body of President John F. Kennedy was escorted aboard Air Force One for the 1500-mile flight to Andrews Air Force Base in Maryland and the autopsy at the US Naval Medical Center in Bethesda. The medical team at Dallas' Parkland Memorial Hospital spent only 25 frenzied minutes in their futile effort to resuscitate Kennedy, but that whirlwind of events and emotions produced indelible personal memories.

In truth, though, there were no examinations, measurements, or photographs performed in Parkland's Trauma Room 1 that in any way, shape, or form allowed any of the physicians attending the President to make any meaningful evaluation of the entry and exit gunshot wounds and the forensic cicumstances of death. That assignment was left to the autopsy pathologists at the Naval Medical Center, and their comments in the preceding story stand as the definitive version that Kennedy was struck by only two bullets fired from behind and above from a high-velocity rifle.

This is the unanimous appraisal of four Dallas physicians who have broken their 29-year silence to speak with this reporter about their famous 1963 case. Malcolm Perry, MD, a surgeon, worked the hardest to try to save the patient and performed a tracheostomy in an attempt to create an airway for the dying Kennedy. Jim Carrico, MD, a first-year surgical resident, was the first physician to treat Kennedy, at 12:35 PM, and the first to notice the small bubbling wound in the front of the neck that necessitated the tracheostomy. M. T. "Pepper" Jenkins, MD, the hospital's longtime chief of anesthesiology, rushed to the scene to try to help ventilate the patient. Charles Baxter, MD, a surgeon, assisted in the resuscitation attempt. These were the four key players on the Parkland medical team of November 22, 1963.

Previously, the four have kept their memories private, but they agreed to be interviewed by JAMA in the wake of a new book written by one of their former Parkland Hospital colleagues, Charles Crenshaw, MD, that has bolstered conspiracy theorists because of Crenshaw's incredible 1992 claim that the bullets "struck Kennedy from the front" and that the autopsy photos must have been altered, proving "there was something rotten in America in 1963." Crenshaw attributes these statements and others to his alleged intense eyewitness observations of the dying President.

Although the other four Parkland physicians have some doubt about whether Dr Crenshaw wrote most of the sensationalistic book or deferred to his two coauthors, both of whom are conspiracy theorists, and although they are reluctant to publicly condemn Crenshaw's claims, they emphasize that they believe Crenshaw is wrong.

Since it is hard to prove a negative, no one can say with certainty what some suspect—that Crenshaw was not even in the trauma room; none of the four recalls ever seeing him at the scene.

# 'Dreams of notoriety'

Dr Perry says, "In 1963, Chuck Crenshaw was a junior resident and he absolutely did not participate in a meaningful way in the attempt to resuscitate the President and in the medical decision making. I do not remember `even seeing him in the room." Dr Jenkins says, "He may have been in the room, but he was not among the inner circle attending to the patient." Dr Carrico says, "Charles has extended his conclusions far beyond his direct examinations. Everyone in that room was trying to save a life, not figure out forensics." Baxter adds, "Jim [Carrico] has just made a very astute observation."

Why, then, would Crenshaw make such claims and write a book representing himself as being in the forefront of the resuscitation effort? Baxter says, "Charles and I grew up in Paris, Texas, and I've known him since he was three years old. His claims are ridiculous. The only motive I can see is a desire for personal recognition and monetary gain."

Thumbing rapidly through Crenshaw's slender paperback book, Carrico stops at page 15 and quotes Crenshaw's words, "'Many of us have dreamed that history's grand scheme will involve us in some far-reaching role or experience thrusting us into notoriety and dramatically changing our lives.'" Carrico concludes, "There's your answer, in Charles's own words. I don't have those kind of dreams."

Jenkins says simply, "Crenshaw's conclusions are dead wrong."

Perry concludes, "When I first heard about Crenshaw's claims, I was considering a lawsuit, but after I saw Charles on TV one day all my anger melted. It was so pathetic to see him on TV saying this bogus stuff to reach out for his day in the sun that I ended up feeling sorry for him." He adds, "Crenshaw says that the rest of us are part of a conspiracy of silence and that he withhheld his information for 29 years because of a fear his career would be ruined. Well, if he really felt he had valuable information and kept it secret for all those years, I find that despicable."

Crenshaw's book insinuates that the Bethesda autopsy pathologists altered Kennedy's wounds and it specifically charges that "the incision Perry had made in his [Kennedy's] throat at Parkland for the tracheostomy had been enlarged and mangled, as if someone had conducted another procedure. It looked to be the work of a butcher. No doubt, someone had gone to a great deal of trouble to show a different story than we had seen at Parkland."

Well, the physician who did that work at Parkland—Dr Perry—and three physicians who observed the tracheostomy—Drs Baxter, Carrico, and Jenkins—all say that the autopsy photos of

the throat wound are "very compatible" with what they saw in Parkland Trauma Room 1. Dr Baxter says, "I was right there and the tracheostomy I observed and the autopsy photos look the samevery compatible." Dr Carrico says, "I've seen the autopsy photos and they are very compatible to the actual tracheostomy." Dr Jenkins adds, "They're the same." Dr Perry conciudes, "Of course, tissues sag and stretch after death, but any suggestion that this wound was intentionally enlarged is wrong. When I talked to Commander Humes the morning after the assassination and told him we had done a tracheostomy, he said, 'That explains it-the bullet exited through the throat.'"

Drs Baxter, Carrico, Jenkins, and Perry emphasize that their experiences in the trauma room do not qualify them to reach conclusions about the direction from which the fatal missiles were fired. In fact, Dr Jenkins doubts if any of the Parkland physicians even had a good look at the President's head, explaining, "I was standing at the head of the table in the position the anesthesiologist most often assumes closest to the patient's head. My presence there and the President's great shock of hair and the location of the head wound were such that it was not visible to those standing down each side of the gurney where they were carrying out their resuscitative maneuvers." However, all four agree, in Carrico's words, that, "Nothing we observed contradicts the autopsy finding that the bullets were fired from above and behind by a high-velocity rifle."

As a result of Crenshaw's media allegations, the four other Dallas physicians have been besieged with calls from other members of the Parkland medical team that was on the scene on November 22, 1963. Baxter says, "I can assure you that these calls are uniformly in disagreement with Crenshaw's claims. Most of those who know the facts express disgust at Crenshaw's actions and question if he was involved in the care of the President at all. There has not been one call supporting his position."

Crenshaw also claims in his book to have received a telephone call from President Lyndon B. Johnson, asking him to extract a confession from the dying Lee Harvey Oswald. Baxter responds, "Did that happen? Heavens no ... imagine that, the President of the United States personally calls for Chuck Crenshaw." Another Crenshaw claim is that he was the last to view President Kennedy's body as he closed the casket and that it was at this point that he observed the head wound. Dr Jenkins responds, "It is highly unlikely that any physician would have closed that casket."



Parkland Hospital physicians who tried unsuccessfully to resuscitate President John F. Kennedy included (clockwise from top left) anesthesiologist Pepper Jenkins, surgeon Malcolm Perry, surgical resident Jim Carrico, and surgeon Charles Baxter.

Carrico emphasizes, "We were trying to save a life, not worrying about entry and exit wounds." Perry says, "The President's pupils were widely dilated, his face was a deep blue, and he was in agonal respiration, with his chin jerking. Jim [Carrico] was having trouble inserting the endotracheal tube because of the wound to the trachea and I didn't even wipe off the blood before doing the 'trach.' I grabbed a knife and made a quick and large incision; it only took two or three minutes." He adds, "So many people have theories about the assassination, but I have yet to meet one who has read the entire 26 volumes of the Warren Commission report."

The continuing controversy over the assassination and the refusal to believe the 26-volume, elephantinely documented Warren Commission report obscure the real human tragedy of the event. Pepper Jenkins recalls one poignant anecdote:

"The President was a bigger man than I recalled from seeing him on TV. He must have had really severe back pain, judging by the size of the back brace we cut off. He was tightly laced into this brace with wide Ace bandages making figure-of-eight loops around his trunk and around his thighs. His feet were sticking off one end of the gurney and his head was at the other end, cradled in my arms. I was standing with the front of my jacket against his head wound, an alignment that put me in the best position to carry out artificial ventilation.

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I was getting gushes of blood down my jacket and onto my shoes.

"Jacqueline Kennedy was circling the room, walking behind my back. The Secret Service could not keep her out of the room. She looked shell-shocked. As she circled and circled, I noticed that her hands were cupped in front of her, as if she were cradling something. As she passed by, she nudged me with an elbow and handed me what she had been nursing in her hands—a large chunk of her husband's brain tissues. I quickly handed it to a nurse."

# 'it's too late, Mac'

It was Dr William Kemp Clark, a Parkland Hospital neurosurgeon, who most closely observed Kennedy's massive head wound. He told Dr Perry, "It's too late, Mac. There's nothing more to be done." It was Dr Clark who pronounced the President dead at 1 PM, only 25 minutes after he was wheeled into the emergency room.

By this time, the Secret Service had allowed a Catholic priest to enter the room to administer the last rites. Jenkins recalls, "All of the medical staff seemed to disappear, dissolve, fade from the room, except, I believe, for me and Dr Baxter. I was busy disconnecting the electrocardiographic leads, removing the IVs, and extracting the endotracheal tube. However, before I could finish these duties, Mrs Kennedy returned to the President's side and I retreated to a corper of the room. She kissed the President on the foot, on the leg, on the thigh, on the abdomen, on the chest, and then on the face. She still looked drawn, pale, shocked, and remote. I doubt if she remembers any part of this. Then the priest began the last rites in deliberate, resonant, and slow tones, and then it was over.'

Jenkins recalls that Secret Service agents then "grabbed the President's gurney on each side and wheeled it out of the room, all but running over Dr Earl Rose, the Dallas medical examiner [whose office was right across the hall from the emergency room]."

Dr Rose, who is now retired in Iowa City, also gave JAMA a rare interview to pick up the narrative. "I was in their way," Rose recalls. "I was face to face with Secret Service Agent Roy H. Kellerman, and I was trying to explain to him that Texas law applied in the instant case of the death of the President and that the law required an autopsy to be performed in Texas.

"Agent Kellerman had experienced a tragedy on his watch and, although he had no legal authority, he believed that his primary responsibility was to transport the body back to Washington, DC.



Ignoring the autopsy evidence, Dalias surgeon Robert McClelland maintains a "strong opinion" that the bullets that struck Kennedy came from the front. He bases this conclusion on his viewing of the Zapruder film of the assassination.

He was very distressed, apparently taking the death as a personal affront, and he and I were not communicating. It was not a hostile discussion, but he and I were expressing differing views on what was appropriate."

#### A standoff over removing the body

Theron Ward, a Dallas Justice of the Peace, was at the hospital to assert the applicable Texas law, but, in Rose's words, "he did nothing . . . he was frozen with fear. In effect, no one was in charge of the situation. Agent Kellerman tried three tactics to have his way-he asserted his identity as representing the Secret Service; he appealed for sympathy to Mrs Kennedy; and he used body language to attempt to bully, or, should I say, intimidate. I don't recall the exact words, but he and I exchanged firm and emotionally charged words. At no time did I feel I was in physical danger because he and the others were armed. I was not looking at Agent Kellerman's gun, I was looking at his eyes, and they were very intense. His eyes said that he meant to get the President's body back to Washington."

In 1963, Rose was 6-feet, 2-inches tall and solidly built. He was not the kind to back down from a fight if he believed he was right. "I was raised in western South Dakota," he said, "and I carried that baggage with me. People raised in western South Dakcta may lose a fight, but they don't get bullied or intimidated." The standoff, however, was soon over. Rose says, "Finally, without saying any more, I simply stood aside. I felt that it was unwise to do anything more to accelerate or exacerbate the tension. There was nothing more I could do to keep the body in Dallas. I had no minions, no armies to enforce the will of the medical examiner."

Later that day, Rose autopsied patrolman J. D. Tippit, who was killed by Oswald; two days later, he autopsied Oswald himself, who was killed by Jack Ruby; a few years later, he autopsied Ruby.

It is 29 years later and Rose, who has a law degree as well as a medical degree, still feels strongly that the Kennedy autopsy should have been performed in Dallas. "The law was broken," Rose says, "and it is very disquieting to me to sacrifice the law as it exists for any individual, including the President. Having one set of rules for the rich and famous and another for the poor is antithetical to justice. There have been many arguments to try to justify the removal of the body, but to me they all seem like retrospective and self-serving theories. People are governed by rules and in a time of crisis it is even more important to uphold the rules, as this case amply demonstrates."

Rose believes that a Dallas autopsy, which he would have performed, "would have been free of any perceptions of outside influences to compromise the results. After all, if Oswald had lived, his trial would have been held in Texas and a Texas autopsy would have assured a tight chain of custody on all the evidence. In Dallas, we had access to the President's clothing and to the medical team who had treated him, and these are very important considerations."

Further, Rose believes that the removal of the body was the first step in creating disbelief about what had happened. "Silence and concealment are the mother's milk of conspiracy theories," he says. "If we have learned anything in the 29 years since the President was shot, it is that silence and concealment breed theories of conspiracy and the only answer is to open up the records, without self-serving rules of secrecy, and let the American people judge for themselves."

Rose, who is a board-certified forensic pathologist and who has personally examined Kennedy's autopsy materials and records, next turned his attention to the claims made by Dr Crenshaw, who is a surgeon, "I believe that Dr Crenshaw believes what he is saying when he argues that the shots came from the front," Rose says, "but he is mistaken." Pressed on his degree of confidence in this statement, Rose finally says, "I am absolutely sure that he is in error."

Rose was a member of the 1977 House

Select Committee on Assassinations that had access to the entire autopsy file of President Kennedy and that supported the autopsy conclusions. Though he thinks the Bethesda autopsy was "less than optimal," Rose has no argument with the central fact, saying, "I agree that the two wounds to the neck and head came from behind and above and that there is no room for doubt on this finding. The physical evidence corroborates this without question." He concludes, "Do not attribute to conspiracy what can be explained by distrust, inexperience, or ineptitude." Offering his own appraisal of who killed Kennedy, Rose says, "Oswald is the prime suspect and there is no credible evidence for any other suspect. However, there will always be reservations until all the evidence is disclosed. Only this morning the US Justice Department again opposed on the grounds of national security a Congressional resolution to open the Kennedy files."

#### Mistakes and conspiracies

One might think that all this demonstration of facts and expression of expert medical opinion would end the controversy over the President's autopsy, but one would probably be wrong. Even in that Parkland Hospital trauma room there was one other physician who still disbelieves the President's autopsy report. Robert McClelland, MD, is a respected surgeon who assisted in the last steps of the tracheostomy on President Kennedy. Interviewed in Dallas, he told this reporter that he maintains a "strong opinion" that the fatal head wound came from the front. Pressed on his reasons, he says, "After I saw the Zapruder film in 1969. I became convinced that the backward lurch of the head had to have come from a shot from the front. Unlike Crenshaw, I do not believe that one can tell the direction from which the bullet came simply by looking at the head wound, as I did, but the wound I observed did appear consistent with a shot from the front. That observation is secondary to my viewing of the Zapruder film, which convinced me that the shots were from the front." Reminded that at least 16 pathologists have also studied the Zapruder film and also examined the autopsy clothing, notes, photos, and x-rays and have concluded the opposite, McClelland remains unshaken. "I can't speak for them," he says, "and although I am not an expert in ballistics, pathology, or physics, I still have a strong opinion that the head shot came from the front."

So it goes. McClelland had originally mistakenly written in his hospital chart



Dr Earl Rose: "The law was broken, but I had no minions, no armies to enforce the will of the medical examiner and perform the autopsy in Dallas."

that the wound to Kennedy's head struck the *left* temple. This error, as published in the Warren report, later prompted a call from the office of New Orleans District Attorney Jim Garrison, who wanted to bring him to New Orleans in 1969 to testify in the conspiracy trial of Clay Shaw. McClelland recalls, "Well, when I told the investigator that I had made a mistake in 1963, there was a sudden silence at the other end of the line."

Mistakes do happen and contribute to conspiracy theories. Similarly, Dr Jenkins wrote in a 1963 report that Kennedy's "cerebellum" had been blown out, when he meant "cerebrum." Dr Perry appeared at a riotous press conference on the day of the assassination and said that the fatal shot "might have come" from the front. All have become grist for the rumor mill.

Jenkins was a technical consultant to the making of the film JFK, advising on the layout and equipment of the Parkland Hospital trauma room. Assured of director Oliver Stone's passion for authenticity, Jenkins was able to help re-create the

1963 room right down to the last detail and also to re-create the original Parkland emergency room entrance, which in subsequent decades has been engulfed by the complex of new buildings constructed at the parent University of Texas Southwestern Medical Center, Dallas. When Jenkins showed up at the set for a day of shooting, he noticed that the actors representing the medical team were all being issued blood-soaked scrub suits. Advising Stone that only he and Mrs Kennedy were splattered with blood, Jenkins was told by the director, "Oh, doc, people expect to see blood!" Jenkins notes, "So much for authenticity." Jenkins himself made a cameo appearance in the film, but says, "I was so bored with the film that I fell asleep and -missed my two seconds on camera!"

People expect to read about conspiracy theories and this probably will not change. Earl Rose concludes, "The defamers of the truth can only be confronted and defeated by the truth."

This special report is our attempt to confront the defamers of the truth.  $\Box$ 

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