Interviews of the Margaret MacVicar Memorial AMITA Oral History Project, MC 356
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Mary Cretella – class of 1949

Interviewed by Emma Bernstein, class of 2020

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MIT Libraries

Margaret MacVicar Memorial AMITA Oral History Project

Mary Cretella (SB Chemistry 1949) was interviewed on September 14, 2019 by Emma Bernstein (SB Computer Science and Molecular Biology 2020), at the Peppers Grille restaurant in Bedford, Massachusetts.

At MIT, Cretella was one of five female undergraduates and one of two to complete a bachelor's degree in chemistry. Upon graduation, Cretella was interviewed for secretarial positions but was quickly discovered to be a valuable chemist by Ionics Inc., where she worked for seven years. Cretalla then spent 22 years at the MIT Lincoln Laboratory researching crystal growth and, with a colleague, sowed the seeds of what would become MIT's Materials Science Department. She then spent 20 years applying her expertise in crystal growth to solar energy innovation—the first 10 years with Mobile Solar and the second 10 years with Cabot Corporation. At Cabot, she led a group researching gallium arsenide crystal growth. Later, looking for more people-oriented roles, Cretella worked as a paralegal, consulted with Evergreen Solar and educated prospective homeowners about reverse mortgages. In her retirement, Cretella enjoys gardening, sewing and keeping up with innovations in solar panel technology.

BERNSTEIN: To start our conversation, could I ask you to describe how you grew up, with a view to how you found yourself at MIT? For example, what got you interested in science?

CRETELLA: When I was growing up, I had pretty good experiences in high school. I liked all my science courses and I ended up being valedictorian. At that time, MIT took people who were in the upper fifth of their class without any further entrance requirements, so I didn't have to take college boards or things like that.

When I applied, they accepted me and that was that, except for the fact that my dad had a little bit of misgiving about having me go to what was thought of as a boys' school. He came with me for an interview, saw all the women that worked as secretaries on campus and he figured that I would be OK: there were enough women.

BERNSTEIN: Did you know about MIT and just want to go there? Who told you about it in the first place?

CRETELLA: Well, we knew about it. We had some background about different colleges that were within the sphere of our interests. Also, I did like chemistry and I really thought I would like to be a chemical engineer. But when I started at MIT, they discouraged me from that—chemical engineering, specifically. They suggested

that I go into chemistry [instead]. I wanted to do field work, and they said the opportunities in the field were very limited, that I'd be better off in chemistry.

BERNSTEIN: What was your first exposure to chemistry? What attracted you to it?

CRETELLA: My first exposure was my brither's chemistry set that he received on Christmas. We had fun with that. I think it was the fact that you could make things happen. Even the simple things, like gas-based reactions-- Stuff like that was pretty interesting—to realize that you can manipulate and cause different results to occur.

BERNSTEIN: I see.

You mentioned to me that you're from the Boston area.

CRETELLA: I'm from Lawrence [Massachusetts], initially.

BERNSTEIN: Was it very common for people there to go to schools like MIT? What was your neighborhood like?

CRETELLA: In my high school, they divided people into different courses, like College Prep, Secretarial, Home Ec, Manual Arts. I was in the college group. In that group, it was not surprising that several of us went on to college. It was sort of expected that if you were smart enough, you would. In fact, the young man who was salutatorian in my year ended up getting a Nobel Prize in organic chemistry. That was Elias Corey [BS Chemistry 1948, PhD 1951]. He was at Harvard. My neighborhood was in the Italian area. Lawrence had many ethnic neighborhoods: French, Polish, Irish , Armenian, etc. Rather like ghettos.

BERNSTEIN: It must have been an interesting place back then.

CRETELLA: Yes. It was very interesting.

BERNSTEIN: Were there lots of women in your college prep course in Lawrence?

CRETELLA: Yes, it was pretty even.

BERNSTEIN: Oh, great. Did you have any mentors or teachers during that time who encouraged you to go on in science, or was it more like, "I'm really interested in this and this is what I want to do"?

CRETELLA: Well, it's both. I remember the chemistry teacher I had who loved to do outlandish things. He'd bring in rattlesnake meat for us to taste and do odd things like that, so it seemed like a fun area. My dad was a plumber, so the engineering aspects also appealed to me. That's why I thought chemical engineering would be a good fit for me.

BERNSTEIN: You mentioned that your father was a little worried that maybe there wouldn't be enough women at MIT--

CRETELLA: Well, you know, the understanding that MIT was primarily a man's school gave him a little bit of pause. As I said earlier, when I look back, I really was pretty sheltered, and he had his misgivings. But once he saw all the women secretaries and admins, he thought, “Wow, this is fine.”

BERNSTEIN: Was MIT having mostly male students something that worried you at all?

CRETELLA: No, not at first, but I didn't quite expect there to be so few women. And I also didn't expect the class to be so mature age-wise, looking back on it. The average age in the class was about 30. It was full of returning [World War II] veterans who were going on to continue their schooling, so there were some pretty old guys, relatively speaking, in those classes.

My first experience in chemistry class was when-- There were two of us [women students] that had chemistry as a major. We walked into the classroom and the TA said, “Gentlemen, I have to apologize, we have two women in this class.” Because I was very young, very immature—and so was my friend—we just went to the back of the room and tried to be invisible. We felt very much intimidated.

BERNSTEIN: Did that kind of thing happen often to you while you were at MIT?

CRETELLA: It happened a little bit. Not often so overtly; more subtly.

When it came time to be looking for a job when I graduated, the advisor for chemistry students was really put out that he had to try to place a woman. He finally sent me on an interview for a secretary job: someone who would do secretarial work and also do some chemistry. I was very fortunate, because when I interviewed, I admitted that I had no idea secretarial matters I didn't take shorthand. But the man who interviewed me was very thorough in the interview and decided that they would like to have me on their staff, so they hired me even though I couldn't do secretarial work.

BERNSTEIN: That's great.

CRETELLA: Yes, so I was very fortunate that way as well. But it was interesting because another interview I went on was for a textile-type job, the man who interviewed me said that he would give me a $5 a week differential because since I had been at MIT, I could also tutor the other employees. That was kind of interesting to me. That's the only real indication that I had that MIT carried some weight, even for a woman.

BERNSTEIN: Five dollars a week?

CRETELLA: Right. My first monthly salary was $400 a month.

BERNSTEIN: Wow.

You mentioned the incident with the teaching assistant. I was wondering if there was anything like that with MIT faculty or with the other students. Did you feel like you could interact with the other male students? Did you feel like you could interact with the faculty?

CRETELLA: I think that, given the naivete that I had, I interacted as much as I was able to. But when I look back on it, it was probably my own shortcomings to some extent as much as external things. Certainly among the professors, there was just no sense of discrimination.

BERNSTEIN: That's good.

CRETELLA: Some students, you know, just kind of tolerated having women in the class. They didn't care.

BERNSTEIN: Were there any professors who kind of took special notice that you were a woman?

CRETELLA: No, not particularly.

BERNSTEIN: You mentioned there was one other woman in chemistry. How many women were there overall?

CRETELLA: Four undergraduates. One was in aeronautical engineering; she's passed away. And the other one, I don't remember what her major was. It was something different. And then there was one other, but she ended up-- Sorry, there were five of us. She got pregnant towards the end of her senior year, so she took time off and graduated a year later.

BERNSTEIN: Were you all very close?

CRETELLA: Not all of us. Since I was a commuter, I didn't interact with them very much outside of school. I was close to the one who got pregnant, and the one who was in chemistry with me. (She actually became a nun.) In all, my interactions were limited by my commuting schedule.

BERNSTEIN: Oh, wow. That's surprising.

CRETELLA: I know.

BERNSTEIN: That's quite the twist.

What was it like commuting to MIT from Lawrence?

CRETELLA: Looking back, I have a different perspective, of course, but at the time, it was what I had to do, so that was what I did. Looking back, I realize that I missed out on some things that would have been very helpful. Interaction with other students, study groups, things like that. I was sort of set apart. And again, that was not the school's fault; that was me and my environment and my own attitude.

BERNSTEIN: Do you know where the other girls lived? Was there a place for them on campus?

CRETELLA: Yes. That was just before McCormick [McCormick Hall, the all-women's dorm that enabled more women to matriculate at the Institute than had previously been the case] was established. Barbara and Betty lived at home, but they lived in the Boston area. They were both very much involved with being around school more than I was. I had to catch a train and that was that. I didn't have other travel options.

BERNSTEIN: That makes sense. When you were an upperclassman and younger women would come in, did you have much of a relationship with them?

CRETELLA: Yes, because, you know, at that time, there was the Margaret Cheney Room. And then for a while, I was president of that group. I built a sort of relationship among the members in the group.

BERNSTEIN: That's good!

CRETELLA: Right.

BERNSTEIN: Could you tell me a little bit about what kind of space the Cheney Room was for you and the others? Did you find mentors there, that kind of thing?

CRETELLA: A little bit. Not a lot, because again, you know, when you're in chemistry, you have a lot of labs, so you don't have an awful lot of free time during the day. And as I said, you know, I had to catch a train to get home. So my interaction was not a lot because I just didn't have that time. My last year, I lived away from home, so that was better.

BERNSTEIN: Did you feel your high school had prepared you for the academic environment at MIT?

CRETELLA: Academically, yes. Emotionally, no. Not a bit.

BERNSTEIN: Could you say more about what you mean by that?

CRETELLA: Well, as I said, I was young. Even for my age, I was young. And the class on the whole was a lot more mature and a lot more competitive than I had been used

to. There was a larger sense of intimidation. And, you know, I didn't speak up very much. I stayed "safe" in the background.

BERNSTEIN: Can you say a little more about the people who had returned from the war?

CRETELLA: It was just after the war. They put up married housing because there were so many returning vets who were married. They were focused on their goals and, for the most part, had their own social activities.

BERNSTEIN: I see.

Were there memorable classes you took or labs you had? Or any moments where you realized you loved chemistry—that kind of thing?

CRETELLA: Well, I really enjoyed inorganic chemistry. Those were the labs I really enjoyed and the classes that I enjoyed. I also enjoyed psychology, but there were few classes that were in the humanities that were available to take. But I enjoyed those. And then, there were also some art and music appreciation classes.

BERNSTEIN: Yes?

CRETELLA: Yes. That was very good. There was the opportunity to have a reasonably well-rounded education.

BERNSTEIN: As an undergraduate right now, I am required to take one humanities class a semester. Did you have that same requirement?

CRETELLA: Yes.

BERNSTEIN: That's very consistent.

CRETELLA: Yep, that is staying consistent.

BERNSTEIN: Was the attitude begrudging, or did people like those classes?

CRETELLA: Oh yes, people enjoyed them.

BERNSTEIN: Yes?

CRETELLA: Because those professors were different from the science professors. They had more engaging personalities, at least as far as I remember.

BERNSTEIN: What was your social life like in college, since you did mostly lived at home?

CRETELLA: It was very little. And at the time, my mother was engaged in having a second family. So part of what I was involved with was family obligations, since I helped

out with chores and taking care of my younger siblings. My mother was pretty busy with the home and managing the business aspects of my father's business.

BERNSTEIN: That makes sense. Did you date at all at MIT?

CRETELLA: No.

BERNSTEIN: Not at all?

CRETELLA: I did my last year because I lived away from home. But my father was very strict. He felt that if I was there to get an education, that was the only thing that I should be involved with. I did date my last year when I lived away from home.

BERNSTEIN: And what was it like then, in your last year?

CRETELLA: Then I dated, and I was living with a couple of upperclassmen and graduate students, I should say, and it was really nice. Because of the Margaret Cheney Room, I knew all of the women.

BERNSTEIN: Were they in chemistry?

CRETELLA: One was. One was in aeronautical engineering. I forget what the other was, but I had three roommates.

BERNSTEIN: Did being at MIT just after the war color your education, or kind of the goals of the science education? Was it more oriented toward military projects and the like?

CRETELLA: No. I think the only thing that was different was that the attitude of my peers. Well, they were not my peers because they were older. Their focus was a lot more intense than a typical 18-year-old would be.

BERNSTEIN: That makes a lot of sense. It seems kind of like it would be a stressful environment to go into if there were--

CRETELLA: It was.

BERNSTEIN: --so many older people.

CRETELLA: I'm sorry my father was misled.

BERNSTEIN: So it was very competitive, you said?

CRETELLA: Yes.

BERNSTEIN: That makes a lot of sense. So what was one of your biggest achievements at MIT, do you think?

CRETELLA: It's hard for me to say because I don't have anything that really stood out. I think the fact that I survived is probably my first achievement!

BERNSTEIN: That is a big one.

CRETELLA: And the fact that I have been able to use what I learned to my advantage: I've had a very good career. I guess that's the real benefit that I see: what it meant to me afterwards.

BERNSTEIN: I saw online that you did a thesis on colloidal clay. Could you tell me a little bit about that experience?

CRETELLA: It was a very simple thing to do. And again, because I was commuting, it didn't challenge me with taking up a lot of time. I just ran the blender with different media for the clay and made notes and observations about the emulsifying behavior. It was in Chemical Engineering that I did that, so that was nice.

BERNSTEIN: Did you view it as a capstone on your education, or was it just like a project requirement for you?

CRETELLA: A project requirement.

BERNSTEIN: That seems very practical, very pragmatic.

When you talk about how your MIT education set you up for a fulfilling career, I was wondering if you could talk a little bit about the skills you took away from MIT, but also what MIT didn't provide you when you went out into the workplace.

CRETELLA: I was very fortunate in my early working experience. It was a startup company, and the people were very good to me in the sense that they allowed me an awful lot of freedom and let me take a lot of responsibility. I really learned a lot in a very short time, under their tutelage. I think part of it was because on the basis of the interview I'd had with them and the fact that I had an MIT background, they felt that I could do it, and so they let me. That, I think, was probably very helpful to me.

I was with them for about seven years. Part of what I did was definitely some engineering work—developing some float systems, things like that. And I actually developed a process for trying to produce ultra-pure powdered titanium.

BERNSTEIN: What was that company called?

CRETELLA: Ionics. [Ionics Inc., founded in 1948 by a group of scientists and engineers from MIT and Harvard who developed the ion-exchange membrane for the desalination of water.]

BERNSTEIN: What was their business about?

CRETELLA: Their primary goal was desalinization. They had developed membranes so that you could selectively move ions from the water and make it potable. They were very active in that, but they also got a number of grants for doing separation techniques using resins. And then, of course, the titanium effort that we did try to produce ultra-pure titanium. That was a powdered deposition technique.

BERNSTEIN: Why do you want ultra-pure titanium?

CRETELLA: Because there was a good demand for titanium metal.

BERNSTEIN: I see.

Just to wrap up a bit about MIT, do you think you would go there again if you could advise a younger you?

CRETELLA: If it were the way it is now? Absolutely.

BERNSTEIN: What if it were the way it is then?

CRETELLA: No.

BERNSTEIN: Why is that? Just because of the environment, or--

CRETELLA: Because of the environment and-- You know, that's not a very good answer to your question because it would depend on what the circumstances were. Because certainly, my classmates did very well, but without some of the angst that I had.

BERNSTEIN: OK. So your first job out of MIT, you worked at the startup that we were just talking about. That's the same company that your advisor had set you up originally to work as--

CRETELLA: As a secretary.

BERNSTEIN: But they saw something something in you, and so they kept you as a chemist.

CRETELLA: As a matter of fact, one of the reasons I'd never looked for a job until I'd been there for quite a while is because when I went for the interview, they asked me to list all the forces I'd had and asked me a question for every single force. And one of them I'll remember is, “How do you separate calcium?” And fortunately, in Inorganic Chemistry, we had to separate all the elements so I knew this one cold.

BERNSTEIN: That sounds like a very intensive interview for a secretary!

CRETELLA: That's why I was too afraid to leave. But the rest were easy.

BERNSTEIN: What other jobs did you have after working at Ionic?

CRETELLA: I went to work at Lincoln Lab and MIT for 22 years.

BERNSTEIN: What did you do at the Institute?

CRETELLA: I was doing primarily crystal growth. At Lincoln Lab, I worked in their materials group. I did a lot of electrochemistry. And then I got into crystal growth by various techniques. I left there because it was a period when research money dried up and I wasn't able to get a contract.

BERNSTEIN: Do you know why research money had dried up?

CRETELLA: It was the time; nobody was getting research money. Professors weren't able to keep the students. It was just very difficult.

Then I went to work for a company that was started by Tyco and Mobil Oil. And it was, again, crystal growth, but with an orientation towards solar power, primarily, silicon crystal growth and then shaped crystal growth.

Following that I went to work at Cabot Corporation, to head up a group doing gallium arsenide crystal growth research.

BERNSTEIN: The company was called--

CRETELLA: The company I went to after MIT was Mobile Solar.

BERNSTEIN: OK, after MIT, you went to Tyco and Mobile Solar. And after that--

CRETELLA: I went to Cabot Corporation.

BERNSTEIN: Can you tell me what you did there?

CRETELLA: There's always been an interest in what would make the most efficient solar cell. So for a while, there was considerable interest in perhaps, instead of silicon, using gallium arsenide. Cabot Corporation had started to get an interest in looking into that, so they had started a group. I headed up the group that tried to do gallium arsenide crystal growth.

I was there 10 years. I left there because Cabot Corporation is primarily a carbon black company, and their foray into semiconductors was sort of like playing for them. Then they disbanded the group.

When I left there, I actually took a certificate and became a paralegal. But then, after a couple years as a paralegal, I went to another company as a consultant.

They were also in solar energy. That was Evergreen. I stayed with them about seven years.

BERNSTEIN: Did you retire after that?

CRETELLA: No. I went to work for a non-profit counseling people who were considering getting reverse mortgages. This non-profit worked to try to ensure that people understood what they were getting into if they got reverse mortgages. After that I went back to being a paralegal again. In 2013, I retired.

BERNSTEIN: Just looking back on the timeline, you graduated from MIT in--

CRETELLA: '49.

BERNSTEIN: 1949. Then you worked at Ionic for seven years. How long were you at Lincoln Lab?

CRETELLA: Twenty-two years.

BERNSTEIN: OK.

CRETELLA: It was MIT and Lincoln Lab, I actually worked through the MIT part.

BERNSTEIN: Doing research at MIT as well?

CRETELLA: What happened is the man I worked for at Lincoln Lab, Harry Gatos, and I went down to MIT and started the Materials Science Department.

BERNSTEIN: Oh, really?

CRETELLA: Yeah. We sort of were the germinating people for that.

BERNSTEIN: How did that happen?

CRETELLA: As part of what was going on at Lincoln Lab, growing various crystals by various growth techniques. From that to developing techniques to study crystal surfaces and their interfaces with the atmosphere with other materials. Characterization of crystal properties.

BERNSTEIN: So were you involved at all in setting up faculty or setting up the curriculum of the Materials Science Department?

CRETELLA: No. Setting up the labs and setting up the-- I did have a couple of students that I mentored, but other than that, the curriculum was really evolving during that time.

BERNSTEIN: That's very cool. That sounds like--

CRETELLA: It was.

BERNSTEIN: --an exciting project.

CRETELLA: It was fun. I initially worked in a cage that had been used as a storage area. We had a strange space, it was really oddly put together.

BERNSTEIN: That's very funny. OK, so 22 years at MIT Lincoln Lab. And then how long were you at Tyco?

CRETELLA: I would say ten years.

BERNSTEIN: Ten years. And then at Cabot?

CRETELLA: Ten years.

BERNSTEIN: And how long were you a paralegal after that?

CRETELLA: I'm trying to think. that's all kind of hazy. I'd say about three years.

BERNSTEIN: And then at Evergreen, seven years?

CRETELLA: Right. And then at the nonprofit for four.

BERNSTEIN: I wanted to circle back a little bit. We've already talked about the role you played in helping to start the Materials Science Department. Could you say a little bit more about your role at Lincoln Lab, for example, what the environment was like as a working woman there?

CRETELLA: Actually, at Lincoln Lab MIT, there was definitely equality. At the lab, there's not a hierarchy in thought, although there are clearly group leaders. There's senior staff, but aside from that, there's a sense that each person is the same and each is a very strong member of the team.

BERNSTEIN: So, basically, it wasn't really a problem?

CRETELLA: No.

BERNSTEIN: OK. How many other women were there, do you think?

CRETELLA: Not a lot. It wasn't quite 50/50, but I'd say maybe 30-70 or 20-80. Still mostly men. And as far as things like group leaders, I can't think of a female group leader offhand. Not at Lincoln Lab.

BERNSTEIN: When we spoke earlier, you mentioned the state of the technologies at Lincoln Lab.

CRETELLA: It was very exciting. They had just moved out to Lincoln Lab from the temporary place that they had at MIT, so everybody was settling in. Some of them had been working for years together, but not at Lincoln Lab. It was exciting because they had completed a lot of the DEW line, the early warning defense with radar systems at the Marshall Islands and Westford, Massachusetts. It was exciting to talk about those things. But the Lab was also shifting into a new phase where it was doing different research. It wasn't all radar and early-warning oriented. It was more, “OK, there is science here.” And part of that is because I was in the materials group. They were going to definitely be looking at materials of the future and their applications. I was a senior staff member and began by looking into the electrochemistry of germanium.

BERNSTEIN: Is there anything else that you want to mention about your time at Lincoln Lab?

CRETELLA: It was a good place to work and a good learning enviornment.

BERNSTEIN: It sounds like it was really exciting.

CRETELLA: It was because, again, both at Mobile Solar and at Lincoln Lab, it was almost a family environment, within the group—not the whole of Lincoln Lab, but within the materials group. And particularly at Mobile Solar, it was a strong sense that we were all family doing great things together for future benefit to the world.

BERNSTEIN: When you left Lincoln Lab, it was already about 30 years since your graduation. At one point did you have to contend with working and having a family?

CRETELLA: Oh, I had my family all through that. I started a family in 1960, so I had been out of school 11 years.

BERNSTEIN: How did you meet your husband?

CRETELLA: At a gathering. I lived in Harvard Square, and there was sort of an international club near me. We used to go there occasionally for dances and things. I met him there. He was a graduate student at Harvard.

BERNSTEIN: What did he study there?

CRETELLA: He studied physics.

BERNSTEIN: Oh. I see. Adjacent fields!

CRETELLA: Yes. In fact, in his first job, which was at Raytheon, he used a lot of the materials that I was working on because he was in semiconductors also.

BERNSTEIN: Oh. That's very cool.

You haven't brought it up, but while you were at Lincoln Lab or while you were at Tyco, was it difficult balancing the fact that you were having children and that you were working as a researcher?

CRETELLA: No, because when I was at Lincoln Lab is when I started a family, and I had actually resigned when I was due to have my first child. But when he was about six weeks old, I went to visit my boss and he convinced me to come back part-time [LAUGHS]. So I came back part-time. I was part-time until a while after my youngest child was born. It was very generous: They allowed me to have full-time benefits with part-time work, which was really, very kind of them. I think I've been fortunate for the most part, with one or two small exceptions, that people have respected what I did. Not necessarily to the extent of paying me the same as everybody else, as I found out later, but in terms of respect and appreciation of what I was able to bring to the table. I was very fortunate.

BERNSTEIN: It seems like that's kind of a rare thing to happen.

CRETELLA: Right.

BERNSTEIN: Is there anything that stands out about your time at Tyco that you would like to mention?

CRETELLA: Tyco was very exciting because they developed ribbon silicon growth there. [A method of producing multi-crystalline silicon strips suitable for the photovoltaic industry. The name describes the manufacturing process, where a sheet of silicon ribbon is pulled vertically from a bath of molten silicon to form a continuous multi-crystalline silicon ribbon.]

It was completely innovative. It was interesting to see how the ideas kept growing and going from single ribbons into shaped growth, and really manipulating this molten material. That was exciting.

BERNSTEIN: That sounds cool.

CRETELLA: And then getting into the solar cell fabrication and development, because there it mattered very much what the environment was for each of these materials. That was a lot of learning and a lot of fun. I have to say it was very helpful because it was easy to publish: everything you did was new. I have maybe 60 publications just because everything you did was new, so it was easy [LAUGHS].

BERNSTEIN: Did you become totally fascinated with solar engineering, and that's what motivated your transition to Cabot?

CRETELLA: Yes, well, a couple of things. The fact that they were working with the material that I hadn't worked with before, the fact that they had lots of money to put

into it, at least at that time. And there was a new furnace that had been developed; it was going to be very capable of handling that type of growth. All of it sort of came together.

BERNSTEIN: That sounds very cool.

CRETELLA: It was.

BERNSTEIN: What was the team structure like? Did you ever work in a project manager role?

CRETELLA: Yes. At Cabot I definitely was. I had a crew of several people. At Mobile Solar, I had a small crew. At Lincoln Lab it's a lot more individual: you have a group leader and then that's about it. I had a couple of technicians, but it's not a project. You have your own projects, but it's not being a project leader the way I think of a project leader.

BERNSTEIN: I'm very interested to hear about what motivated this transition from the solar to the paralegal work.

CRETELLA: When I decided to get a paralegal certificate, I had always worked in research. It was not exactly people-rich. I mean, you have your colleagues, but that's about it. I wanted a different experience, so I thought rather than, at that age, to start looking for a job in that field, I'd try something different. I thought I would have made a good lawyer, but being a paralegal was a good step to take. And it was fun. I enjoyed that. So it was mostly to try something different, to get into an entirely different type of environment.

BERNSTEIN: So becoming a lawyer was not for you?

CRETELLA: I wasn't willing to invest the time and the money and the energy it required.

BERNSTEIN: That makes a lot of sense.

CRETELLA: I should have, though.

BERNSTEIN: You think?

CRETELLA: Yes, definitely.

BERNSTEIN: It seems like you probably would have been a very good lawyer.

CRETELLA: I would have enjoyed it. My brother was a lawyer, my older brother. He once told me I could not be a good lawyer because I was too emotional, because we'd just have these big, fat discussions all the time.

BERNSTEIN: Hmm. So, then, consulting was a much more people-rich job.

CRETELLA: Yes.

BERNSTEIN: That was a way to blend--

CRETELLA: Well, it's also because I found that it not only got me into a different kind of social setting, but I have a talent for it. And because of my age and the fact that a lot of the people that I counseled were either close to my age or even older, they were very comfortable with me. So I did very well, and that was very satisfying.

BERNSTEIN: Why did you decide to go into the reverse mortgages after that?

CRETELLA: That's what I mean.

BERNSTEIN: OK, I see. You mean that was true when you worked with people on reverse mortgages?

CRETELLA: I heard that there was an opening, and it appealed to me because it was a non-profit. It was doing something that was good and useful and helpful. So I thought I'd try it.

BERNSTEIN: That makes a lot sense.

CRETELLA: It did.

BERNSTEIN: Getting back to MIT, I understand you were an active member of AMITA [the Association of MIT Alumnae, which sponsors this oral history project].

CRETELLA: I was. Right.

BERNSTEIN: Why did you get involved and what kinds of things did you do?

CRETELLA: For a time, AMITA had a speakers circuit, so to speak, going around to high schools and talking to young women to encourage them to go into science and engineering—to show that you could do that.

BERNSTEIN: So it was mostly a kind of community outreach?

CRETELLA: Yes.

BERNSTEIN: What do you do now that you're retired?

CRETELLA: Resent it all the time [LAUGHS]. No. I have always enjoyed gardening, so I do that. There are some things I no longer do that I did do until recently that-- you know? Sewing and things like that. I like crafts, needle crafts. But gardening is probably the greatest passion I've had since I retired. That and try to keep up with the times. I just had solar panels installed on my house.

BERNSTEIN: Really?

CRETELLA: Yes.

BERNSTEIN: That's so cool.

CRETELLA: I feel at least that I'm making my contribution.

BERNSTEIN: Yes—maybe with technology you've developed? [LAUGHS] That'd be great.

CRETELLA: My first set of solar panels actually were from the company that I was working for.

BERNSTEIN: Oh?

CRETELLA: This is my second set. The technology has advanced so much in the 10 years since I started.

BERNSTEIN: That makes a lot of sense.

Well, thank you so much for speaking with me about all of this. I feel like we've covered a lot.

CRETELLA: I think so. You've very good at this.

BERNSTEIN: Well, thank you for being so open. I appreciate it.