

Interviews with Eight
Trailblazing
Cardiovascular
Surgeons

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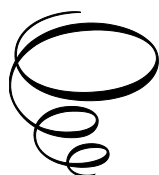
- DeBakey ME. Michael Ellis DeBakey: a conversation with the editor. Interview by William C. Roberts. *Am J Cardiol.* 1997;79(7):929-950. doi:10.1016/s0002-9149(97)00073-8
- Kirklin JW. John Webster Kirklin, MD: a conversation with the editor. Interview by William Clifford Roberts. *Am J Cardiol.* 1998;81(8):1027-1044.
- Cooley DA. Denton Arthur Cooley, MD: a conversation with the editor. Interview by William Clifford Roberts. *Am J Cardiol.* 1997;79(8):1078-1091. doi:10.1016/s0002-9149(97)00035-0
- Sabiston DC. David Coston Sabiston, Jr, MD: a conversation with the editor. Interview by William Clifford Roberts. *Am J Cardiol.* 1998;82(3):358-372. doi:10.1016/s0002-9149(98)00324-5
- Robicsek F. Francis Robicsek, MD, PhD: a conversation with the editor. Interview by William Clifford Roberts, MD. *Am J Cardiol.* 2000;85(11):1340-1356.
- Yacoub MH. Professor Sir Magdi Habib Yacoub, FRS, FRCS, FRCP, DS: a conversation with the editor. Interview by William Clifford Roberts. *Am J Cardiol.* 2004;93(2):176-192. doi:10.1016/j.amjcard.2003.10.003
- Cohn LH. Lawrence Harvey Cohn, MD: a conversation with the editor, William Clifford Roberts, MD. *Am J Cardiol.* 2006;97(6):929-942. doi:10.1016/j.amjcard.2005.12.020
- Sundt TM 3rd, Roberts WC. Thoralf Mauritz Sundt III, MD: a conversation with the editor. *Am J Cardiol.* 2017;119(1):156-168. doi:10.1016/j.amjcard.2016.08.094

Interviews with Eight Trailblazing Cardiovascular Surgeons

By

William Clifford Roberts

**Cambridge
Scholars
Publishing**



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This book first published 2023

Cambridge Scholars Publishing

Lady Stephenson Library, Newcastle upon Tyne, NE6 2PA, UK

British Library Cataloguing in Publication Data

A catalogue record for this book is available from the British Library

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ISBN (10): 1-5275-9248-0

ISBN (13): 978-1-5275-9248-3

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MICHAEL ELLIS DEBAKEY, MD (1908–2008)

Dr. Michael E. DeBakey was born in Lake Charles, Louisiana, on September 7, 1908, and I had the honor of talking with him for over 3 hours in his conference room in Houston, Texas, on September 18, 1996. During the interview, Dr. DeBakey reminisced about his earlier life and a few of his accomplishments. There were only two interruptions during the interview, and each was a telephone call from President Clinton's physician. Each call concerned President Boris Yeltsin's grave illness and Dr. DeBakey's September 22, 1996, planned trip to Russia to consult about the president's cardiac disease. At the end of the interview, Dr. DeBakey took me into his "manuscript room," where he was working on a paper on 30-year outcomes on about 30,000 patients he had followed after they had had various operative procedures involving the coronary, carotid, renal, and peripheral arteries and the abdominal aorta. For someone who had already published about 1,500 articles plus several books, he was as excited about this latest manuscript as most physicians when seeing their first manuscript published. Furthermore, although Dr. DeBakey did most of the talking during the interview, his stories making me laugh on many occasions, at the end of the nearly 4-hour interview, he appeared to have more energy left than I did, and all I did was ask a few questions.

Dr. DeBakey is a great man. In addition to being a masterful surgeon, innovator, and scholar, he is the century's most influential international and national medical statesman. His work in the Surgeon's General Office led to the development of mobile army surgical hospitals (MASH units). He later helped establish the specialized medical and surgical center systems for treating military personnel returning from World War II, which subsequently became the Veterans Administration Medical Center System. Also, while on active duty during World War II, he proposed a systematic follow up of veterans with certain medical problems, and this initiative subsequently led to the establishment of the Committee on Veterans Medical Problems of the National Research Council and an

extensive Medical Research Program by the Veterans Administration. He has been the century's best advocate for more dollars for medical research. He was responsible for preserving the Surgeon General's Medical Library. He convinced Congress to provide the new building, now called the National Library of Medicine, and to move it to the Bethesda campus. He was the one most responsible for making the Texas Medical Center what it is today. Specifically, he single-handedly preserved the Baylor College of Medicine and wove its association with the Methodist Hospital at Houston. He has served as an advisor to almost every president in the last 50 years and to heads of states around the world. For his many accomplishments, Dr. DeBakey has received 50 honorary doctorate degrees from prestigious colleges and universities as well as innumerable awards from educational institutions, professional and civic organizations, and governments throughout the world. These awards include the Legion of Merit, US Army (1945); American Medical Association Hektoen Gold Medal (1954 and 1970); Rudolph Matas Award in Vascular Surgery (1954); International Society of Surgery Distinguished Service Award (1958); Leriche Award (1959); American Medical Association Distinguished Service Award (1959); Albert Lasker Award for Clinical Research (1963); St. Vincent Prize for Medical Sciences (1965); Prix International Dag Hammarskjöld Great Collar with Golden Medal (1967); American Heart Association Gold Heart Award (1968); Presidential Medal of Freedom (1969); Eleanor Roosevelt Humanities Award (1969); Yugoslav Presidential Banner and Sash (1971); Union of Soviet Republics Academy of Sciences 50th Anniversary, Jubilee Medal (1973); Independence of Jordan Medal (1980); The Merit Order of the Republic of Egypt (1980); American Surgical Association Distinguished Service Award (1981); Theodore E. Cummings Memorial Prize for Outstanding Contributions in Cardiovascular Disease (1987); Presidential Medal of Science (1987); Thomas Alva Edison Foundation Award (1988); and International Platform Association George Crile Award as The Trailblazer in Open Heart Surgery (1988).

William C. Roberts, MD (hereinafter, WCR): *I am speaking with Dr. Michael E. DeBakey in his office suite in Houston, Texas, on September 18, 1996. I consider you this century's finest medical spokesman and certainly one of its premier surgeons. I want to try to find where your passion for medicine came from, where your desire to excel far above the pack came from. What was it like growing up in your family and in Lake Charles, Louisiana?*

Michael E. DeBakey, MD (hereinafter, MED): First, Bill, I was blessed with parents who were both highly intelligent and exceedingly

kind and generous in their temperament and psyche. They lived almost exclusively for their children. They wanted to give us the best of everything, and they believed education was crucial. They were both first-generation immigrants, having come to this country as children. Because they believed that a good education was essential to prepare us for a fulfilling life, they always encouraged us to excel in our studies. For example, they urged us to go to the local library once a week and choose any book we wanted to read. We had a small but very good library in Lake Charles. I came home from the library one day and told my father that there was a wonderful set of books there, but you could not borrow them; you had to read them in the library. He asked me the name of the book, and I responded, *The Encyclopaedia Britannica*. He said, "Well, we will get it." I don't remember how many volumes there were at that time—not as many as there are today—but he purchased the complete set. All of us, my brother, sisters, and I, before we went to college, had each read that whole set of *The Encyclopaedia Britannica*. That is how important it was to us, not only from an educational standpoint, but mainly because we enjoyed reading. All of us excelled at school; we all led our classes. My sisters all led their classes. They were smarter than I was; at least they were a little more studious. My brother and I wanted to play and do other things.

The one thing that I never got an "A" in was deportment. In those days we had a deportment grade, and I had great difficulty with it because I would finish all my studies and would get bored because the teacher was dealing with material I had already mastered. In what we then called grammar school or elementary school—I think I was in the fifth or sixth grade—the classes were divided into two sections—A and B—and the same teacher taught both classes. While she was teaching one class, she would give the other class a study period of 30 minutes, after which she would go back to the other side. She noticed I was sitting in the center, paying attention to what she was doing, whether she was in my class or the other one. So near the end of the class, she said to me one day, "I notice that you are paying attention to both classes. Would you like to take the exam for both of them?" I said, "Sure." I took both exams and was permitted to skip a grade because I passed the exam. School was fun for me because I enjoyed learning new things. My parents had always emphasized to all of us the joy of learning. I studied, learned, and earned good grades, and I think that became a habit.

WCR: *Did your parents go to college?*

MED: No, but they were self-educated, read widely, and had remarkably critical minds and retentive memories.

WCR: *And they pushed education to the hilt.*

MED: Yes, absolutely.

WCR: *I presume you read the book or books that you got from the library once a week?*

MED: Yes, regularly.

WCR: *From age 6 through age 17, I calculate that you must have read over 600 books outside of school.*

MED: Yes, at least, plus the encyclopedia. I was a voracious reader. In fact, we had to go to bed at a certain time. We would do our lessons—our parents would make sure we had done our lessons—and then if we had time, we would read the library book or sections of *The Encyclopaedia Britannica*. Often, we were all going to *The Encyclopaedia Britannica* at the same time. Of course we would not read the same thing. Usually by 10:00, our parents wanted us in bed, because we had to get up early. Our father was a very early riser, and we all had assigned chores, to encourage self-discipline and responsibility, even though my parents had a house-staff. By 5:00 AM we were up. I guess I got habituated to the early rising. That came in handy, because when I first started as a freshman in college, I lived in a dormitory, and the boys were raising cane all night. I wanted to study, but couldn't because of the commotion. I would just go on to bed, and get up at 3:00 or 4:00 in the morning and do all my studying while it was quiet. So I got into the habit of getting up early, and it does not matter what time I go to bed now; I still arise at 5:00 AM. I read the *New York Times* and *Wall Street Journal* in about 30 minutes. After that I can get some of the things done that I may not be able to do during the day—work on a manuscript or attend to some other paperwork. Getting up early has been of great value not only in my surgical practice, but also in allowing me an additional couple of hours beyond that of the average person. Fortunately, I manage well on 5 or 6 hours of sleep a night, just as my father did.

WCR: *So if you get 5 hours of sleep a night, and you are 88 years old, you have slept only 14 of your last 68 years.*

MED: You are probably right about that. If you sleep 8 hours a night (one-third of every day) and you live 60 years, you have really lived only one-third of that time or 40 years. So whatever you can take from your sleep extends your conscious living.

WCR: *So you are 88 years and a maximum of one-fifth of your life has been spent sleeping.*

MED: That is about right. And that gives me a tremendous advantage. People ask me, "How in the world could you write nearly 1,500 articles in

that period of time?" If you live your life long enough and you have enough time, you can do it.

WCR: *Yes, but you don't waste a minute. You spend very little time commuting. You live 5 minutes from the hospital.*

MED: In fact, I deliberately chose to live near the college. When I first came to Houston, I rented a house that was also only about 10 minutes from here. An associate dean was living in a place he had built, about 30 minutes away from the hospital. He wanted me to consider that area. Each lot was about an acre or an acre and a half, with a lot of trees, and it was attractive. I simply told him, "That means an hour of commuting and that is an hour of wasted time. That is one thing. The second thing is I am a surgeon and if I get a call in the middle of the night, I don't want to use the telephone, I want to see that patient." So I told him, "No, I am not interested." I declined three professorships in New York, two before I came here and one after, because at that time I had small children and didn't want to live in an apartment in New York City. One of the physicians in New York who drove me out to Westchester and other places to show me around told me that he spent nearly 3 hours commuting every day. Think of that. I deliberately chose a house in Houston close to the hospital. It has been my home ever since. It takes 5 minutes to get here.

You have to decide early what you want in life. You know that you have a certain time span, whatever God gives you. When you are living, you want to enjoy that. When you are sleeping, you are just dead as far as conscious living is concerned; that's part of your death. So I think you have to set some goals and priorities. I try to use my time as efficiently as I can. Obviously, you can't avoid doing some things. You have to take time to shave, and do the daily chores, but you can control other things. As a surgeon, I could not control a certain amount of time because I had to be in the operating room.

When I became dean of Baylor University College of Medicine in 1968, we had a review for accreditation—I think it was the next year. The accreditation group came to the college, made a thorough review, and gave us its approval. We were sitting at the end of the table, and they were asking a few questions; among them: How do you have the time to be dean of the medical school? How do you explain the fact that you are dean *and* chairman of surgery and a very busy surgeon? At that time I was operating every day, including weekends. In a jocular vein, I said, "Well, I do it between cases." This did not go over very well, but the truth of the matter is that is what I did. It was between cases and after I finished the operating schedule for the day I would go over to the dean's office and meet with the faculty members who had become associate deans. Actually, we did not

have any money to hire a full-time dean. You remember when you came here in 1973 what the problems were.

So you try to be as efficient as you can with your time. You have to sacrifice some things. For example, I rarely see television, unless there is something of special interest that is called to my attention. If I have a little time at home, I spend it on a manuscript I am working on or some articles I am reviewing for library research, or something like that. I gave up hunting and fishing years ago. I have friends here, for example, who have yachts in Galveston, and they continue to invite me to go fishing or hunting, but I don't do any of that. I go to some college dinners, but I leave as soon as I can. I try to conserve whatever time I can for the things I need to do, most of which are in my professional sphere of interest.

WCR: *May I go back a little bit. I have always been impressed with how beautifully you handle yourself in any situation. When you were growing up at home, what kind of conversation went on at the dinner table?*

MED: Most often, my father or mother would bring up some topic. For example, my mother would say to us, "Next Sunday, we are going to the orphanage." Every Sunday morning shortly after church, we would have dinner, and then in the early afternoon, Mother would say, "I want you to help me prepare some things for the orphanage." There might be clothes that needed repair; she had taught me to sew. In those days, young girls were supposed to learn to sew before they were married. About a half dozen girls would come to the house after school, and she would teach them not only crocheting and knitting, but how to cut a pattern and how to use a sewing machine. And I learned all those things as I sat and watched them. I enjoyed it. In fact, I also tatted, using a little bobbin to make lace. Most young people today have never heard of tating. Of course, neither do most of them know how to sew.

Occasionally, my father would say we were going to drive to the next parish, Cameron Parish, where some friend of his wanted him to buy some land or obtain a loan from him on it. Our father would also bring up occurrences at the drugstore that he thought might be of interest to us, perhaps a new pharmacist he was going to hire. Or we would talk about some of the politicians. We were never activists in politics, but state and local politicians always sought my father's advice and support because he was a successful and highly respected businessman. The governor made him a Louisiana colonel, and the sheriff made him an honorary deputy. In addition to the drug store, he had other business interests, including rice farming, real estate, and construction.

We would occasionally also talk about our school work, and if there were any problems, we would discuss those. So the conversation would include topics that were of interest to all of us. If we had read an interesting book, or had read something in the encyclopedia about a certain country, we would be asked to relate it. Occasionally, one of the children would say “let me talk” because everyone was speaking, and you could not get a word in edgewise until one of our parents announced who had the floor. It was very stimulating.

My mother was religiously inclined, but she did not wear her religion on her sleeve. She never tried to convert anyone, but she and my father lived very Christian lives. My parents had been educated in religious schools. Within the family, religion was very personal. Before we went to sleep at night, we would kneel and say our prayers, beginning with the Lord’s Prayer. Before my parents came to America, they had belonged to the Greek Orthodox Church—the church that had split off from the Roman Catholic Church. In Lake Charles, my parents joined the Episcopal Church. We went to church regularly and supported the church; it was an integral part of our lives. My sisters sang in the choir, and we all participated in church activities.

Throughout our childhood, our mother and father stressed honesty, self-respect, integrity, probity, compassion, personal independence, and courtesy. They instilled the highest human values not only by example, but also by using various incidents to illustrate and extol those virtues.

I had a boyhood friend and classmate named Pee Wee Hines, so-called because of his smaller size. We both played musical instruments. I played the saxophone, although I actually started with the piano, but because I wanted to play in the band, I got a saxophone. Pee Wee’s father was a Presbyterian minister, and the Presbyterian Church had a small orchestra that would play on Sunday evenings for the congregation. I played with that group and became familiar with the Presbyterian Church. At that time, the Boy Scout Troop that I belonged to (#32) was sponsored by the Baptist Church. I therefore had a broad religious background. I also attended a Catholic school for my first 2 or 3 years before going to public school. In Lake Charles, the public schools had very high academic standards and always ranked high in our state rallies. We lived in a house that was just two blocks from the public school, so I could walk to school.

WCR: *Why did you pick Tulane to go to college?*

MED: It was the best college in the South at that time; it was known as the Harvard of the South. I was 23 years old when I graduated from medical school, because I had only two formal years of college before entering medical school. Since I wanted to get my bachelor’s degree, I told

my professors, “I have enough credits to get into medical school, but I also want to get a bachelor’s degree, and I would like to take the additional courses required for my bachelor’s degree while I am in medical school.” They said it had never been done, and they would not advise me to do that. I said, “Well if I can do it, would you let me?” They said, “Yes, if you want to try.” So I did.



Fig. 1. As a student at Tulane University.

WCR: *So during your first 2 years in medical school you took your last 2 years of college at the same time?*

MED: That’s right, and I graduated with my freshman arts and sciences class at the end of my sophomore year in medical school.

I had also played in the marching band, but then I found out that Tulane had a symphony orchestra. The professor of philosophy had been a member of the Philadelphia Symphony Orchestra, and when he came to Tulane, he organized a symphony orchestra among the students. I became interested in this, but when I went to audition, they said, “We don’t need any saxophones.” I said, “Well, what do you need?” They said, “We need a clarinet.” I said, “All right, I’ll play clarinet.” I called my father that night and told him I wanted to buy a clarinet. He said, “Why?” and I told him, and he approved. My father was very generous. I went downtown and

bought a clarinet and started practicing although I never took formal lessons. I practiced very intensively for 6 weeks. A friend of mine who was in the symphony orchestra and the band helped me. After about 6 weeks of intensive practice, I asked if he thought I could audition. He said, "I will bring some audition music for you." He brought some classical music for the clarinet, and I auditioned for about an hour with him, after which he said, "I think you can make it." That's how I began to play in both the band and the orchestra.

WCR: *So back then you were not sleeping much either. How did you enjoy college?*

MED: I had a great time in college; I enjoyed it tremendously. In my freshman year, I took zoology. One day, the professor of zoology asked me, "What are you going to do this summer?" I said, "I am going to go on a vacation." He said, "Why don't you stay here and help me with a course I have to give during the summer?" I said, "Fine." He said he would pay me—I have forgotten what the amount was, but it wasn't a great deal. I called my parents and told them that this was a great opportunity for me. They agreed. He appointed me an instructor in cat anatomy. I had just finished my freshman year in college. Most of the summer students were teachers who wanted credit for higher degrees. I found myself teaching young ladies who were older than I was. In addition to that cat course, I was also involved in a course that included a variety of animals. Every Sunday I would go to the marshes to get frogs, snakes, and water moccasins. On one occasion, I was living in a private home, where the only meal on Sunday was at noon, so I would go out early to the land marshes—you didn't have to go very far in New Orleans to get there—get the animals and put them in a gunnysack. One day I rushed to be back in time for lunch, so instead of stopping at the lab, I brought the gunnysack full of snakes with me and put it behind the door. Somehow, the gunnysack opened, and all of a sudden while we were at dinner in the next room, the lady of the house, sitting at the table right in front of the door, saw the snakes come in. She ran, terribly frightened. I had to rush out and catch all the snakes and put them back in the gunnysack.

WCR: *Now in medical school, you met Dr. Alton Ochsner, during your sophomore year, I presume.*

MED: In my sophomore year, I worked as an assistant technician in the laboratory of another member of the medical faculty. In my junior year, Dr. Ochsner sought me out, and in my senior year I worked in his lab. The other faculty member was interested in the pulse wave; he wanted to find a pump that could modify the wave. This was in vitro, so he asked me to look up "pumps" in the medical library. I could not find much about

the kind of pump he wanted. In my college days, one of my closest classmates was studying engineering. I called him and asked, "Do you know anything about pumps?" He said, "Oh sure. We work a lot with pumps in engineering school." I told him what I was trying to do and explained that I could not find much in the medical library. He said, "You have got to go to the School of Engineering library." I went uptown, where the Engineering School was located, across the street from Audubon Park, and in that library I found all kinds of information about pumps, going back more than 2,000 years. I spent days researching it and was fascinated.

In the early 19th century, someone had written an article about the use of rubber tubing (rubber had just been discovered) and about compressing that tubing to force fluid out of it as a possible pump. That is what gave me the idea. So I began to think about a way to make a rubber tube into a pump. I got the idea of some kind of compression. I worked on different ways of compressing, pressing it down, finally rolling something over it as I could with my fingers. I experimented with different ways of doing this. I went to a foundry in New Orleans and had them make a kind of round cup that I could put the tube in. Then I experimented with different types of rollers, two rollers, three rollers, four rollers. Finally, after a year or two of experimenting, I finally got the two rollers and the pump the way I wanted it.

At that time I had no idea of using this pump for the heart-lung machine. John Gibbon had been working on a heart-lung machine for some time. This was before World War II. He started as a resident at Massachusetts General Hospital, and I ran into him at a meeting where he had an exhibit of his heart-lung machine. He tells the story in an article he published. He was showing his machine to me, and he said, "You know, the problem is the pump. I don't know what to do about this pump." He had what now would be called a sigma type of pump, but it was not working well. I said, "I have a pump you might be able to use." I told him about it and offered to send him a sample of it, which I did, and he adapted it for his heart-lung machine.

WCR: *But you developed it to get blood in people quickly for transfusions?*

MED: No, that came later. I developed it primarily for this faculty member with whom I was working, who wanted to be able to use some kind of pump to modify the pulse wave. I developed the pump for him. If you roll that pump when you have fluid in it, the outlet tube will create a pressure. If you compress the tube, the pressure will go right up. So when you compress the tube and then release it, it will create a wave. Depending

on how much pressure you create and how quickly you release it, the wave can be modified. That was what it was for.

When I became a resident, blood transfusion was indirect. The blood from the donor was put in a paraffin-coated glass container, and the collected blood would be brought over to the patient. That is when it occurred to me, "I can do it directly by this roller pump." I must have used the roller pump on a couple of thousand patients for transfusions. This made me an "expert." I would go all around town giving blood transfusions with my pump.

WCR: *When you were a senior in medical school, you worked in Dr. Ochsner's laboratory. I gather you two just sort of clicked right away?*

MED: Very quickly, I took to him. During my senior year, he came to me one day after a lecture and said, "I want to talk to you. I know you have been working over in the medical lab. How would you like to work in my lab?" I responded, "I would love to." He said, "I need some assistance. We are doing some dog experiments, and if you would like to work, come on over." So I did.

He was interested at that time in peptic ulcer. In those days, the concept was that the gastric acid was primarily responsible, so they were doing experiments on modifying it, like transplanting the bile duct from its position in the duodenum to some other place in the ileum. I became a regular dog surgeon. Sometimes I would do 8 or 10 dog operations in an evening, working until midnight. I liked doing this research very much, and I was attracted to the technical aspects of operating. I liked working with my hands. (Both my parents were extremely dextrous.)

One day Dr. Ochsner said to me, "I want you to stay in surgery. You impress me. I want you to be my intern and resident." So I became, from that point on, his student, and he became my mentor. He treated me like a son. We wrote papers together. I would go over to his house and work on a paper in his study at his home and make slides for him. We had to do everything ourselves in those days. It was a great learning experience, and he was a great disciplinarian. He was of Swiss-German origin; as a matter of fact, he traced his ancestry to Paracelsus. He directed my entire early development.

He was the one who suggested I study in Europe because he had also trained there. In those days, Europe was the ultimate training ground. My parents were eager to support my study abroad, even though there was a Depression, because they wanted all of us to get as much education as we could. I went to Strasbourg, France, because Dr. Rudolph Matas, who was still living at that time, suggested to Dr. Ochsner that I train there with Professor René Leriche. He considered Leriche to be the most advanced

surgeon in vascular surgery at the time. I published three papers while I was there. It was a wonderful experience.

WCR: *You found Leriche to be technically a very good surgeon?*

MED: If he was interested, for example, in sympathectomies, he was technically very good, but if he was doing a gastric resection, he was not very good. He did not have what I would call a surgical temperament either. He was more philosophical, introspective, a great historian, and well versed in art. He was one of those old-fashioned, well-educated Frenchmen, and surgery was almost an avocation. He was interested in the circulation, and if you read some of his articles, you can see how philosophical he was. He wrote beautifully.

WCR: *You learned how to speak French when you were there?*

MED: Yes, of course; everyone spoke French. Then I went to Heidelberg, Germany, to be with Professor Martin Kirschner because Dr. Ochsner suggested I go there. I had a great time with Kirschner, too. It was another great experience because Heidelberg in those days was a great university town.

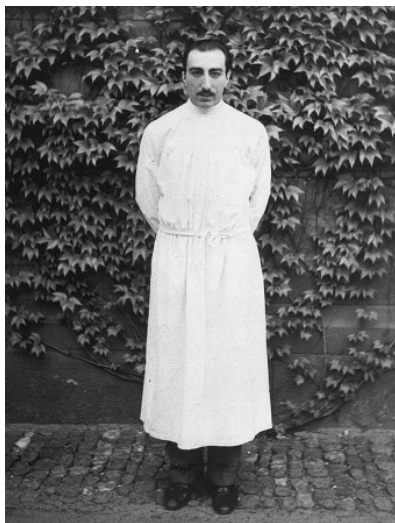


Fig. 2. As a research fellow at the University of Strasbourg, France, 1935.

WCR: *So this was 1936?*

MED: Yes. This was the beginning of the Nazi regime, and I used to see them marching in the streets in Heidelberg and practicing with brooms instead of guns. I had no idea what was going on. I became close friends

with a young man named Ernst, who was a resident with me and spoke English very well. He had an automobile and would drive me around in his car. Every Friday, we would go to Mannheim, a bigger city not far from Heidelberg, because he was a member of a military reserve group. They would all be in uniform when they went to their meetings. I would drive with him to Mannheim, and I would wait in the vestibule until after the meeting. When he came out, everyone would have sausage and beer together. I thought these people were the counterparts of our college students in the ROTC.

WCR: *You learned how to speak German when you were over there?*

MED: Yes.

WCR: *So you were busy with these languages, in addition to picking up what you could professionally.*

MED: That's right.

WCR: *Kirschner, what kind of surgeon was he?*

MED: He was a very good surgeon. He was very kind to me; at least once a month he would invite me to his home for dinner. His wife was also nice, and so was his daughter.

WCR: *What was his expertise? Why did you want to work with him?*

MED: Gastroenterology. In those days, there were no medical specialties. I was interested in the circulation, an interest I had acquired when I was working as an assistant technician. There was not much vascular surgery. They were doing sympathectomies, but that was about all. We were doing experimental work. In Strasbourg I became close friends with the chief resident, called a *chef de clinique*, whose name was Jean Kunlin. One day he asked me if I would like to work with him in the laboratory. The research laboratory was a separate building behind the hospital, perhaps twice the size of this room. We operated on dogs. Incidentally, Kunlin was the surgeon who did the first successful femoropopliteal bypass. I remember that we were working experimentally on it at that time. Kunlin died just a couple of years ago. The other research fellow with me—called *assistant étranger*—was Cid dos Santos, the son of Renaldo dos Santos, the professor of surgery in Portugal, who did the first abdominal aortogram in 1926. Cid, who did the first endarterectomy, and I also became very good friends.

WCR: *How did that come about?*

MED: By a kind of serendipity. He wanted to remove an embolus in the femoral artery. It turned out to be a very firmly adherent clot superimposed on an atheroma. When he tried to remove the clot, the underlying plaque suddenly peeled away from the arterial wall. He then observed that there was a cleavage plane between the atheroma and the remaining

arterial wall. It is interesting that here were two very important contributions to vascular surgery, and they were done by these two people at Leriche's clinic when I was there.

WCR: *Was this the first time you had been abroad, Dr. DeBakey?*

MED: No, it was the first time I had been abroad alone. When I was about 12 years old, my mother and father decided to take a year off to travel. We went to Lebanon, which, of course, is the country of my parents' families. We took a ship from New Orleans and arrived in Cherbourg, France, about 3 weeks later, having made stops in Cuba and the Canary Islands. We then drove across France to Marseille (my father had taken our automobile with us), boarded a ship there, stopped off briefly in Naples, and then continued on the ship to Cairo. From there we went to Jedeidet, Lebanon, my grandparents' hometown, which became our base while we traveled all over, staying away 2 or 3 days every week. We visited the Holy Land. I learned to speak Arabic. I don't speak it well now, but when I was there, I was speaking Arabic fluently. I started to read and write in Arabic and can still write my name in Arabic. The trip was a marvelous experience.

Before I left Lake Charles to go on this trip, I visited the editor of the local newspaper, the *Lake Charles American Press*, and told him that I had a lot of friends and didn't want to write each one individually about the trip. I asked if he would publish a weekly letter from me so all my friends and classmates could read it. He said, "Sure, we'll do that." This set of letters was a diary of my trip. I wrote about what I saw, whom I had met, and something about the history of the places we were visiting.

WCR: *So somebody back in Lake Charles was saving the published letters for you?*

MED: Yes, they saved the papers for me. These published letters made it possible for my boyhood friends in Lake Charles to read about what I was doing.

WCR: *Well, that must have given you a confidence boost in your ability to communicate. You were 12 years old?*

MED: Yes.

WCR: *Your brother was the next oldest?*

MED: Yes. He is a surgeon practicing in Mobile—a very fine surgeon.

WCR: *So when you came back from this year-long trip abroad, you were pretty sophisticated?*

MED: I suppose so for a young boy, mostly about the Middle East.

WCR: *When you came back to New Orleans, after finishing your training with Drs. Leriche and Kirschner, you joined the Tulane faculty?*

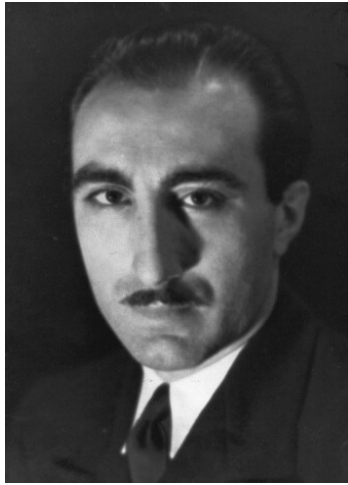


Fig. 3. MED, 1940.

MED: Dr. Ochsner offered me a full-time job, and I think my yearly salary was \$3000. I went home to tell my parents what a great honor it was to get this job. I would be a full-time instructor in the Tulane Department of Surgery under Dr. Ochsner. I was delighted. When I told my father the salary, he turned to my mother and said, “What do you think of that? We spend more than \$100,000 educating this boy, and now he tells me he is going to make \$3000 a year.” So they had to support me. They were still supporting me after I arrived in Houston. In fact, I could not buy my home in Houston—the house I am living in now. They bought it for me. I must say I was not a great financial success for a long time. But, you know, it never occurred to me, and somehow I took it for granted that this was the way it ought to be, and I was very happy. So you see how lucky I was to have the parents I had, who fortunately were financially successful and very generous and took great pride in their children. Anything we wanted within reason, we got. I had an automobile while I was in college at Tulane, I had an automobile—in the midst of the Depression. So did my brother.

WCR: *Yeah, but you were not sleeping, you were doing what you are doing now.*

MED: That’s true, I didn’t use the car very much. I had very few dates because I was spending the greater part of my time working.

WCR: *You did get married in the late 30s.*

MED: Yes. Shortly after I returned from Germany, I married a young lady whom I had met in New Orleans. We had a very happy time together. We had four boys. She died suddenly and unexpectedly in 1972. We had been to Mexico; I had operated on the son of a close relative of the president of Mexico some years before. We were there for a medical meeting, and they insisted we stay with them. We were wined and dined and, as you know, they keep you up pretty late. When we returned, she was complaining of an upset stomach and pain around the lower part of her chest and abdomen. I thought initially it was a gastrointestinal problem. After a couple of days, when she seemed to get worse instead of better, I insisted that she be admitted to the hospital so we could find out what was going on. Ed Dennis took care of her. It wasn't because Ed Dennis was a cardiologist that I asked him to see her; it was because we were such close friends. Ed was a good internist as well as cardiologist. I was operating, and I got a call that there was an emergency, and was asked to rush over to my wife's room. When I got there, she was gone. She had a profound heart attack. She was relatively young.

WCR: *Could you discuss your experiences in World War II? You appear to have had a major impact on medicine/surgery in World War II.*

MED: I had a very interesting experience in World War II, Bill. When Fred Rankin, who was the chief surgical consultant in the Surgeon General's Office of the Pentagon, learned from Dr. Ochsner that I wanted to go into the service, he told Dr. Ochsner that he wanted me in his office. Initially, Dr. Ochsner did not want me to go. He wanted to declare me "essential" at the medical school, but I told him I was very uncomfortable being classified that way. I was healthy, and I felt it was my duty to go into the service. I made so much of it that Dr. Ochsner finally said, "Well, if you feel that strongly, I am going to let you go." Fred Rankin heard this, and Fred knew me too, because of my association with Dr. Ochsner. I had written papers and gone to meetings with him. (I have the longest living service in the American Surgical Association because I was elected at a very young age.) Fred called Dr. Ochsner and said, "I understand that Mike DeBakey is going into the service. I want him up here." His two associates were Nick Carter, professor of surgery at Cincinnati, who had been a resident at Hopkins before that, and I. Kirk was the surgeon general. I knew very little about military surgery or the military, so I had to learn rapidly. I would go down to the Surgeon General's Library, and I became intensively involved in the library's activities. I got to know that library very well. I was given the task of writing virtually every surgeon general's surgical order. If they had a policy on pilonidal sinus, for example, I had to write that policy.

To give you another example, about the middle of the summer of 1943, I was in the library, browsing through some old volumes of World War I, both the American and the British (I liked the British volumes better because the prose was better). There was a whole chapter on cold injuries in the military. I didn't know anything about this subject. I knew something about frostbite, but I had never heard the word *trenchfoot* until I read it there. That gave me the idea that the surgeon general did not have a policy on any of this and needed one. It was a very important disease in World War I. So I wrote a historical essay of about 10 to 12 pages, describing what it was and what had happened in the past. Then I found from the library that cold injury was very important and was probably responsible for Napoleon's defeat in Russia. There was considerable historical material. I gave my essay to Fred Rankin, and he called me in one day. He said, "Mike, I think we need to have a policy on this for the surgeon general. I'd like you to write a policy on it." On that basis, I wrote a policy of about 2 pages, indicating what should be done, what training was needed, and what kind of gear was necessary for prevention of cold injuries. The surgeon general signed off on it, but since we belonged to the Service of Supply Medical Service, SOS, we had to send anything we wrote there for approval. That was in the middle of the summer, and you know how hot Washington can get. They did not pay much attention to it, I guess, because a good part of what I wrote was dependent on military discipline, training, and equipment. In other words, medical people could not control these factors. They could recommend what should be done; they could recommend socks, boots, and that sort of thing, and how to deal with the cold weather, but they could not tell the soldiers what to do. This was up to the military command. I never thought any more about it.

In 1944, in the middle of the winter, we had a large number of cold injuries as a consequence of the Battle of the Bulge offensive. Various military news correspondents and others criticized us severely. It came out in the *Washington Post* in large letters. So I pulled my cold injuries record out and sent it to the surgeon general and to Fred Rankin, with a little note saying we had done our job, and it was not the medical people's fault. They were told what might happen if they did not follow our recommendations. The surgeon general was off the hook right away.

In addition to the experience I had in the consultant's office, several other experiences proved interesting. One was my relation with Mr. Tracy S. Voorhees in the Office of the Adjutant General in SOS, who at that time was also in charge of the classified publication that came out of the medical office of high command. The publication was called *Health*, and I became virtually its medical editor. Some of its publications were clas-

sified as top secret, because they contained such information as the size of the units that were abroad in certain areas. It was almost always classified, mostly confidential. *Health* went to all the theaters and commands and included items like the statistics on venereal disease and what we were doing about it. My relation with Mr. Voorhees became very close. When he became chairman of the Medical Task Force of the Hoover administration, he asked me to serve as a member of that task force and to work closely with him as an executive assistant, which necessitated my going to Washington to work virtually full-time for about 9 months. I had to take a leave of absence from Tulane again. Because of my duties on the Hoover Commission, I was delayed coming to Houston. I had received my appointment to Baylor in July 1948, but I did not arrive in Houston until December of that year, after I finished working on the Medical Task Force report for the Hoover Commission.

Two incidents occurred after that report, one had an effect on the nation and one had an effect on me. As a consequence of my experience in the library, I had become convinced that there was a need for a new building for the Surgeon General's Library. When it rained, they had to put tarpaulins over the books. They had a commode outside the building. The stacks were so crowded, in fact, that I wrote an article called "Chaos Among the Stacks." I started making noises about that while I was still in the service. The surgeon general said, "You know, Mike, we have been trying for 30 years to get a new building. We've put in a request every year; we just can't compete with tanks." That convinced me that the library did not belong in the Army. This was a national treasure, the greatest medical library in the world, and we were not taking proper care of it. It needed to be independent. So I wrote an article about that. It was not very well received, as you can imagine, but I kept raising the issue and recommending its separation from the army. It didn't get very far until I put it in the Hoover Commission Report. I inserted it in there with the approval of Mr. Voorhees, who was my task force chairman.

After the report was completed, Mr. Voorhees said to me, "Mike, I'd like you to go with me to meet Mr. Hoover, and to brief him on our report." Hoover was staying in an apartment at the Waldorf Astoria in New York, and we had lunch with him. He was most cordial, and I was very impressed with him. Finally, he said, "Brief me about the recommendations here." He was thumbing through it and said, "You realize how many task forces I've got?" Mr. Voorhees replied, "No, sir, I don't." He said, "Well, we've got about 50 task forces." He said, "If everybody comes in here with 30 recommendations, who do you think is going to read the report? I want you to tell me the one single most important

recommendation in here.” Before he could say anything, I said, “the library.” That became one of the most important medical recommendations in the Hoover Commission Report.

When that report came to the attention of Congress, Senator Lister Hill, who was then very powerful in the Senate and was the chairman of the Health Subcommittee, picked it up. By that time I had gotten to know him, and one day he called me. He said, “I want you to tell me a little bit about this library.” He was very interested in medicine. His father was one of the first physicians in this country to use asepsis and the first to repair a wound of the heart. He named his son Lister, and the senator was very proud of that. He became interested in the library and developed the bill for it, and I worked with him. His counterpart in the House of Representatives was John Kennedy, and I worked with both committees. Senator Hill called me one day (I was now in Houston) and said, “Mike, we have the votes to pass this bill, but your congressman down there, the Speaker of the House, Mr. Sam Rayburn, is holding it up because a quarrel developed between the congressman from Chicago and the other congressman.” The members from Chicago wanted the Library built in Chicago next to the American Medical Association (AMA). The AMA was putting pressure on him to do this. (At that time the AMA published the *Index Medicus*.) I represented those who wanted the library at the National Institutes of Health (NIH), as an independent institution, because there it would be associated with medical and research activities. There was some discussion about whether it should be in the Library of Congress, but fortunately, the head of the Library of Congress did not want it. That made it easier for us. Jim Shannon, who was then head of NIH, did not want it at the NIH. Can you imagine that? He called me and said, “Mike, I don’t see why we have to have the library here. It is not a research institution.” I responded, “Well, I think it belongs there because all the institutes need it.”

Lister called me one day and said, “I want you and Jim Shannon to meet in my office.” When we met in his office, he said, “Now Jim, there is a difference of opinion here. Tell me why you don’t want it at NIH.” Jim said he just wanted research people at NIH. Mr. Hill turned around to me and said, “Well, Mike, what do you think?” I said, “Dr. Shannon is saying it is not a research institute, but I would like to ask Dr. Shannon one thing. When you were doing research in New York and were working on the kidney—whenever you worked on a new project—what would you do first? You would go to the library to do a little research, wouldn’t you?” He said, “Of course.” I said, “Then why do you say it is not a research

institute?" Lister turned around and said, "Jim, I think he's got you." That is how it got to be at the NIH.



Fig. 4. Surgeon General Kirk presenting Dr. Michael E. DeBakey the US Army Legion of Merit Award, 1945.

Later, Senator Hill called me to say that this quarrel was still going on and that was why the approval for the library was being held up. That was in 1951, just before the National Democratic Convention, when they nominated Stevenson. Lister asked me: "Does anybody in Houston have any influence on this fellow?" I called around but could find no one who had any influence on Senator Rayburn. After he told me about the National Democratic Convention, it suddenly dawned on me that I had performed an aneurysmal resection on the husband of the secretary of the National Democratic Party, Dorothy Vredenberg. We became good friends. I called her and said, "Dorothy, I have a favor to ask of you; I think you can make a great contribution to this country." I went on to explain what this library meant to our nation, what a treasure it was, and how important it was. She said, "Well, Mike, let me see what I can do. I will call the Speaker of the House." She called Senator Rayburn, and the next day, she called me back and said, "He is going to let it through." Right after she called me, Senator Hill called me and said, "Mike, I don't know what you did, but we are going to get the library bill through." That's how we got the library.

The other important result of the Hoover Commission is related to me here in Houston. I declined the offer to come here twice before finally

accepting it. During my first visit to Houston, I learned that the medical school had no university hospital and no affiliated teaching hospital. I was told I would work at the Jefferson Davis Hospital. I said, "I can understand that, but I don't have an appointment there." It was a closed system, almost politicized. Baylor was sending its students there, and the doctors there were making rounds with them. They were all family practitioners at that time. There was not a single board-certified surgeon in Houston. I believe I was the first board-certified surgeon in the city. So I turned the offer down in a long letter detailing the problems. The second time I came down, they said they would arrange some affiliation with Hermann Hospital, but it was not secured. I told them I couldn't come on that basis. A few months later, Baylor's Dean Moursund came to New Orleans. He said he was going to talk to them about the hospital affiliation. He said, "I think we have it settled. They have promised that you will have a 20-bed surgical service at the Hermann Hospital." So on the basis of his promise, I came.

But when I came, nothing had happened. After a couple of months, I went to the dean's office and told him that I was getting restless about this. "I can't get a residency program, I can't do anything. I have no service," I said. "Unless I get a service, I am wasting my time here, and I will go back to New Orleans or accept some other offer." He said, "Let me see what I can do." He called Hermann Hospital and told them I was about to leave unless they got that service. They had a special meeting and then the chief of staff came to see me. They had just had a meeting of the surgical staff, and I was appointed chief of teaching services. I said, "What does that mean?" "Well," he said, "you are going to be in charge of teaching the students." I said, "Who is in charge of the patients on that service?" He said, "The doctors that are there." I said, "How can that work? Suppose I walk in there and say the operation that was done was wrong, or the patient shouldn't have been operated on." He replied, "That won't happen." I said, "From what I have seen around here, it will happen often." I endeared myself right away, but I didn't care; I was displeased, and I had made up my mind to leave. I went to the dean and said, "Before I leave, I would really like to talk to Baylor's chairman of the board, because I think something has to be done about this, or this school is not going anywhere. You are not going to be able to get anybody worthwhile clinically to come here if he will not have a service." He said, "I will make the appointment." He asked, "Do you want me to come with you?" And I replied, "Of course I want you to come with me."

We went to see the board chairman, and I had hardly met him before he lit into me. He had already heard from these people that I was a "revolutionary." He started using clichés, saying you have to do this by

evolution, not revolution. I let him talk for awhile. Finally I said, "Are you through?" I was angry and ready to resign. He said, "Yes." I said, "I have been patiently listening to you, without saying a word, and I want you to listen patiently to me now, because you are so ignorant about all this that you don't understand what is going on here. As a consequence, you don't even understand your own responsibilities as chairman of this board and a member of the board of trustees of Hermann Hospital. Do you realize that a student who graduates from Baylor University College of Medicine has to leave town to get any kind of specialty training, because he can't get any training here? There isn't an approved residency program in the whole city. This school is going to go nowhere; it's going to remain a third-rate medical school as long as it continues this way, and, as chairman of the board, you will be responsible for a "third-rate medical school." He turned around to the dean every once in a while. He asked the dean, "Is that right?" and the dean said yes. When I got through, his attitude was entirely different. He said, "Dr. DeBakey, I don't think it is quite fair for you to come in and tell me all this and then leave. Why don't you give me a chance to see what I can do?" I said, "I will give you 1 month, because I am wasting your time and money, and wasting my time staying here under these circumstances."

The next week I got a call on a Sunday morning from Paul Magnuson of the Veterans Administration saying, "Mike, we have just been ordered by President Truman to take over the Naval Hospital (at that time it was under the Navy). We don't have personnel to take care of it. Can you organize a faculty group and take it over?" I replied, "Of course." I along with other faculty members just moved into a new hospital, immediately got resident training approval, and the following month I went to see Mr. Ben Taub and persuaded him that the Jefferson Davis Hospital should become a Baylor-affiliated hospital (now called Ben Taub Hospital) over the objection of the whole staff. I was not a very popular man.

Truman had issued the order because of the Hoover Commission Medical Task Force Report. In that report I had spotlighted certain glaring federal deficiencies and examples of wastefulness. I unearthed a memorandum signed by President Roosevelt stating that at the end of the war the Navy Hospital in Houston would be turned over to the VA. It was already 1949 or 1950, and the Navy Hospital still had not been turned over. The Navy wanted to retain the hospital even though they had no active Navy personnel as patients; they were all veterans. The Veterans Administration was going to build another hospital, right next door for \$35 million (a huge sum at the time!), and I stated that it was a complete waste of money. When my comments came out in a front page story, Truman ordered the Navy to turn its hospital over to the VA, and that is why I stayed in Houston.

WCR: *How did Baylor University College of Medicine get connected to The Methodist Hospital?*

MED: Methodist Hospital, which was about midway downtown, came about later. It was a ram-shackled building, mostly made of wood, and they had added to it. They had about 100 beds altogether, but it was a very warm place, and they had a very nice woman administrator, who was very kind to me. They took an interest in their patients. I was admitting my private patients to both Hermann and Methodist Hospitals. I liked the Methodist Hospital, even though it was not as nice a building as Hermann. I got to know the Methodist people well. In 1953 they decided to move into the medical center. Methodist was the first hospital to be built in what later became the Texas Medical Center. By that time, I had a good private service because of my vascular work. In 1952, I had received media attention because I did the first successful aortic aneurysm resection in this country. No one else was performing this operation, so physicians were referring their patients to me. By the time they built the new Methodist Hospital, a private institution, I had already gotten to know the people, the administration, and some of the board of trustees—Mrs. Ella Fondren and others. So I was beginning to have some influence. The staff remained pretty much intact, but I was accepted by the staff; they had no resentment toward me. Also, the physicians began to like the fact that I was bringing some attention to the hospital, and so did the administration and some of the board members, like Mrs. Fondren and Mr. Eddy Scurlock.

As my service began to increase, I was using more and more beds; at one time I had a service of about 100 beds. I brought medical students and residents to the new Methodist Hospital, and they liked it much better than the old Jefferson Davis Hospital. I told Dean Olsen, “We ought to have an affiliation with The Methodist Hospital.” This idea was not very popular with some of the other faculty members who preferred to work at Hermann Hospital. The students and residents expressed increasing interest and enthusiasm for their work at the Methodist Hospital, and Dean Olsen finally approved a formal affiliation with Methodist.

WCR: *Is it because your practice was expanding at that time that the pressure was too much for them to bear?*

MED: Yes. I requested an intensive care unit, which did not exist in those days. This idea came out of my military experience, which really arose out of necessity because of the shortage of personnel. I explained to them that I had to have an intensive care unit where my very sick patients could be cared for. Since the private nurses didn’t know very much about the care of such patients, I wanted to train some nurses to take care of them. The staff and the nursing supervisor did not like the idea, but Mr.

Ted Bowen, who by that time had become chief administrator of Methodist, said to me, “Mike, let me do this. I will make a four-bed unit for you.” I told him this would not be enough; I needed about six beds. Finally, he did get six beds on the second floor of the old building for the intensive care unit. The hospital hired the nurses. In those days nurses weren’t hired for such duty; they served as private nurses for private patients. I started giving them a little training, and I asked our colleagues in cardiology to give them some training in electrocardiography and other monitoring procedures. These nurses became pretty efficient at caring for these very sick patients. Within less than 6 months, Mr. Bowen said, “You know, Mike, some of the other surgeons want to use your intensive care unit for their patients.” I said, “Fine, let’s get some more beds in there, but don’t use my beds. I am having a hard time as it is. By Friday, I can’t operate because all the beds are filled.” So they expanded the unit. Of course, as time went on, all the doctors wanted to use intensive care. Not a single one later would admit that he objected to it initially.

WCR: *In 1948, at age 40, you must have been the hottest young surgeon in the country. You had had all that experience in World War II, your name was out there a lot, you had written all those papers in the late 1930s with Dr. Ochsner. You must have had options, as you mentioned earlier, to be chairman of surgery in a lot of different places?*

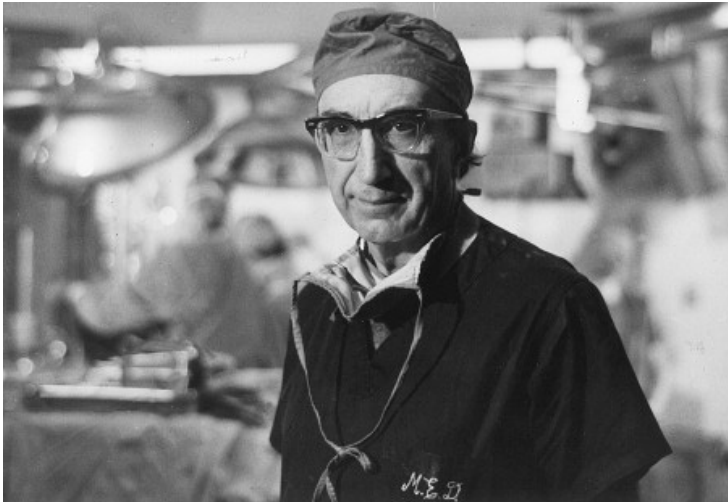


Fig. 5. Recent photograph in front of the Methodist Hospital cardiovascular operating room.