

Transcript for “Kayla Hudson, Meteorology Graduate of Jackson State University.”

Clear Skies Ahead: Conversations About Careers in Meteorology and Beyond

September 12, 2023

Kelly Savoie:

Hello, Clear Skies Ahead listeners. This is Kelly Savoie and I'm hoping you can take a moment of your time to rate and review our show wherever you listen to podcasts. We have produced over 60 episodes and you can help us reach even more individuals that will benefit from the diverse experiences shared by our guests. Thanks so much for listening, and I hope you enjoy this new episode.

Welcome to the American Meteorological Society's podcast series, Clear Skies Ahead, conversations about careers in meteorology and beyond. I'm Kelly Savoie and I'm here with Emma Collins and we'll be your host. We're excited to give you the opportunity to step into the shoes of an expert working in weather, water, and climate sciences.

Emma Collins:

We're happy to introduce today's guest, Kayla Hudson, a recent meteorology graduate of Jackson State University. Welcome, Kayla. Thanks so much for joining us.

Kayla Hudson:

Thank you guys for having me.

Kelly Savoie:

Kayla, could you tell us a little bit about what got you interested in meteorology and how it influenced your educational path?

Kayla Hudson:

I knew I wanted to do something in science as a related career choice due to my father being a civil engineer and all of my science fair projects growing up being centered around engineering or either meteorological settings like wind farms and things like that. And I also know that I have a need to want to be overly prepared and control everything, especially since my family's home was destroyed during Katrina from there, even though I think I was like four or maybe three, but I still remember it. And in high school I just began to focus more on some accelerated science and math classes.

Emma Collins:

And what were some of the deciding factors in choosing to attend Jackson State University?

Kayla Hudson:

So Jackson State is the only HBCU in Mississippi that offers a meteorology program. And even until 2008, so a little bit over three decades ago, we were the only HBCU ever that first started with a meteorology program. And it was really important for me to attend HBCU since only 3.7% of meteorologists are Black. And I wanted to be surrounded by others and even pioneers in the meteorology industry such as Vivian Brown or Dereka Carroll all started off at Jackson State. So I wanted to just be a part of that number.

Kelly Savoie:

It's great that you had that interest early on in high school and you knew which courses that you needed to take that were going to help you once you established that meteorology major at Jackson State. And so what opportunities did you pursue inside and outside of school that you knew would be beneficial to securing a job?

Kayla Hudson:

So as crazy as it may sound, I pursued a minor in marketing, which is totally unrelated, but I feel like it was best paired with my meteorology degree, because I was able to attend workshops and career fairs that my peers weren't able to, their opportunities were more so science related. And this opened up a whole new world for me. It gave me direct access to private sector companies and big corporations that were often looking for interns and brand ambassadors that led to job offers from them, which again, a whole new world. And outside of school, I never stopped networking. I never stopped participating in organizations that had me traveling to conferences and things like that in my free time speaking at events in the community. And it's not every day that you meet a meteorology major, so I was always their go-to girl.

Kelly Savoie:

And marketing, those skills are really important regardless of what type of position you end up with, because every organization is doing social media and writing, and I think that's an excellent minor. That was a smart move in my opinion.

Emma Collins:

I absolutely agree as an English major myself. So, as you mentioned, you had participated in many internships and volunteer activities. What experiences though did you find the most useful in helping you gain career building skills?

Kayla Hudson:

When I think about that, the only experience that comes to mind is my internship with NESDIS, and it was the most rewarding thing that I've ever done. I spent so many days confused and just sad, sick to my stomach over coding. But it is nothing more satisfying than just finishing something that you don't think that you could. And it gave me the much needed skill for my future career to continue to push myself and remain on time for everything and just practice time management. And it also gave me real experience for working a 8:00 to 4:00 job daily, because it's something I had never done before and it takes a lot of patience and a lot of snacks. But I was able to get through the days and the summer went by very quick.

Kelly Savoie:

I was going to say it sounds really interesting and really hands-on.

Kayla Hudson:

Yes. And there wasn't anything, it was more so hands-on. I do know that the research project, it was more so just to see how effective one of their satellites that they already had was. And so it was really monumental in our research at the end, I think we just found out it was basically just inconclusive, but inconclusive results are important too, because it shows you can't do anything more so it prevents

research from being done on that end. And I also did some data assimilation, artificial intelligence work there too, which was really cool, because at that point in time in 2020, it wasn't being talked about as heavily as it is now.

Kelly Savoie:

Did you do any other internships or volunteer activities while you were in school?

Kayla Hudson:

Yes. So I actually did an internship with NOAA and Howard University, and it was funded by MSI EPP. And there my project was based on severe weather, and it was more so about intensity and heat flux changes for Hurricane Irma. And then I did the exact same project, but I switched it and did Hurricane Harvey when I did my internship with Department of Homeland Security.

Kelly Savoie:

And while you were at Jackson State, could you tell us what some of the biggest successes and challenges you encountered?

Kayla Hudson:

So we'll start with challenges, so we end on a good note. Okay. So my biggest challenge was the classes. I have never ever been good at math. I think even in elementary school I was struggling with timetables. So it is just a battle I never expected myself to get over. But I was able to get through calculus 1, 2, 3, and 4 and then differential equations. And that was a really, really, really hard thing for me to do. It seemed like every year I was struggling with some teacher, always having to stay in when my friends were getting ready to go out, always in the books. But I realized it was just the mindset that I didn't necessarily have to be good at something, I just had to be persistent at trying to be good at it. And I think that's where everything shifted for me, because I didn't necessarily mind studying then because I knew it was something that I needed to do.

And my biggest success was that at Jackson State, I prioritized myself more. For a long time, like in middle school, and just in all sectors of life, I rooted myself in academic validation. And it's like if I didn't get an A, the entire world was over, but I didn't allow my grades to define me as a person in college. And I learned that failure is normal and I was really involved in school and really involved in the community, but I still was able to graduate with the highest GPA, so in my class as a meteorology student. So it was worth it. Everything ended up working out for the better.

Kelly Savoie:

You said you struggled a little bit with the math. Did they have tutoring and did you take advantage of any of those things while you were in school to help you get through the courses?

Kayla Hudson:

Yes, they got tired of me. I went to tutoring. I went to tutoring every week. I went to tutoring. And then, because our teachers will tell us you have to spend, I think they would say you have to spend at least 15 hours a week studying. So I would go to tutoring and then I would make sure that I went to the teacher's office hours. And then in my free time I would be studying or either on YouTube trying to see how they worked it out there. And then I had my own little study groups I would go to if they felt like studying. But...

Kelly Savoie:

Well, that's good that you took advantage of that and you didn't give up, because we all know those math courses are very difficult. And for someone who you say who's not great with math to get through calculus one through three and differential equations, bravo, good job. Absolutely incredible.

Kayla Hudson:

Thank you.

Emma Collins:

I so admire your tenacity and sticking with it. And even if it was something that was maybe a little frightening at first with math, you still stuck with it and you explored every avenue to help get that under your belt. It's really awesome. Is there anything you wish you could have done differently while attending college?

Kayla Hudson:

I really wish that I would have taken some classes in communications or had basically taken classes in communications and making a reel. A lot of times when I'm applying to the broadcast jobs, the first thing they ask for is, do you have a demo? Do you have a preview or a reel, or something like that? And now that I'm out of school, it's really hard to find a company or a news channel that's willing to allow you to volunteer and give your time to them just to record for your own benefit. So I wish I would've looked more into that, because it's always good to be a well-rounded candidate. Even if you don't want to do broadcasts, it's always good just to have.

Kelly Savoie:

And when you were doing the internships, it doesn't sound like you did any at any stations at broadcast stations. So when did you decide that you were interested in that?

Kayla Hudson:

So actually when I first came to Jackson State, I wanted to be a broadcast meteorologist, but our program is more so structured for research meteorology, and operational meteorology, and forecasting as well, heavily in forecasting. So I did not know it was different types of meteorology when I first came to Jackson State, but I learned very quickly, so I got sucked into it, and now I want to do more forecasting and research. So I don't know. Right now I'm open to pretty much anything just because I'm a very versatile person, very easygoing. So I can be with anything and be happy. But I think that if I would've known, I probably would've drifted off somewhere else.

Kelly Savoie:

So now that you graduated, speaking of the internships, what advice do you have for our student listeners who are looking to pursue internship and research opportunities at the undergraduate level? What were the steps that you went through to get those internships? How did you find the ones that you participated in?

Kayla Hudson:

So I found the majority of my internships through my advisors as they would get grants and as they would attach themselves to certain colleges and certain organizations, they would always be like, "Hey,

don't forget to look out for the JSU kids." Or they would be like, "You guys, this place has an OAR available, so go apply to that." Personally, a lot of my internships came from being a part of NCAS-M. It's like an internship that is based at Howard University, but it's for minority serving institutions, and it's funded by EPP as well.

And the lady that's over it is Jo-Anne Butty, and a lot of my internships came from there. I got started there and did an internship called the Experiential Sophomore Program, I believe. And it started when I was a sophomore in college. And then from there they introduced me to Lapenta and I did Lapenta in my junior year. And then my senior year, my teacher had a grant. So I think just making sure that you remain in contact with your teachers and also making sure that you're looking up the things that you want to do and seeing where the funding is.

And also some advice that I would have is don't always go with what's the bigger internship. Sometimes the smaller internships can benefit you more than you would know. You probably are going to get pushed more, because they have less people to deal with, but it's good for you. And to always be persistent and to dedicate as much time as you can to your work and do your work yourself, because as much time as you put into it is as much as you'll get out of it. And also with internships, one thing I did, one summer I didn't know where I was going to go, but I think it's important that you set a limit like, "Hey, I'm going to apply for two internships today and then tomorrow I'm going to apply for two tomorrow." And I always suggest people just to go until they get at least three offers or two offers and then make the decision between there, because it's always good to have options.

Emma Collins:

And flashing forward a little bit now into your current job search, what have you found to be the most sought after skills for meteorology positions?

Kayla Hudson:

This is also a really good question. The main skills that I've been seeing that have been most sought after would have to be outside or third party trainings as well as coding. So I know that FEMA and National Weather Service have certifications and trainings that we could all do to get better at what we do. And I think that it's really important that you pair your resumes with that, because they are looking for it and it is a section. And sometimes on this section, I have to leave it blank, because I don't have any certifications to where that job is looking for. But in your free time, you can take the test, you can do the certifications while you're still in college. So if you don't have an internship during the summer, that's something that's really important and it's free. You can do it. You can go to your local National Weather Service. And I think the FEMA ones are free too online.

Kelly Savoie:

So explain that a little bit more. So FEMA and the National Weather Service, are they virtual courses where you just take them online and are you learning, is it a machine learning skills for coding?

Kayla Hudson:

So National Weather Service, I know that they have a bunch of different certifications. They have one for learning how to do a weather balloon all the way up until even if you want to go into the aviation side, they have something catered to, I think... They have a whole certification to go into the weather aviation side. And that's necessary, you have to get that in order to look at job opportunities. And those two that I just talked about were not about coding, they were just about just learning how to operate the machinery. And I think that the aviation one is more towards data and learning how to decode that. So I

think even if you don't get the certification, learning how to decode our data. If you haven't got there yet, it's also really important, because they're going to be looking for that.

But I know with FEMA, their certifications are more towards learning how to use and handle hazardous materials, things like that, what to do with fire and smoke, how does fire and smoke affect the atmosphere? They have courses that relate to things like that. And then separately off from that, I have seen jobs that ask, "Hey, do you know how to use Matlab? Do you know how to use Python? Do you know how to use C++ or R?" So even if you just watch a YouTube video about how to use those things, you can still say you know how to use them and just download it and go and play with it. It's just about putting yourself out there.

Kelly Savoie:

So those are the machine learning skills that come up the most, the Python and what was the other one, C++?

Kayla Hudson:

Yes. And Matlab and also R.

Kelly Savoie:

Well, that's great. And have you noticed that the jobs that you've been looking at, do they require Master's degrees or are there plenty that you just can have an undergraduate degree in Meteorology?

Kayla Hudson:

Majority of them have required Master's degrees or either a bachelor's in Meteorology and then four or three plus years of experience. But I would just say it probably would just be easier to go and get the Master's degree because it would take less time.

Kelly Savoie:

Well, we're so grateful for everything you've told us about your job search and your experience at Jackson State. However, before we go, we always ask our guests one last fun question at the end of our show, and I'd like to ask you, what's your favorite movie?

Kayla Hudson:

My favorite movie would have to be Home, the Disney movie, that or either Mean Girls, it's tied.

Kelly Savoie:

Oh God.

Kayla Hudson:

I can re-watch those movies over and over again.

Kelly Savoie:

So I don't think I'm familiar with Home. What is that Disney movie about? Is that a more recent one or is it from a while ago?

Kayla Hudson:

It came out about 2017 or 2018. It's about basically this big alien and all of its big aliens want to take over the United States, but in the middle of it, he meets this girl and their best friends, and now he's trying to run away and the girl is trying to save him. It's a lot. It's a lot going on in that movie, but I suggest that you watch it. It's on Netflix.

Kelly Savoie:

The Disney movies are great. One of my favorite ones is, I don't know if you've seen it, but it's called Up.

Kayla Hudson:

Yes.

Kelly Savoie:

Actually, was it Disney or was it the other, the competitor, the Dreamworks? I can't remember. I think it might've been Disney. But I love that. And Mean Girls, that is just something that you can watch over.

Emma Collins:

Absolutely.

Kelly Savoie:

We've all seen that one. It's the best.

Emma Collins:

Such a quotable movie.

Kelly Savoie:

Yes.

Kayla Hudson:

Oh, Emma, you're so fetch.

Emma Collins:

You go Kayla. Well, thanks so much for joining us, Kayla, and sharing your experiences with us.

Kayla Hudson:

Thank you for allowing me to. I really appreciate the offer.

Kelly Savoie:

Well, that's our show for today. Please join us next time. Rain or shine.

Emma Collins:

Clear Skies Ahead, conversations about careers in meteorology and beyond is a podcast by the American Meteorological Society. Our show is edited by Johnny Le, technical direction is provided by Peter Killelea.

Our theme music is composed and performed by Steve Savoie, and the show is hosted by Emma Collins and Kelly Savoie. You can learn more about the show online at www.ametsoc.org/clearskies. And you can contact us at skypodcast@ametsoc.org if you have any feedback or would like to become a future guest.