

Lorie Velarde - The Geographic Profiling Analyst

[00:00:00] Welcome to Analyst. Talk with Jason elder it's like coffee with an analyst, or it could be whiskey with an analyst, reading a spreadsheet, Lincoln crime events, identify a series and getting the latest scoop on association news and training. So please don't beat that analyst and join us. As we define a law enforcement analysis profession.

One episode of.

Thank you for joining me. I hope many aspects of your life are progressing. My name is Jason Elder, and today our guest has 24 years of law enforcement analysis experience with 36 years of law enforcement experience. Overall, she spent her time at garden Grove police department and Irvine police department in California.

She's a trainer consultant and author here to talk about among other things, automation and geographic profiling. Please welcome Laurie Velarde, Lori, how are we doing?

Good. Great.

Thank you for joining me. I had your tag team partner, Annie Mitchell on a couple of weeks ago. And I asked her who I should get on next.

And you were her first thought. Oh good. Yeah. So [00:01:00] and AI is obviously I nicknamed her the life of the party, you know, how she is, so are you mostly the same or are you more the odd.

Oh, no, we're definitely the odd couple. Yeah. We joke around that. I'd call Annie the people person and I'm more the technology person.

So that's why it's a really good partnership.

Yeah. , that's interesting. When I first started out at the Washington Baltimore Haida. I, I worked with Joe Ryan and Kevin Armstrong, and I used to say that they were the art and the science, like Joe was the art

isn't it should not surprise you that he's in sales now. And then Kevin was the science, like he could, he really knew. Arc GIS . And the two of them made a

fantastic duo. So I can only imagine that it would be the same for you and Annie. Right. And you're also on my whiteboard is so I have this whiteboard now for two years and have names that I've written on there before I [00:02:00] started and you're on this.

So I can cross your name off the list, which always feels good . So I'm very excited to have you be with me today. And so how did you discover the law enforcement analysis

profession? Really? It was mostly by accident, so I didn't start out to be an analyst.

I kind of discovered law enforcement also kind of by accident. In high school. So I was interested in law enforcement and had just filled out a questionnaire at school saying that I was interested in law enforcement and the school resource officer actually called me in, I thought, you know, at first was in trouble or, you know, what's this about?

They said, no, that we show that as a career goal, you were interested in law enforcement. And they explained they had a police Explorer program and would I be interested? So at that point, I think it was maybe my senior year or, you know, into my junior year. I started my senior year. I went to one of their meetings.

But there was a huge time commitment for that. And I just, I was working at the time and going to school. I just didn't have [00:03:00] time. But they told me that I could become police cadet, which is a paid position. And as long as I was 18 and I was not at the time, but they said that the process to get hired takes about six months.

So I could apply before I was 18. And so about two months after I turned 18, I got hired as a police cadet in that started my journey into law enforcement. At the time I really, really wanted to be a police detective. And I knew that the route to that was. Being a police officer. So I went on a few ride alongs and quickly realized that working in the field was not for me.

Not, not in that way. Yeah.

So the cadet then what can, and can't you do, how does that compare and contrast to an

officer? Well, it could, debt is usually it's aimed for students that are in college. I think some places have a limitation that you can only be a cadet if you are in college. And they use it as a program to fit mentor [00:04:00] kids and try to see where they want to go and try to keep them retain them at the police department for other positions.

And then it's really to learn about the various jobs and radio codes, et cetera, but it can be kind of a gopher position. So you're more of an assistant. And so, you know, some of the tasks I did as a cadet were things like, you know, filing and running errands you know, working at parades, that type of thing.

And so you start out as a kid debt then, and then move on to becoming a civilian report writer with a garden Grove. So how did you discover that position and what

is that position? Well, I quickly learned that minimum wage at the time was like 3 35 an hour. So I wanted to make more money and was looking at various positions.

And so one of the ones they had that a lot of cadets were already doing was taking police reports over the phone. So these were things like cold you know break-ins to cars or even [00:05:00] houses, if it was, a cold report happened, the, the suspects weren't there anymore.

That could be a report that could be taken over the telephone. So garden Grove had a program where they did this and. Making an actual position. So some of these cadets kind of rotate it in and rotate it out, but they really wanted more of a continuity with the program. So they created a position.

And so one of the things they did is they actually took a records clerk position that paid more money than a police cadet, and they made it into a civilian report writer. And so I put in for it and I figured all the other cadets would put in for it too. But I found out that they didn't and I was really surprised.

I'm like they were already doing the job. I figured I would not even get a shot at this because everybody else had experienced. And because they had taken a records clerk position, there was a typing requirement, I think, of like 40 or 45 words per minute. And none of the the guys that were doing the job could type, so, or at least that fast.

So I got the job [00:06:00]

that's fascinating. And a little bit of serendipity there. It's interesting. When you think back at this things, how the stars kind of aligned for you. So you receiving calls and then writing the, the reports then as opposed to.

The civilian coming into the police department and writing up the report. So

well, we were at the time in the dispatch center, so they just had a console for the civilian report writer. And what we would do is we would call the people back. So they would call in and leave their information with the dispatcher that their car was broken into and they needed to make report for insurance or whatever.

And so then the civilian report writer would call that person back. And, you know, take the report, submit the report through, you know, it's a regular police report. Okay.

How long were you a report writer?

Between cadets and sibling report writer, it was maybe two years. .

Yeah.

Cause then you go right into dispatch it, which I could see this progression already here, right? Between [00:07:00] the cadet, the report writer, and then getting into being a, dispatcher. So I can see what you would have learned as a cadet and as a report writer. Would help you with the dispatching job?

Yeah, because the civilian report read writer, I was in dispatch and I was already seeing how they worked and learning the codes. And occasionally they would say, Hey, can you put that call on hold? And so I was already kind of getting some training. At this point I was getting my bachelor's degree, so I couldn't take anything full time.

They did have a part-time position and they encouraged me to put in for it because I, you know, I was already in there and already knew a lot of the codes and that type of thing. So that, that was a very kind of simple transition. Yeah.

Now, did you find dispatching to, be more difficult than what you thought it would be or did it transition quite easily to that?

Oh, it

was absolutely very difficult. I don't think I thought about it at the [00:08:00] time though. I just didn't really. About it. So it just one of those things. Okay. You're in training now. I do remember that they told me training was full time. And so I did have to take a semester at college where I went part-time for that semester.

And that did look like my graduation with my bachelor's degree, because I did take off one semester to be in full-time training.

And when you think back, what's a story or what do you think of what, is there a particular color that you think of when you think back during your time as dispatching?

Not particularly. I mean, I was a dispatcher for 10 years, so that's a long time. Lot of things that happened during that time period, but there's nothing really that stands out.

Okay. And then, and then this leads you to be communication supervisor, which is the, are you supervising other dispatchers?

Yes. So after I graduated got my bachelor's degree, I then became full-time as a [00:09:00] full-time dispatcher and that was a natural progression. I think they had a lead position. So I put in and got that. And then, then they opened up for supervisor and I put in and did that, and it's a working position. So you're still counting as minimum staffing.

You're still, you know, on the radio taking calls but also supervising. Can include training giving people their performance evaluations, monitoring, making sure that, you know, the job's getting done, that type of thing.

Yeah. Now, did you find it difficult moving from being a coworker to then being a supervisor to where you're supervising some of your former coworkers?

Yeah. That transition was difficult because you, you then become a part from your coworkers. So. You kind of have to take that step back or step away. And you know, I would let them know, you know, Hey, I don't want to hear these things. Or, you know, don't put me in a position where I need to act on something.

And so, so naturally that process does [00:10:00] happen. I

gotcha. When I was at Cincinnati police department, the one guy was telling me that he had to have a conversation with I think it was a dispatch as aware about personal hygiene and he thought, geez, I never would have thought that when I took this position that I would have to talk about certain style fair.

That was just, you wouldn't think would be part of the job.

Yeah. There's always somebody pushing the boundaries on dress code or a break times or what have you. And so you, you do have to have those talks, so that's always uncomfortable.

So then you still at garden Grove. And you now transition from communication supervisor to the crime analyst position.

So I guess talk a little bit about that transition because if I'm just looking at this, I would think that maybe that's a step down right. As you're a supervisor and then going into a crime analyst position, but maybe it's not.

Yeah. So what had happened [00:11:00] was so I, during this process of being a supervisor, I'd gotten married, I had my first child and my husband and I were both working shift work.

So we're not seeing each other all that much. And trying to deal with childcare issues because I'm working full time. And I do remember the incident that caused me to want to go part-time and. It was, you know, we had our first child, we had a boy and he was probably year, year and a half and running around and he fell and skinned his knee.

And, you know, I went to go take care of him. And he says, oh no, I went daddy to kiss my boobo. Cause I worked days and my husband worked nights and my husband was there more than, than I was. And I realized that he was getting that close bond. And my son preferred him over me and I, you know, I really thought, you know, I didn't become a mother, so I could take a back seat to mothering.

And so it was one of those things where I said, you know, I, I don't, I just don't like this. And of course in dispatch, it's not just 40 hours a week. There's always [00:12:00] shortages. There's. Time. So you're getting called in, you know, you're on call pretty much twenty four seven. And so that was really hard with a family.

So that's when I decided, you know I think I'd like to go back to part-time and which they were fine with. So garden Grove had had a crime analysis unit for a very long time. They had created one, I believe, sometime in the early eighties and had a stellar analyst.

They had gotten a at the time California was doing what was called C cap grants to fund criminal justice units. So a lot of crime analysis units were, were popping up throughout the state. But their analysts left in 93 and it was Nancy McFall. And so she went to another agency and at the time At that time period where we're starting to go into recession.

And so the department decided not to back fill her position. And so by the time, you know, I had my changes, so around 98 on the partners started getting money again. And they went to their officers and said, you know, [00:13:00] Hey, we're starting to get money. How would you like us to spend it? Or what, you know, what would you like us to expand on?

And they said, we really miss our crime analysts. And we really would like to have a crime analysis unit again.

That's, that's amazing to think about that. Obviously could ask for a lot of other bells and whistles.

Yes. And I'm sure they did, but that's one of the things they missed. So so what happened is they, thought about taking one of the police reserves or a couple of the police reserves and creating a crime. Yeah. Out of that. And so they originally talk to me because at that point I was very good with the data systems and they wanted me to train this other person or help the, you know, these people to learn the data systems so that they could then do crime analysis.

Well, I said, well, what is this crime analysis? You know, I'm, I'm kind of interested in this. And I had seen Nancy's work. You know, not a lot because I was in dispatch, but she was putting up crime bulletins that she was, she was really good at her job. So I [00:14:00] was, became interested when they said, well, we're looking at doing this again.

And and I started looking into it and seeing, you know, what is it all about? And the more I looked into it, the more I realized, I wanted to do that. I wanted that person to be. And so it started from there.

Right. And then, so this is a full-time position now.

It's still part-time. So I want to let you in on a secret, I have never been a full-time analyst.

I have always worked part-time

interestingly. So my first thought, when you think of part time, and this might be different with the departments that you've worked with is obviously it's less hours that you're working per week, but where you do you still have all the benefits or is it not the benefits aren't there either?

No. So there's no, there's no health insurance benefits vacation. Now some agencies they do provide that my particular classification has been where I don't have. Only recently have I gotten some sick time, [00:15:00] but most of the time, no, if you're sick and you miss a day, that goes unpaid.

All right. So, so then you're, you're a part time crime analyst now.

I mean, right. You're transitioning to that role and I guess so, so then just take us through there, because again, you can see the building blocks through there. Let you, you, obviously, by this point in time, you really know the police. Really well, you mentioned, you know, the data and, but there's nobody there to train you, right?

It's from the sound of it. It's just something that was went away for a while and now it's back. So it's pretty much, Hey, you're on your own or how, how are you getting this roll up to speed?

What I ended up doing is they paired me with a detective and we went and toured some of the local, you know, agencies where we heard they had good criminal justice units.

And so we went on somewhat of a road tour and I took a lot of notes, which I still have. I still [00:16:00] refer to those notes, but I, we took a lot of notes on what, what do we need to do? And at that time they said, well, California has a crime analysis certification program. You should enroll in that. And Just gave me various resources books.

So the department ended up putting me through the certificate program and they also you know, gave money to build a library. And so I could read all these various books that existed at the time on crime analysis. But the, you know, the interesting thing was, is I know that Nancy was a great analyst.

I didn't really know how she did what she did. So when I recreated the unit, I did it, you know, based on the materials that I got were a little bit different. So what, you know, I started researching mapping and, and some of those things, whereas that didn't really exist in the eighties when she was doing criminal justice.

I do remember that. You know, the big map on the, in the briefing room that had the, the actual sticky dots on it. So it was a form of pin mapping. And I do believe she had some sort of [00:17:00] system that she used. But a lot of the computer technology just took off in the nineties. So when I was in, you know, the late nineties, early two thousands creating the unit, I had a lot more access to better programs, that type of thing.

So by this time then, are you Dawn bulletins doing a regular reporting pointing to the problem areas?

Yes. So I'm trying to do that. I actually had some helpers, so I have. An intern and a volunteer that were helping me. But again, we're still not a full-time unit or anything like that. And so I'm starting to put out bulletins and I do remember the biggest thing was just trying to figure out, you know, this, the bulletin's officers were still putting out their own bulletin, but their idea of a bulletin was taking a napkin, writing, a vehicle description or a license plate, and then photocopying it 50 times and putting it in the briefing room.

So I had to pull that back and create, you know, a new letterhead and, [00:18:00] and start to try to put out information again and start a process, a request process, which we did. And so we started then putting out bulletins. But then I started reading. I really found a fascination with mapping. I think I've always been interested in maps and looking at things spatially.

So I started putting out some some maps with some information on it. You know, I look back now it's very primitive, but at least it was something and something that hadn't been done before. And then I think crime series, I was really interested in that because even as a dispatcher, I saw we'd have a series.

You know, it could be in decent exposures or burglaries, and I I'd see that, but I never really knew what was being done to, to work on that. And so now at this point, I'm, you know, at the forefront, I'm able to get that information and give it to detectives. And I was, you know, involved in the detective weekly meetings and in series analysis and trying to do what I could to do.

Yeah, identify the offender for that.

Okay. And then garden Grove during this [00:19:00] time, what kind of community is it? What is some of the problems that you're trying to help resolve?

So there a suburb central orange county, they on their Northern border, they born in Anaheim where Disneyland is.

So they do have tourists that stay in the city. But mostly it's it's a suburb in the center of the county, a lot of older homes. So they do have some violent crime. They do have street crime like street gang in the city. But they have your typical property, crime stolen vehicles burglaries deaths assaults, It was just trying to you know, look at everything and, and put out information.

And so I was, you know, starting to learn, you know, how do I create a a link bait a link chart to help the, you know, the game the tech does, or a timeline for a homicide or attempt homicide. But also try to put out information on some of the pattern crimes as well, so they could try to, you know, make an impact on those.

So there was, you know, a great, [00:20:00] you know, let's say a great deal of crime, but enough crime where if you're a new analyst, there's plenty to do.

So then what's the data look like at this point in time? Or is this something that you're really gathering on your own reading reports?

And yeah, the data was, was not in great shape.

So they had the CAD system, which I knew very well. From being a dispatcher. But they had their own homegrown records management system that had been built in, in the seventies. And so now I'm here in the early two thousands still using this system and you just did queries to export the data out.

And then we would build, you know, an access. We would build our own table to then clean the data and put in it from other information. And so one of the best things that happen is, you know, I think I'd been in that. Three years, maybe four years. And at this point, our Lieutenant just loves, you know, and the department just loves, you know, that they're getting [00:21:00] something again.

They really like it. They want to expand the unit. I had been doing crime analysis as a I was still a considered a part-time dispatcher. So that was

dispatcher was still my title. But what happened is they said, you know, we want to make sure that you are an analyst and we want to hire a full-time analyst.

And so they asked me to put in for that position. I said, no I had, at this point had a second child. I'm like, no, I'm just not ready to go back to work full time. So they said, okay, we're going to open it up. We're going to look for a full-time. Analysts and who they ended up hiring is they hired Nancy, so she wanted to come back.

So they got her back with all of her knowledge and you know, cause she really knew the people and that's something that that I wasn't necessarily very good at is knowing all the players. I'm more of a. Crime person. And she's more, she knows, you know, all the problem people where they live all their information.

So it was really good partnership.

So I forgot to ask you this, when you're talking about part time, is, are you working just mornings five days a [00:22:00] week or are you working full-time or two days a week

or? Yeah, I generally worked three days a week, full time. And so some of that dependent on the kids' schedule but generally three days a week.

So I'm in Tuesday, Wednesday and Thursday for the most part. And that's with many agencies out here. The officers are work with four 10, so they're working four, 10 hour days. And generally with detectives, they'll either work Monday through Thursday or Tuesday through Friday. So the bulk of the people are there Tuesday, Wednesday, and Thursday.

So she comes back then and you got all, some of these data, you've got your data process now, is she, up to speed in terms of technology by this point is as well? Yes.

So she was a she was still working, so she just was on another agency, come back and We were starting to get money for grants.

And, you know, the department was devoting money to things like arc GIS. So we got our JS 3.2 [00:23:00] when we started getting some tools. Now they didn't have a lot of money, but we would write, you know, we'd put in a request. And I remember that we just started asking some, you know, some of the

businesses, Hey you're willing to donate so we can build our criminal justice unit.

And and we started getting some, some little funds here and there to start buying some of the programs. So when she came in, I don't th I don't know if she'd use mapping before, but I had started, started to become proficient in the GIS work so that a lot of that mapping fell to me, but I think she could do some of it.

She had some experience. And and so we just, you know, had our regular products that we each put out. Yeah.

I, I definitely feel that analysts today don't truly appreciate what it means to claim. I could be wrong on that, but I came on about 2001 and so I remember our GIS 3.2, and having to clean data, having to clean the addresses.

So they would be able to be geo-coded. So [00:24:00] that definitely brings back a smile to my face. And just the hours upon hours that you spend as an ale, as cleaning the data, just so you can put it on

a map. Right. And I believe when Nancy came back, we had, I think on the face page of our reports either it was already there.

We asked him, but we had officers put a summary of the crime on the face page of the report. And then what Nancy had the records do is photocopy all the face pages. And we had a list of the crime types we wanted. And so every morning we'd go to records and get a stack of those face pages. And she would do, you know, where I would do the data entry on those.

And then we just taught, you know, throw them away and start again the next day. So and then there was times where we'd have a series that we need to get more information. And that would be a day where we just spend in records going through paper reports. And so we, you know, literally some days we would dress in jeans and a t-shirt cause you get in there, it's all dusty and you're sitting on the floor.

There's really no place to work. So we'd sit on the floor in there and [00:25:00] go through. You know, sometimes if you're looking for a pattern, that's the only way to find it as you kind of know a time period when it happened and you go through every case number to try to find what you were looking for. And then if you found it, you make a copy of it.

That I would sometimes have to go cause officers would dictate reports and it could sit on a, you know, this is just a regular cassette tape maybe for a week. And so if you wanted the information from, you know, like let's say a sex crime, you'd go into the, where they, those tapes were at. Find the tape, put on some headphones.

And listened to that tape to get the data that you needed so that you could start your analysis.

That's a whole other level that I never really thought about, the audio tape version of it. Certainly I've I've had other guests talk about reading all the reports and putting their database together during the data entry, it makes sense, obviously, if stuff's been going to be dictated in that there being a backlog for that information, for the data entry staff

and there is so [00:26:00] much to learn about a case by reading the reports. And I would imagine that listening to the audio file as well. It's just that the trick is getting it down to making it manageable so you can get through them. All right. And I, I liked the face page idea , trying to flag the ones that you really need to flag.

So it's manageable for you to

consume, right? Yeah. And I'd only listened to the tape if it was, you know, like I do remember a sex crime series we had where we had a new one in the series and we needed to put out information to patrol relatively quickly. And of course, you know, it happens on a shift where I'm not there.

And so I need to get that information. But it's, it's really important for analysts, I think to know. Where your data, you know, how it comes in and, and every step of the process before it comes to you and, and where that might be. Hmm.

So the, the sexual assault case then, was it fairly obvious how you were Lincoln, all these crimes?

[00:27:00] Was there a signature or something like that, or was it, was it difficult to identify which cases were linked?

These were a series of gropings where the women were walking down the. So it was pretty obvious that it was a pattern. We didn't have a lot of those in the city and they're happening maybe once every three weeks.

So and they all described the offender the same, so it was fairly easy to link those.

All right. And then how did you

catch that person? So I ended up putting out maps with the description and you know, one of the things that I remember, you know, I put up the map, put up the location. I actually did my primitive form of geographic profiling.

Didn't really use any fancy software, just, you know, map the incidents and figure it out. I think the main center of all of them and I put that out to patrol, but I remember now my husband's was a police officer for garden Grove at the time, and this area happened to be his beat. And so one of [00:28:00] the things when I was reading through the reports these were at night and many of the women's.

You know, approach from behind, but almost every single one of them said the offender's face was either red or he had pimple or acne or something. And I said, this is at night. And these women are saying this about this offender, you know? And they're really only seeing him as he really runs away. I said, what does this person look like during the day?

He it's gotta be the first thing that, you know, About this person. And when I described it in that way to my husband, he goes, you know what? I think I've seen that guy. And so he went to work and went back through his notes and found that about a month before that person had reported his bicycle stolen.

So he went and made contact with them and said, Hey, I'm following up on your, your stolen bicycle report. Do you mind if I take your picture? And so he took his picture, they put it in a photo lineup and the victims identified him and he lived very like right across the street from where my my main center for my crimes

was, [00:29:00] oh man.

So, and geographic profile, we'll get into that second, but it's a word, you know, focused on where you live, work and play. So that, that fits. And that's fascinating to me because that's some problem solving there that definitely goes beyond the. Right. Yeah. Thinking about that, the, the person having fairly red face or something like that and what that would mean, and you, cause you could have you and your husband could have talked about that case for weeks.

And if you're just looking, just talking about the data and not really put that together. But it was how you thought about that. That really crack that case. Yeah, it's fascinating. Okay. So you leave garden Grove for Irvine and you still part time. Yes. So what made you transition from garden Grove to Irvine?

So my husband actually left Irvine first, so he left in about [00:30:00] 2000 to go to Irvine as an officer. And I didn't really know anybody from Irvine at the time, other than, you know, they had a couple analysts, they would come to our analyst meetings. And so I got to know him through that, but I really got to know the department.

Once my husband went there and my husband starts seeing the crime problems, he says, we really have a residential burglary problem here. You really need to analyze these. I said, I already got my hands full with garden groves problems. I'm not going to go do Irvine's problems unless they hire me. So We had talks with with their supervisor supervising analyst with time Julie Chang and her and I became friends.

And she was like, I would love to find a way to get you over here to Irvine. And she says, we just don't have a part-time analyst position that would pay, you know, what, you're, what you're making now, because we do have part-time analysts, but they're they're police service aides. And at the time when I was at garden Grove, I was actually an analyst title.

So she kept searching unbeknownst to me and she says, you know, she found a [00:31:00] city side GIS analyst, and that was. And so she checked with her, deputy chief, is it, can we bring this over to the police department side? And we'd really like, you know this would be a great position for Lori because now it would be the right salary.

And so I, I didn't really want to leave garden Grove at the time cause I was having a lot of fun over there and I I'd worked there for so long and I just didn't want to leave. And so they, you know, I basically said, well, come meet with me, you know? And our deputy chief. And so I gave a long list of requirements.

If you want me, this is all the software I need and I need all this time off because I teach in basically I'm not going to negotiate on that. You have to be okay with that. And basically my laundry list. And they met every single requirement. So I didn't have a choice. I had to go.

Oh, man, not good for you for as good for the moon and getting it.

So that sounds awesome. You'd mentioned that was a position with the other department. [00:32:00] And to me, I thought, geez, that seems like a lot of bureaucracy to get that position moved from one department to the other. Maybe it wasn't as big a deal

as I'm thinking, I guess not, I never really heard the backstory on that, but I do know it had been vacant and and she, you know, she was able to find it and say, Hey, you're not, you haven't filled it.

Or maybe you haven't filled it in some time. Why don't we just have this position? And a lot of people don't like, part-time, it's, it's kind of strange because most people, they need those that full time for benefits. And I was in a position because my husband had the benefits I didn't meet full time.

All right.

So then you're, you're coming in there and you're a GIS analysts in the crime analysis unit at Irvine. And are you focusing on sir, your crime, is that was, that was your main

focus? Yes. So I went there at the end of 2004, but in 2003, I received formal training in geographic profiling.

And so I was the first in our county [00:33:00] to do that. And so I had found that opportunity you know, getting into mapping, I just really started to research, you know, how to find defenders and you know, based on, you know, where they live or, you know, any information I could find. And I came across geographic profiling.

So I saw a presentation on it at a conference and found that there was training in it. And at that time the training was free. So it was paid for by it was like NIJ or something like that paid for it. So you just had to, you know, basically just had to be selected. So you submitted a Memo or letter, and then they they, if they accepted you, your training was free and then your agency, all they have to do is pay for your time.

So once I went through the training garden Grove was like, well, you know, you've already had the training. We, we should buy the software that goes along with this. So they got me the geographic profiling software as well. And so I started using that in let the, you know, the other analysts in the county know that I had that ability.

And if they had me series, I could [00:34:00] help them out. So I started doing pro profiles for other agencies. And most of the time it was things for like robberies where garden Grove would have a couple in the series. And so it was, you know, I was profiling the entire series.

How do you describe geographic profiling to a lay person?

So geographic profiling is basically using the crime locations in a crime series to locate your offender. Most of the time you're locating where the offender leaves. It's not always their home. But generally it's where they, you know, where they go to sleep at night. So even if they're transient, they may go back to a particular location and you can identify that occasionally their search base cause that's what we're really locating as the search where the search for new targets radiates outwards from.

And so sometimes it's work or other locations, but most of the time it's home and it's just using the crime locations to try to locate that.

Okay. And then the software was from ECRI. Yes. Okay. All right. And what's

ECRI I, environmental criminology research [00:35:00] incorporated. Very close to Esri. Yeah.

I once had an officer's saying, wait a minute, don't we already have the mapping software.

Like that's something totally

different.

Right? So their software is Rigel, so

that's right. I was trying to think of the name of the software that's that's right. I forgot that it was named Rigel.

Hi, this is Dr. Carlina Orosco from the Tempe police department, Arizona state university. And my public service announcement is that correlation does not equal causation. If you find that certain things are occurring that may be contributing to a decrease or an increase in crime. For example, that gives an opportunity to investigate it a little bit further to see if possibly there are things contributing, but it does not mean that one thing caused the decline or the increase.

It just means that there's an [00:36:00] opportunity to explore it a little bit further.

Hello, this is Brian Gray and my advice for analyst is don't settle for mediocrity. If you want to be happy

in this career,

long-term you can't be a mental list. Just don't do what you're asked for, do what you know is right, and don't ever, ever substitute quantity for quality. And if you haven't found a way to put, designed to work for you, you're not doing your best.

All right. This leads us to your Analyst badge story, which you use some geographic profiling here on some cases here. So let's get into story time . And let's talk about the first one , which is the 2005 chair

burgers. Yes. So I hired on about November of 2004 Irvine and had already known a lot of the detectives and officers through my husband.

But then once I was at the apartment started talking to people and there was a couple detectives that came up to me and said, we really want [00:37:00] you to use your skills to find this serial residential burglar. And I already knew that Irvine had a high number of residential burglary. So which I thought was unusual.

Cause I didn't have that at Greg and Greg, they didn't have a high number of residential burglaries. But I said, you know, I would do what I could. So they said, yeah, the, of all the people that you need to catch, this is the one that we want costs. And so when you talk to the various detectives, I said, well, how long has this been going on?

And one person says, oh, you know, we've been having these burglaries for three years and somebody else says I was six years. And then one of the, one of the older Sergeant says, this person's been hitting us for 20 years. They're like, okay, well, I dunno if it goes back that far. So I just started. You know, getting all the reports together and trying to figure out what cases were late, because that's the first part of any profiles figuring out, you know, what's in and what's not in.

And so there's a formal linkage process that we use, and that was that's part of the geographic profiling training. So I went through and looked at the

[00:38:00] burglaries and the nice thing with Irvine is they don't have as much crime. So it wasn't like I had a whole bunch of other things to do and then try to do this case.

I could really devote a lot of time to it. And so probably took me about six weeks to get a core group of crimes that I thought were related and for their start to find, okay, what are the patterns here? And started getting, you know CSI photos to see what I could find. And so the reason it's called the chair burglar is one of the things that he would do is put a chair in the backyard.

And usually this is a chair. For potted plant or something that belonged to the residents. And that was already in the backyard, but he'd move it to the back fence of the backyard in that. So he would make his escape. So he would break into the house, usually at the back, steal the items and then he would go out the back again.

And use this chair to pop over the fence. And then his car was parked behind the house somewhere. And so we know this is one of the first things he did because there was a couple of times where he tried to break into our [00:39:00] house, but the alarm went off and he left, but the chair was still there. So we knew that he, you know, that was kind of like item number one, let's get the chair ready to go.

In case somebody comes home or the police show up, or the alarm goes off, then he can make us escape. Okay.

So is there anything about the targets themselves, like the houses themselves obviously? Is he choosing stuff or it's the back is like a wooded lot or something like that?

Yes, because the, most of them didn't back up to another house because that wouldn't make sense for him to jump over the.

Into another house. So most of them backed up to open space greenbelts, that type of thing, which Irvine has a lot of. So definitely he was picking the houses from the back, not necessarily the front. The other thing that was unusual is these burglaries were happening in the evening hours after dark, which you know, if you look at most burglaries nationally, they're happening during the day when people are way at work, although that's a little bit now with COVID and a lot more people are working from home, [00:40:00] but at that time, you know, that was, that was when burglaries happened during the day people were away at work, but this one was in the evening.

So he was using he looked for houses that didn't have lights on, so he could tell that nobody was home and we believe he probably knocked in the front door first and listened to see, you know, as anybody moving around in there that type of thing. But it was very specific. He only took very small concealable items because he was going to be going over that back fence.

So it couldn't be taken, you know, very large items. So that was helpful with trying to link the cases together. You know, the chair was the first thing, cause we didn't see anybody else using that, but there was still some houses where he didn't have need to put a chair, either the fence was low or there was an offense.

And so I still look for other cases that maybe had similar items take in you know, similar method of entry, those types of things. And so originally I linked 42 cases. And with a geographic profile, we need a minimum of five and then I would say 10 gives a good profile. 42 is a pretty good data set.

The other thing I looked at is evidence, you know, what's what type of [00:41:00] evidence we have and we didn't have any camera footage. It was still kind of early for that. There wasn't any ring doorbell in existence back then. So and really no descriptions because Irvine's pretty good. They'll canvas the name.

You know, whenever burglary happens, they'll go talk to the neighbors and say, if you ask if they saw anything, but really nothing consistent there. So we really didn't know what or who we were looking for, or how many other than our CSI said, they were only seeing one set of footprints. So they believed it was just one person.

And then the property, most of the property was like cash and jewelry, things that aren't traceable. And so they weren't, those weren't turning up either. Evidence wise, no fingerprints, no blood. But they were doing swabbing for DNA for touch DNA, which is really in its infancy in the early two thousands.

But Irvine was doing that. No, these were going into cold storage. They weren't doing anything with them. But then my question was, well, what can we do, you know, with these? And maybe we can see if there's common DNA, because we didn't have any suspects at this point to [00:42:00] compare it to. But it'd be nice if we, you know, we did know we had the offender's DNA, then we could start comparing suspects.

So that's one of the things I did is, is, you know, identify these 42 cases. Then we check to see, I think 21 had where they had done the process of the doing the DNA swabbing. So I worked with the detective to get those submitted over to

the lab and the lab found that three had common DNA. So that was our offender and these are very small amounts of DNA.

So they do believe he was wearing gloves at the time. So this was transfer from maybe touching his brow when he was sweating or they said sneezing into his hands on his gloves. Just something like. And it transferred to an object in the house now

as when he did the profile and you're looking at the 42 crimes, is this still a pretty wide area?

So the 42 crimes covered city-wide and covered two and a half years worth of time. So this is a pretty

big area. And you're talking about lots of houses that fit this district,

right. So far. And I had done a [00:43:00] geographic profile kind of early but nobody really did anything. The detectives didn't do anything with that.

It wasn't until the DNA came back, that we had common DNA. Now they want to work it. Now they're excited. So at this point, you know, I think I had a few more burglaries to add so I can refine the profile and use some of the temporal factors. And so I got a pretty good focus in the north end of the city.

And so our data showed he was hitting about once a week so I put up the, you know, the time of day, the day of week, it was very wide range. He was Friday, Saturday and Sunday, anywhere from 4:00 PM to 11:00 PM at night and in about once a week. So and that's where I think statistics helps us as analysts because I've seen you know, with other agencies where they'll take this information, they'll do surveillance one weekend and they'll say, oh, you didn't hit.

And then they'll abandoned surveillance or they'll change the plan. And he's only hitting once a week. So for us to be successful, we got to do this for, you know, five or six. Statistically just to give ourselves a [00:44:00] shot at getting him because we can't have a hundred percent coverage on the time, a hundred percent coverage on the day and the location.

We're always kind of minimizing that. So we've got to you know, the only way we really have a chance. Is to stick it out. And so that is one of the things I told our detectives is you gotta be in this for the long haul. You know, you can just be consistent, use the plan, but you gotta use it for five to six weeks.

And they said, okay, we'll do it. They were committed. They said they were committed. Now. I don't know if I would've gotten them five or six weeks. Fortunately it didn't come down to that. I gave him a whole list of the things they'd be looking for and sure enough, the first night they identify. Yeah.

That's never happened to me since they've never got them on the first night since then, but that one first case they did. One of the things I said is he needs to case the house. He's going to look at it from the back and the front. And so I said it anywhere from four to 11:00 PM, but he really liked about between seven and 8:00 PM.

And they said like, it was like clockwork, I think like seven 30 or eight. They see this car pausing behind dark [00:45:00] houses and circling the neighborhood and like, okay, this is suspicious. Cause if he lived here, he just pull up to his house and go inside. So they got the license. Well, that license plate came back to a rental car.

And the owner of the rental car didn't live or work in our county. So he's coming from outside the area in a rental car. So they said, okay, that's really suspicious. He'd never once been contacted in our city. No, no traffic citations or field interviews at all in our city. So they then started monitoring him through tracking devices to see what he was doing.

And they ended up waiting until we got it matched on DNA. So we had to surreptitiously get his DNA, which came back as a match for three cases. And they ended up arresting him after he had just completed a burglary in progress.

Oh, okay. So how did you secretly get his

DNA? They swapped the steering wheel of the rental car after he turned it in.

So he would rent a car every week.

Okay. Yeah. Right. So then did he not live in this area? Not at

all.

No. And so why did he pick [00:46:00] this

area? Because it's a fluent and it just has the items that he wanted to steal. Oh yeah. So you're really good. Professional burglars. They'll travel further

distances if the opportunity is greater and that's what we think was happening here,

but he didn't really have any other connection.

You know, we talked about live, work and play. He didn't really have any

connection. I think that he had, you know, opportunistically come across. Irvine and then realized he was just successful there and he just stuck with it. Now here's the interesting thing is we went back through his pawning history because some of the items were pawned and his history and we found that he was likely doing burglaries in the city of Irvine for 20 years.

So that was Sergeant was absolutely correct. Yes.

Oh, wow. So they must have thought you're a magician by this point for first time, the solve this 20 year old burglary series.

Right. But see, it was, he was under the radar because he only hit once a [00:47:00] week. So because of that, you didn't really notice it because they had so many other burglaries going on.

All right. Well, let's move on to another case thing ,

You worked with the FBI to identify the location of a murder victim.

Yes. And that was a more recent case. So in the meantime, so I get trained in geographic profiling in 2003 and became an instructor in around 2005. So I teach the two week geographic profiling training course. And so over that time, I've worked with students and seeing their cases, I have my own, you know, casework.

And so I've worked on probably or done a profile and probably 200 of my own cases. And I've looked at hundreds of other cases. So I've since built up a lot more experienced in geographic profiling. And I generally do not offer my services. If somebody contacts me and they want a pro. You know, I do that if I have the time or I farm it out to, you know, another profiling analyst, if I can find one, but I, [00:48:00] I just generally just don't reach out because it's generally not well-received it's gotta be their idea if they're willing to do that.

So what happened is there was a person in, I'm not quite sure the year if it was 18 or 19. But he was he went missing. And so the FBI treated this as a

kidnapping case and I was getting my information just like everybody else from the media, just reading what was published in the LA times, about this case.

And so this person had gone missing and the FBI was putting in. You know, at first limited information, but as time went on and it's going on, like about a year at this point they started releasing more information. Cause I think they were just looking for leads and they were saying that they believed that he could possibly be located in the Mojave desert.

So, and they were putting out a reward. And so generally a reward is put out when they kind of exhausted all the current leads and they're just looking for more information. And so I was reading between the lines and this, but it said if you have any further [00:49:00] information, reach out to the FBI LA field office.

And so I have a contact at the FDA in. I contacted him and said, Hey, I was reading, I've been reading this following this case. And I'm not sure if they've considered using geographic profiling this case but it looks to me, you know, reading between the lines that maybe they've exhausted their current Leads, and I'd be willing to take a look at the case if they want me to.

And so I left it at that. And so he said, okay, I'll, I'll contact, whoever's working on the case and let you know. And he contacted me like later that same day and says, yeah, they'd really like to meet with you. So I, I met them that particular group and they laid out their case. They were very open, which, you don't always see with law enforcement, sharing information, but they were very open about it.

And I asked a lot of questions. It was probably a two and a half hour meeting that first meeting. And then I said, you know, there's certain data that I needed. And they got it all to me. And it probably took me about a month to do my analysis. On it. And then they had already done a very large [00:50:00] search.

So their working theory was that that he had been kidnapped for ransom that he had been murdered. You know, I don't know if it was intentionally or accidentally by his captors. And then they then disposed of his body out in the Mojave desert somewhere. And they had some limited cell phone information, but, but not very much.

So the provided, you know, the information they had, I asked the questions, I did a real an analysis of the roads in that particular area, the time that the travel times in between, and went back to them and I said, you know, I realize you've

already searched this area here, but there's another area you haven't searched, I think is more likely to contain his body and based on the season, out the season and the timing I believed it was going to be a shallow grave because they had information.

Who they believe the offenders were, what their movements were and their window of opportunity was very narrow and that particular area gets very little rainfall. So just based on the time I believe that he was going to be in a shallow grave and [00:51:00] that I was actually surprised he had not been found yet.

Because you get people that go out and go motorcycle riding. And what have you in the desert? You know, at some point somebody's going to come across because it wasn't necessarily a very remote location. But we had had very hard winter that year. So I think this was, he went missing in 2018 and in 2019 we had had a very hard winter then that was starting to go into the time when people would start to do their desert activities.

And so I gave him the location and a series of maps with coordinates in you know, said, this is where you need to search. And so they had searched the north area and they were just going to search the south area when a citizen notified him that, that he had come across. Some bones.

And so they went right to that areas pretty much, right. It was right in the same area that I had said, you know where he would be and, and it was him. So the nice thing is they sent a very nice letter to my chief of police. And my chief didn't even know I was working on this case and here he's getting thanked from the FBI, but thank you [00:52:00] for, you know, for all the work that your analysts did and helping us out.

And he's like, wow, you know, it's kinda nice when you don't even realize that. That somebody is working on something and you get a thank you for it.

So from your vantage point, was it a lot of where they were coming from and how they would have got to that location that caused you to think that's the direction that they went into that particular area?

Yeah. I did ask a lot of questions about what is their knowledge of this particular area? What are their activities? What are, what vehicle did they use? What are the limitations of that vehicle? I did analysis of what the lighting would have been like also their cell phone data. What's the topography.

What's the coverage of that, of the towers in that area to really reduce down the area.

So they find the body then are they able to then link it to the group they think are

responsible? Yeah. They had already had that information.

They had already identified the offenders prior to to [00:53:00] locating his body. So they'd already done all of that. But this was, you know, it's sometimes it's difficult to prove a murder case unless you do have a body. And so that's always helpful. Also the victim's family needed that information for closure, so they really wanted to locate him.

That was the case close .

They've already adjudicated it. So two of the offenders fled out of the country and won't be extradited, but they are going to be prosecuted in their own in that country. But the rest of them that they were able to locate in, I believe it's two or three of them here in the U S have already been adjudicated.

You had mentioned that geographic profiling, isn't always well-received and I'm kind of curious, why do you think that is?

I don't know if it's considered pro if it's the term profiling, if that's what's controversial. If that, that might be it it's, there's also not a lot of knowledge about it.

So, you know, like everybody knows what DNA is, you know, even the lay [00:54:00] public, they know that, but you don't hear about geographic profiling a lot in the media. So I think that a lot of law enforcement they've just never heard of. I don't know exactly what it is, what it's, what it's based on and how it can be useful and how it can help them.

Right. Gotcha. Hmm.

I do find it fascinating because I remember going through the training as well and using the ride, your software and the idea of the more. Remote a location for our crime scene. The more valuable it is to you, because if people don't know a particular house, they're like, why did you pick that out?

Who would know that, that

then

there's only a limited number of people that they know that. Exists there. So that has way more significance than, common.

Right, right. It's all about familiarity. How did the person become familiar with this location?

And if it's on a major thoroughfare, you know, everybody's familiar [00:55:00] with it, but if it's someplace remote, not everybody is. And how would you get that familiarity? And it's often looking at how a person receives that familiarity. Yeah.

Of course, you know, a lot of the work that is based on is interviews with criminals.

Right. You catch criminals and then you start asking them questions like, okay, why did you pick this area? How did you pick your targets so it is a little bit of psychology as well. That goes along with the geography, right?

Right.

Well, most offenders want to get away with their crime and being familiar with the location actually increases that probability. When you go to an unfamiliar location, you just don't know there's too many unknowns. You don't know if people go there frequently. You don't know if it's the cops hang out there.

There's just too many unknowns. And so. As an offender increase your ability to get away with a crime if you are in a familiar location.

So you're going to move on now. I [00:56:00] do. There's just some general questions I want to ask you.

Cause you mentioned in the prep call that you got a degree in criminology and that it was important for you to specifically earn a degree in criminology. As opposed to criminal justice or crime analysis or, or another degree. So I, wanted to ask you why was it important to you to get a, a degree

in criminology? Well, I think because criminology is the study of crime and I see more criminal justice more as the application of the criminal justice system. I've always been interested in understanding the why's of crime. Why does you know, why is crime happening?

Why is it happening in this location? Why at this time you know what it is, all those dynamics that go into, into. And so I think that's really why I wanted the degree in criminology. So I could continue to try to understand the why's of crime. Interesting.

And so you're doing some consultant work now and you're traveling [00:57:00] the country and talking with different police departments and you're dealing with a lot of automation.

And so are you still using automation in terms of access or what, what do you use for automation?

So automation can be done in many different ways and you know, it depends on what you want to automate and what systems you already have. You might have. You know that you already have, that can help you with that.

But we started with the Microsoft products for data, so Microsoft access but we're using arc GIS for our maps. So we use Python to automate those and those that works well with act, you know, the Microsoft Excel and access as well. But we recently got a new records management system and CAD, and we are now using SQL reporting services for that.

So our automation we've had to totally change our automation now by building. Completely different reports to get that information. We still use Python for our mapping. So we're using a hybrid of those, [00:58:00] of those two. Okay.

Is this mainly going to other members of the police department or are these reports that the supports that go out to the public?

Generally not the public. We have one that goes to our front desk that provides the list of, crimes. And I think we have a second one that list of arrestees that they're required by law to provide to the public. But it really goes out to all different groups. So some go out to patrol officers, many of them just come to our crime analysts to help us have the data that we need to start our analysis.

So in the morning when we start rather than having to query what happened yesterday, it's already waiting for us in our inbox because an automated report has delivered it to us.

And I'm a big fan of automation to to me, if an analyst is clicking the same button, Weekend and week out to produce a report and just updating the data.

It's definitely something that needs to be automated. So for analysts who are in that position where it may be, they have a more clerical task [00:59:00] and want to automate it, want to learn about automation, what would your advice be

? Just start researching it. It's, it's a huge time-saver in that time, really increases productivity.

And that's one of the things when Andy, and I see when we start going out to various agencies or doing this consulting to try to help them, you know, We'll look at everything. So we'll look at, you know, what, what their infrastructure is as a department, can the analyst even get data and, you know, what are the processes of that flow of information through the agency?

And then, you know, also we'll look at the analytical staff, their training, their abilities. So we're looking at everything. But I find that very few agencies are using automation effectively and they are just manually creating things that can be automated. These all take time and that time could be better spent doing actual analysis rather than querying the data.

Yeah. And so where do you think the gap is? [01:00:00] Is it that the analysts need to learn how to do the automation? Do analysts need. More it support. How would you suggest resolving this problem with automation? Okay.

I do think that the analyst's job has become a lot more dependent on technology and agencies aren't necessarily hiring

an analyst for their tech skills, but it's vital that they do have tech skills. So the biggest thing I see is a lack of knowledge on how to do it. And really it shouldn't be the IT department. That's doing the automation. They can help you, if you need a connection to something, you know, they can help with that.

But really it's going to be dependent on the analyst to know what needs to be automated and then to make it happen. And that's where I see the disconnect is, is the analysts doesn't have the skills or doesn't try to get the skills to make that happen. And then time goes on and it, it is, it is a significant investment of time, but it's a huge time saver in the long run.

And so [01:01:00] that investment really needs to be made. Okay.

So it's not necessarily a class that she would recommend. It's more or less identifying the programs that you have access to and then doing online research to learn how to use those programs.

Right. And I've done presentations on automation at various conferences to give people the basics, but it is, you know, for us, it took us a summer to do it.

So we you know, we had to put that significant investment there.

Yeah. And is that where you had actually hired a it

intern? So we actually, so w what happened is I was already looking at Python. I had gotten one Python script running that created a map, working with an intern on the, in the city side.

Okay. And, but I wanted to do a lot more and my boss is the one that suggested why don't we get, you know, we always get these crime analysts, interns, why don't we get a programming intern, somebody that can do software [01:02:00] programming? I said, well, that's a great idea. Well, where would we get this person? And she says, well, isn't your son looking for an internship this summer?

And I said, yeah. So it was actually great because you know, my son needed an internship. Couldn't afford to pay anybody. And so one day, a week, one day a week, he had to pass the background. He went through the whole process and he got a free lunch on the days he came. So, he had already learned some programming languages.

He didn't know Python, which is what we were primarily using at the time, but he knew some other programming languages. And so I got him some books and I said, okay, this is what I need you to do. And I already had a working script too, so one working script. And so he was able to take that. And you know, it took him like maybe a day to learn Python, which was amazing.

And then he took that and we ended up getting about 14 different reports. Going by the end of that summer. And then we've since expanded. We probably [01:03:00] have 30 now using the Python method. And then from there now we've switched over to SQL server reporting services and we've just added a bunch more.

Hmm. Interesting. So, so as I mentioned, you do a lot of teaching and consultants, so you do see a lot of different place departments. And so I, I think you're the right person to ask this. Cause you can take the temperature of all the different law enforcement analysis units out there. So what are some of the big deficiencies that you're seeing out there

right now?

I think the big deficiencies is we don't have a great crime analyst program. Like each system may have a crime analysis module, but there's nothing that really does it all. And every agency has a different CAD and RMS. And which have each have their own ways of getting to the data.

And so that's, I think the biggest thing I see animals struggling with is how to get their data, how to get clean data and how to add, you [01:04:00] know, once they have the data, then, then they can analyze it. But it's just getting that data in that usable format. And so that's, you know, one of the biggest deficiencies I see.

Do you think there's too much data? I like data I'm a fan of more data is better. So I don't know that there's too much because we're not gonna use most of it. But I really like things to be captured because I still feel we're not capturing enough information.

And then there's another question I always like to ask too is again, so you're going back to 86 than when you first started.

Is there something that you're surprised that law enforcement analysis hasn't figured out yet? I, you, you thought way back at the nineties that, oh, by 20, 20, we'll we'll have it figured out by then. And yet we're still struggling with it today.

Yes. All these disparate systems that we use to get to do one job, I'm just surprised.

That we don't have one standardized system to do, you know, as a records [01:05:00] management system that we, that would do everything that we'll do mapping that we'll do that we could do crime analysis from that it's not all there. And we still have to have like 10 windows open on our computer just to do one bulletin.

It seems like

that's true too. Well, you do right. Well, also you are, as we finish up this interview here, you are counting down the days to retirement. So March of 20, 23 so are you going to stay in California? Because I know Annie's look into move the out of the state.

We're going to play that by ear. Both of our kids are currently out of state and have been for a couple of years. So we'll see where they land permanently, you know, they're really still figuring out jobs and that type of situation. But if they do, you know, in an end up in a place and they said, they're going to put down roots, then that we would move, but we don't have any plans to move right now.

We're going to finish up the interview with personal interest [01:06:00] and you are making greeting cards.

I just started that hobby. Yes. I

find that fascinating. So what exactly are you doing

So I had a friend that did it. I actually liked camping as well. And so one of my friends that we go camping with she is, she was making cards and she's a demonstrator for.

Pardon making you know, company that sells the, the paper and the stamps. And so I started seeing what she was making and then she started sharing catalogs with me and we started kind of doing this. I just bought a little bit here and a little bit there. We started doing camping and it just really found, I really liked it.

I'm somebody, I like to see, you know, if I spending time on something, I like to have an end product. And so the great thing about a car doesn't take too long to make, and you, you end up with a, with a pretty nice, like an end product and then something that you can, you know, you always have greeting cards that you need to give people for their birthdays and graduations, that type of thing.

So it's nice to always have one on. If you need one.

Yeah. So are you [01:07:00] doing the graphic design? Are you doing the message inside? We

do it all. Yes. Okay.

So I guess which, which do you find more enjoyable? The graphic design or the message

inside? It's kind of weird. I don't consider myself artistic at all.

I'm too analytical, too logical. I just don't have that creativity. So generally I'll get my ideas. I'll look online, Pinterest or something like that. And then if there's a card, I like, I copy it. Exactly. I'll have to get the same paper, the same stamps, the same color, ink, everything. And I'll just copy it the way it is.

So I'm just, I'm lacking that creativity. Okay.

So you don't have one that you you've made up three the message inside on your own. Oh, okay. Hmm. That's interesting. Certainly saves you some money. I mean, geez. Cost \$5 now.

Right, right. But it does take you a while. You know, like I probably have a thousand dollars invested in paper and stamps and ink and all [01:08:00] that.

And you know, I have 40 cards. So at some point, you know, maybe

I'll make my money back, but, Hmm. All right. Well last segment to the show, his words to the world, and this is where I give the guests the last word, Laurie, you can promote any idea that you wish. What are your words to the

world? I would say persistence is extremely important.

That's where you're going to get far as if you, if there's a problem or something you're trying to solve, you just need to stay with it. And that's, what's going to put you as a cut above the rest because a lot of people abandoned things that they get difficult, but if you stay with it, you'll eventually solve that problem.

Very

good. Well, I leave every guest with you giving me just enough to talk bad about you later, but I do appreciate you being on the show. Lori, thank you so much and you be safe.

Thank you for making it to the end of

another episode of analysts. Talk with Jason elder. You can show your support by sharing this and other episodes found on our website@wwwdotleapodcasts.com.

If you have a topic you would [01:09:00] like us to cover or have a suggestion for our next guest, please send us an email@elliottpodcasts@gmail.com. Till next time analysts

keep talking.