

21. MECCA

TWO MONTHS AFTER CHOOSING TO BEGIN MY CAREER at Bell Labs, I was driving toward my first day of work. Despite the gravity of my career decision, I wasn't exactly thinking about my new job. The morning of August 9, 1976, cruising along Crawford's Corner Road in Holmdel, New Jersey, I was thinking about a photo I had seen in a Bell Labs recruiting brochure. The photo showed a trim young Asian woman playing tennis on a pristine court in a grassy field.

The caption identified the woman as Leesing Pang, a Bell Labs MTS: "Member of Technical Staff." Ms. Pang's short tennis skirt revealed taut and athletic legs, and her right arm was stretched in perfect form—wrist back, slight bend at the elbow—as she struck the tennis ball. Despite her obvious physical exertion, Ms. Pang's expression was calm and confident, and her delicate features sparkled with the joy of friendly competition. The photo was meant to capture the reader's imagination and to offer a glimpse into the nature of a Bell Labs MTS. The subliminal message was: Bell Labs people are attractive, intelligent, fit, hardworking, cosmopolitan, and international—the best of the best.

I had long been in awe of Bell Labs because of its unique place in the history of technology. The Bell Labs mission was noble and inspiring: to discover new facts about the physical world; to blaze new trails in fields such as mathematics and physics and chemistry; to devise new ways for people to communicate. I couldn't imagine a better place to

begin a career as an electrical engineer.

As I approached my destination, the Bell Labs water tower came into view. The massive white structure, a local landmark, was constructed in the shape of Bell Labs' seminal invention—the transistor. The tower communicated several messages to the technically astute Bell Labs community. It commemorated the genius of Bell Labs people. It represented practical innovation, because Bell Labs planners turned what could have been a dreary water tower into an interesting architectural feature. It signaled the confident and fun-loving nature of Bell Labs people. I chuckled as I passed the tower and veered onto the Bell Labs property, knowing I was about to join a very special company.

Lush sugar maples lined the entrance drive and formed a partition between the road and the many acres of manicured lawn on either side. The gleaming Bell Labs structure was directly in front of me. An enormous rectangular prism, the building was only six stories high but very long, as if a minimalist skyscraper had been laid on its side. Bathed in morning sun, its glass skin reflected the surrounding bucolic landscape. Geysers erupted from a large pond in front of the building. The view was breathtaking and otherworldly, as if a gigantic alien spacecraft had settled amid a rolling cow pasture.

I parked in the shrubbery-enclosed visitor parking lot between the pond and the building, and walked up elegant slate steps to the entrance. I told the guard at the door I was reporting for my first day of work, and he pointed me straight ahead toward the reception area.

I paused for a moment to gather the scene. I had been at Bell Labs only once, during the interview visit, and the place still amazed me. The renowned architect Eero Saarinen, designer of the Saint Louis arch, had designed the Bell Labs Holmdel building. The outer shell was subdivided into four inner buildings, each situated in one quadrant of the outer structure. The space between the inner buildings formed a huge cross-shaped atrium, and catwalks lined the interior perimeter.

I looked up to my right and left at the futuristic catwalks, with their steel and glass balustrades, that ran along each level of the building. The reception area was directly in front of me. It was sunken and

seemed carved into the stone floor, and was covered in modern industrial-grade carpet. Long bench seats covered with thick red leather cushions were carved into the perimeter of the reception area. A large stone desk rose from the center of the space. Beyond the reception area, I saw the massive center atrium surrounded by still more catwalks. The scene could have been from a science-fiction movie, but it wasn't. It was a scene from my new life.

A small sign near the front of the reception desk carried the Bell Labs logo and the name "Ann Walling." A middle-aged woman looked up as I approached, and in a pleasant Scottish accent she said, "Good morning, young man. You have the look of a new employee." Her friendly manner put me at ease. Ms. Walling signed me in and presented an ID badge, and a few minutes later I was seated in the personnel department being processed onto the payroll.

The induction process was more interesting than I had expected. Orientation stressed the many benefits of working at Bell Labs. These included not only full medical coverage and generous pension and savings plans, but also a few benefits that seemed especially unusual and generous. I learned about the Bell Labs Club, a collection of many company-sponsored employee activities including basketball, soccer, travel, gardening, and even model railroading. I also learned that Bell Labs offered in-house courses in numerous technical subjects, usually taught by the company's own experts during work hours. Then there was the Doctoral Support Program, in which Bell Labs paid qualifying employees to obtain a PhD, with time off for the required classroom work. The orientation session left me even more enthusiastic. I was eager to get to my job and find out what life at Bell Labs was really like.

A secretary escorted me to John Colton's office. My new supervisor was seated behind his desk poring over a memo. He saw me and said, "David! You're finally here!" He jumped up and walked around his desk to shake my hand, and then offered me a seat. He seemed genuinely happy to see me.

Colton's office was small and not at all fancy. The flooring was the gray tile that was everywhere in the building. The furniture included the standard-issue metal desk and spring-loaded executive chair. A

couple of guest chairs sat next to the desk, and a five-foot table stacked high with monographs, memos, and drawings sat behind it. Colton's office told me he was a workhorse, not a show horse.

"How was the trip out from Michigan?" Colton asked.

"Oh, it was fine," I said. "I really enjoyed the drive."

"So, where are you staying?" Colton continued.

"Well, that's another story," I said. "Personnel put me up at the Molly Pitcher Inn in Red Bank. It's not bad, but it's not exactly the Hyatt."

Colton laughed. "Oh, yeah, the good-ol' Molly," he said. "Well, in a couple of weeks you'll be in your own place and the Molly will just be a bad memory."

I was surprised at how easy it was to talk to Colton, and how readily he identified with my situation. In just two minutes he seemed more colleague than boss. Most important, he didn't seem at all uncomfortable having a black engineer in his group.

"Before we get down to business, I've got to tell you about basketball," Colton said with a sly smile. "When you were here for your interview, you told me you were a good player, so now it's time to show what you've got. We play basketball every night after work at the Holmdel Village School. Some of the guys from our league team, the Knicks, will be there. If you're really a good player, the other teams are going to try to recruit you. You don't have to play for the Knicks, but just remember who signs your paycheck!" Colton laughed to make it clear he was joking.

"I'm definitely ready to play some ball," I said. "I look forward to getting some exercise, too. Anything is better than sitting around at the Molly. I'll bring my stuff with me tomorrow."

After that icebreaker, Colton got down to business. He said my assignment was to design new equipment for Remote Test System 5 (RTS-5). He started describing how my assignment fit with the organization's other projects, and the acronyms came flying out of his mouth faster than I could write them down: PC-1A, SMAS, DACS, CMS-3, and so on. Seeing the confused look on my face, Colton stopped abruptly and said, "Don't worry, we'll go over all of this again later." Then he changed the subject.

“How’s the music synthesizer project coming along?” he asked.

I was pleasantly surprised that Colton remembered. I was also glad to switch to a technical subject I was familiar with.

“It’s going pretty well,” I said. “I just have to tie up some loose ends, and then get some musicians to try it out.”

“Well, the synthesizer technology you described when you interviewed here is very similar to what we’ll need on RTS-5,” Colton said. “That’s why I wanted you in my group. Most new hires don’t have the experience you have. I think we can learn a lot from you, and I think you’ll learn things on this project that will help you with your synthesizer.”

I suspected Colton was just blowing smoke when he talked about learning a lot from me. It made me feel important, though, and it was flattering to think the folks at the venerable Bell Labs *could* learn something from me.

“Well, I’m excited about the project,” I said. “And I’m anxious to get started.”

Colton’s look grew more serious. “This is a great project, Dave, and the organization is growing fast. I know you’re an ambitious guy. I think you’re going to do well, and I think you’ll move up fast.”

That was exactly what I wanted to hear.

Colton went on to deal with some “housekeeping” issues. “I’m sure they told you in personnel that starting time is eight thirty. I don’t worry too much about what time my guys get here—just try not to get in too far past nine o’clock. I know you’re going to have a lot of things to take care of as you get settled, so if you have to leave during the day, just let me know. You can always make up the time later. And I’m sure they told you in personnel we don’t have sick days here. If you’re sick and need to take a day off, just call the department secretary and let her know.”

My mind flashed back to when I was a GMI co-op student working at AC Spark Plug. Each morning a horn signaled the start of the workday. The horn sounded again at lunchtime and again at quitting time. Bell Labs seemed much less regimented than that, much more relaxed.

Colton glanced at his watch and said, “Oh, it’s lunchtime! Lunch

is on us today.”

He got up and walked into the hallway, and I followed closely.

“We’re having lunch with Ed Spack and Bob Yeager today, but first I want to introduce you to some of the other guys in the group.”

Colton and I walked along the corridor, stopping at several different offices. At each stop, Colton said, “Hey guys, I want you to meet Dave Tarver. He just joined the group today.” Almost every person in Colton’s group seemed to be from a different race or ethnic group. I was surprised and relieved to see another black group member—a fellow from Jamaica. I had never encountered such a diverse group at any place I had ever worked or interviewed.

Colton and I then joined the department head, Ed Spack, and the director, Bob Yeager, for lunch in an executive dining room. Ed and Bob were much older than John, and much less engaging. The food was excellent, and the atmosphere pleasant, but I felt almost no connection to the older execs. After a few minutes of small talk, they resorted to quizzing John about the status of the group’s projects, and I just listened and ate. I realized that, for Ed and Bob, the meal was merely a perfunctory aspect of the new employee induction process.

After lunch, Colton and I parted company with Ed and Bob, and John escorted me to my new two-person office. It was a little bigger than his, and a doorway in the rear wall led to another office. One of the two desks was occupied by a fellow whose head was buried in a technical drawing. He swiveled in his chair and faced us. Colton said, “George, this is your new office mate, Dave Tarver. Dave, this is George Callahan.”

George jumped up and snapped to attention, military style. He was of medium height and build. Despite his graying and thinning hair he was trim and energetic. George gripped my hand firmly and said, “Yes, sir, nice to meet you.”

“Nice to meet you, George,” I said.

“George is an old-timer here,” Colton said. “He’ll show you the ropes and help you get whatever you need to get started. I’ll let you get settled. Feel free to wander around.”

Colton left, and George and I spent a few minutes getting acquainted. He seemed quite curious about my background, and want-

ed to know where I had gone to school, what degree I had obtained, and what my Bell Labs job title was. I told George I was an MTS, and that as far as I knew I would be designing modules for RTS-5. I was surprised to learn that George wasn't an MTS—he was an STA (senior technical associate), a few steps down the pecking order. George's role was to provide technical support to the group. He had spent a career in the navy before joining the Bell System at Western Electric, then working his way up to Bell Labs. He seemed proud of his accomplishments and pleased with his position.

While George and I talked, an even older white man and a middle-aged white woman entered the office. Again, George spun his chair toward the doorway, and said, "Ron, Ruth—this is Dave. He's a new MTS in Colton's group. He just started today." George's tone was cheery, as if he was happy to have a new office mate.

Ron and Ruth issued a curt hello, then hustled to the back office and closed the door. I didn't know what to make of their ungracious response.

George must have seen the puzzled look on my face. He said, "Ron and Ruth don't work for Colton. They're in Gilmore's group."

I was relieved. I didn't know anything about "Gilmore's group," but was glad I wasn't in it.

George abruptly changed the subject. "If you're going to work here, you're going to need some supplies. Let's take a trip down to the stockroom."

I jumped at the opportunity to get out of the office and find out more about Bell Labs. "Okay, let's go," I said.

The stockroom, on the lower level of the building, resembled an electronics and office supply store. George said, "You can get whatever you need here—binders, lab notebooks, pencils, pens, calculators. You can also get electronic parts like resistors and transistors and integrated circuits. Just pick out what you want and sign it out over there. If you don't see what you're looking for, they probably have it behind the counter."

I was incredulous. "You mean I can get anything—I just have to sign for it?"

"That's right," George replied. "Pretty neat, huh?"

I shopped around for a while before settling on some basic items: three-ring binders and paper, lab notebooks, pens and pencils. I figured I'd come back for electronic equipment and parts after I learned more about my assignment.

"George eyed my new blue Bell Labs binders and said, "You know, Dave, practically every kid in Holmdel is going to school with three-ring binders from the Bell Labs stockroom. And a lot of guys come down here to get supplies for their government projects."

"I don't understand," I said. "Government projects?"

"Yeah, you know—personal projects. Things they're building at home like a burglar alarm or a fancy stereo system. We call that kind of stuff government projects. If you're taking parts home for a personal project, and someone asks you about it, just say, 'It's for the government' and they'll leave you alone."

George chuckled. I could tell he was happy to relate some inside information I was unaware of. I chuckled too, uneasily. I intended to keep working on my music synthesizer project at home, but I had no intention of using Bell Labs parts, no matter how accepted the practice was. For a moment I imagined myself jailed for stealing parts from the stockroom. I imagined folks saying, "See, we hired this black guy and look what happened!"

After the trip to the stockroom, I decided to take John Colton's advice and wander the halls. I wanted to reintroduce myself to the group members I'd met on the way to lunch and find out more about them.

The first colleagues I stopped to see were Jose Garcia and Steve Sato. Jose and Steve looked a few years older than I. Jose was a lanky white guy, and wore a full beard. Steve was Asian, and was short and trim. Jose was the more outgoing one. When I asked where he was from, he said his family had emigrated from Cuba after being dispossessed by Castro. His tone and demeanor assured me he was no fan of the dictator. Steve Sato said he'd grown up in Hawaii and that his folks had emigrated there from Japan.

Next I stopped in to see Tony Genovese and Mike Tom. Tony and his family had emigrated from Italy, and he was by far the best-dressed guy in the group. His nicely pressed dress slacks, silk shirt, and

designer loafers contrasted markedly with the khakis and cotton shirts worn by other group members. After we talked for a while, Tony said, "When you get settled, you have to come over for dinner with me and my wife Gianna." I was pleasantly surprised by the invitation, and told Tony I would definitely take him up on it.

Mike Tom was from Taiwan. I noticed that the nameplate on his desk said "M.K.K. Tom." I asked what the K.K. stood for, and he said they were the initials of his Chinese name, Kin Kui. I asked him why he didn't use his Chinese name, and he said "Mike" was easier for people to pronounce.

Next I looked in on Lloyd Ottesen. Lloyd was a white Brooklyn native, probably the oldest engineer in the group. At first he seemed wary of my presence, but after we'd talked for a few minutes he seemed to relax. Lloyd was working on RTS-5—the same project I was assigned to. He told me to come by if I ever needed information on the system or help with my designs.

The last stop on my get-acquainted tour was the lab, where I had earlier met the Jamaican, Earl Brown. Earl's desk sat in a corner, surrounded by impressive-looking electronic test instruments. I was eager to find out how Earl liked working in Colton's group.

When Earl saw me enter the lab he said, "So you're the new Mr. MTS, eh?"

"I guess so," I said. I was trying to sound nonchalant about the "Mr. MTS" title he bestowed on me.

"What project are you working on, Earl?"

"I'm a TA, mon," Earl said. "I do anything they tell me to do."

TA was short for technical associate, one step down from George Callahan's STA designation. Earl's job was to support the group by building and maintaining prototype equipment.

I lowered my voice and looked Earl in the eye. "So how do you like working here, man?"

Earl said, "This a nice place, mon. You need something, mon, you just order it. No problem! How you like this computer, mon?" He gestured toward the gleaming IMSAI 8080 microcomputer system next to his desk. "It's one of the first ones they make!" Earl was beaming.

I probed further. “So what is it with this group? Are all of the groups like Colton’s, with such a mix of people?”

Earl chuckled. “No, mon. Dere ain’t no other groups round here like Colton’s. I dunno—maybe he try to make a name for himself. But he seem like a okay guy, mon. He treat me right, too.”

I reflected on what Earl Brown said. Maybe Colton’s group *was* unique, but that didn’t have to be a bad thing. Maybe I got lucky and got a really progressive boss. Maybe Colton’s group was an oasis of diversity in the Bell Labs desert. Whatever the case, I felt more comfortable after talking to Earl and my other colleagues.

Earl started packing his things. I looked up at the clock and realized it was time to go home. My first day at Bell Labs was already over. I went back to my office, packed up my own things, and prepared to return to the Molly Pitcher. I retrieved my car from the visitor’s lot, but before driving back to Red Bank I drove slowly around the road that encircled the Holmdel building. It was my way of celebrating the fact that I had “arrived.”

The next morning I awoke early. I didn’t want to be late for my first full day of work. I made sure to pack my basketball clothes so I could join Colton at the after-work games. I arrived well before starting time, and pulled into one of the two vast employee parking lots. I was glad I had arrived early.



BELL LABS HOLMDEL, FROM ABOVE.

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The spots nearest the building were already taken, so I had to park near the middle of the lot. Parking on the outer fringe would have made the walk to my office take almost as long as the drive to work.

George Callahan was already hard at work. We exchanged greet-

ings, and I started poring over the project materials Colton had given me. I wondered if I would be able to meet his high expectations. I wondered if the group's pace was as relaxed as it seemed, or if I would soon find myself behind the eight ball.

I barely noticed when George left to do some work in the lab. I sat alone, alternately reading and daydreaming and fretting. A female voice broke my solitude:

"Hello."

The word was sung more than spoken. I looked up and saw two young black women in my doorway. One was light-skinned and had a large afro. The other was darker and wore neatly pressed hair. I hadn't seen either of them before.

The young lady with the afro spoke up first:

"So you're the new MTS everybody is talking about."

She spoke with a charmingly soft Southern accent. I didn't know how to respond. I looked at my guests and flashed a nervous smile.

She spoke up again.

"Dot wanted to meet you, but she was too shy to come up here by herself."

"Uh... I see."

Then the other young lady spoke up. Dot had a Southern accent too, but her tone was more formal, less flirtatious.

"Don't pay any attention to my friend. She wanted to meet you just as much as I did. My name is Dot Stokes, and my so-called friend here is Nettie Colquitt."

"Nice to meet you both," I said. "Come on in. Where do you guys work?"

Dot and Nettie came in and stood next to my desk.

"I work in PBX systems engineering," Dot said. "I'm in Building Two on the second floor."

"And I'm in the Operations Research Department," Nettie said. "I'm in Building One on the fifth floor."

I was flattered that two attractive young professional women would seek me out.

"How did you find out about me?" I asked.

Nettie smiled and said, "Oooh—everybody knows about you, Mr.

Tarver. It's not very often a new black MTS starts here. The news travels fast. So... are you single?"

"Yes, I am." My answer was more emphatic than I'd intended.

"Ooh-wee," Nettie said. Every floozy in this building gon' be after you, including this one here!" Nettie gestured toward Dot, and Dot gave a look of mock exasperation.

For a moment, I felt as if we were in grade school, flirting on the playground.

"Like I said, don't pay any attention to Nettie. She's a little touched, if you know what I mean."

Dot and Nettie giggled. I tried to suppress it, but I broke out in an ear-to-ear grin. There was something endearing and innocent about these two Southern belles. Both were attractive and apparently technically minded, but they were also down-to-earth and silly. I felt as if I knew them already, and took an immediate liking to them.

"So, Mr. Tarver," Nettie said. "Whatcha doin' for lunch?"

"Nothing that I know of."

"Well, why don't you come down to lunch with me an' Dot? We can introduce you to some of the folks."

"That sounds fine."

Just then, George Callahan returned with a set of drawings and sat at his desk. I could tell he was suppressing a grin.

"George, I'd like you to meet Dot and Nettie."

George gave my guests a friendly glance and said, "Hello, ladies." Then he stuck his head into the drawings.

I agreed to meet Dot and Nettie in the atrium at lunchtime, and they left, talking and giggling as they sauntered down the hallway.

George looked up and smiled. "I see you're a popular guy around here already," he said.

I found myself feeling eager for lunchtime. I looked forward to talking with Dot and Nettie again and finding out more about life at Bell Labs. At 11:45, I met them in the atrium and they escorted me to lunch.

The cafeteria and a much smaller, more intimate area called the Grill Room were both located on the lower level. I assumed we would eat in the cafeteria, but Dot and Nettie steered me into the Grill Room.

“Most of the ‘folks’ get together in here,” Nettie explained.

The Grill Room served made-to-order burgers and sandwiches of all kinds. As we waited in line, I saw one of the cooks carving slices from a long, reddish piece of meat.

“What’s that?” I asked Nettie.

“Ummm, cow tongue,” Nettie said. She stuck her tongue out and wagged it mischievously for emphasis. I retracted my tongue deep into my tightly closed mouth, as if to protect it from the carver.

We got our food and ventured over to a group of tables pushed together in one corner of the room, where ten or fifteen other black employees were seated. Dot introduced me.

“Hey, everybody. I want you to meet David Tarver. He just started as an MTS here yesterday.”

The folks at the surrounding tables smiled and welcomed me. We sat down to eat, and before long the people nearest to our table began peppering me with questions:

“What organization do you work for?”

“What school did you go to?”

“Are you married?”

Nettie flashed a knowing smile at that last question, as if to say, *I told you those floozies were gon’ be after you!*

After conversing with my new black colleagues for a while, I realized they held a variety of job titles. Bob had a PhD in mathematics, and his job involved something called queuing theory. John was an electrical engineer like me, and was designing electronic switching systems. Peggy was an administrative assistant. Willie was a janitor. Skip was a graphic design technician. It didn’t take long for me to see that the primary forces binding the group were cultural rather than professional. The common bonds seemed to be race, youth, and relatively short tenure at Bell Labs.

At one point, Nettie offered an explanation: “Bell Labs just started hiring black folks a few years ago, after the Asbury Park riots.”

I thought about what Nettie had said. Changes in law, the civil rights movement, and the social unrest of the 1960s created the impetus for large corporations to hire black executives in significant numbers. Bell Labs was at the forefront of that movement, and my black

coworkers and I were products of it. We were the first wave of blacks at Bell Labs, and similar waves were washing over corporations all across America.

I wanted to know how my work situation compared with that of my black peers. I described the mix of people in Colton's group, and asked them what their groups were like. Most said they were the only person of color in their group. A few indicated that their group included one or two Asians. It appeared that Earl Brown was right—Colton's group was unusually diverse.

Even though there were maybe twenty blacks in the Grill Room that day, and perhaps a hundred in the building, we were a mere drop in the bucket. Bell Labs Holmdel employed more than 5,000 people. My black colleagues and I were sprinkled throughout the place like fleas on a very large dog. I understood immediately that getting together in the Grill Room was a way for the black employees to avoid isolation, compare notes, and get moral support and encouragement. Even though we were spread throughout the organization, it was great to have access to so many other talented black professionals. I had never experienced anything like that.

After lunch, Dot and Nettie and I walked back toward our offices. I was glad they had connected me with the other black employees—they made Bell Labs feel much more comfortable and familiar. My new friends and I parted ways at the elevators. I returned to my office reinvigorated and ready to tackle my job.

I spent the rest of the afternoon talking to Lloyd Ottesen about RTS-5. He told me about the work that remained, and showed me where my project fit in. Things were starting to come together, and my confidence, which had waned that morning, began to return.

Shortly after 5:00 p.m., John Colton stuck his head in my office. "So, Tarver, are you going to play basketball today or what?"

"Sure," I said. "I'll meet you over at the school."

I gathered my things and left the building. It was a gorgeous summer afternoon. As I descended the steps, three separate young women stopped me and introduced themselves. I was an unmarried black MTS at Bell Labs. I felt like a celebrity.

I arrived at the Holmdel Village School just as my coworkers were

choosing teams. Colton invited me to play with his team, and the games got under way. As the evening progressed, I got to know some of the other players. They were mathematicians, engineers, psychologists, technicians, administrative assistants, drivers, porters, and janitors. The group included people of every education level, from high-school grads to PhDs. Most were white, but there were a significant number of blacks and a few Asians and Latinos.

Between games, in a moment of quiet reflection, my thoughts again drifted to the Bell Labs recruiting brochure and Leesing Pang: *Attractive, intelligent, fit, fun-loving, hard-working, cosmopolitan, and international—the best of the best*. It was only my second day on the job, and already I was working and playing with some of the world's best and brightest engineers and scientists.

I couldn't imagine a better place to work.

I couldn't imagine a better place to *be*.