Interviewer: [...] My name is \*\*\*. You are \*\*\*, is that right? It is April 27 [...].

[...]

*Interviewer:* Alright. Good. Well, so we started by asking everybody how do you describe yourself as a writer?

Interviewee: As a writer? I enjoy writing in that I think that it provides a lot—especially—I am in the science field. At first I absolutely abhorred the idea of writing in any capacity 'cuz that was what I was supposed to do 'cuz I was a science major. It actually helps me a lot when you have to sit down, and you have to try and communicate your ideas effectively. It helps you look at your own research, and realize there are holes that are missing. Then, if you can't communicate that in an effective way, you know that you've done something wrong. I mean, if any audience can't understand it, you're not doing your science effectively. It's a reflection of the field that I have chosen to go into, as well.

Interviewer: Okay. Which science are you in?

*Interviewee:* I'm in microbiology.

*Interviewer:* Microbiology. How did you choose that?

*Interviewee:* I took one class, and I picked the major. I absolutely loved that part. Then I joined a lab, and that's when I really fell in love with research. [...].

*Interviewer:* Awesome. Good. Good. How did you come to realize that writing had all of these significances for your actual research process?

Interviewee: It was because I had to, basically. The three most important things I've written so far in terms of advancement of my career, and where I'm going, is I've had to write abstracts for conferences, I've had to write for grad school, and then I had to write for a grant, as well. Those experiences were very necessary, but they also taught me a lot about writing, and it's importance, and how it [cross talk 04:26].

*Interviewer:* Okay, so you're going on to grad school, then.

*Interviewee:* I am. I'm actually staying here for the next five years.

*Interviewer:* No way. Congratulations.

Interviewee: Thank you.

*Interviewer:* Will you get to work in the same lab?

*Interviewee:* Yeah, yeah. I'm gonna rotate, but I really enjoy the lab that I'm working in now. It's a great time, so yeah.

Interviewer: Good. Good. You don't even have to move.

Interviewee: I know.

*Interviewer:* You get the summer off?

*Interviewee:* I'm actually—I love researching, so [cross talk 04:46].

Interviewer: You're gonna dive right into the working world then.

*Interviewee:* Yeah, yeah. I looked at a—I mean, I looked at a ton of different places, but U of M [University of Michigan] is definitely my favorite.

*Interviewer:* Good. Good. Well, congratulations on that.

Interviewee: Thank you.

*Interviewer:* Now, when you—well, how would you describe yourself as a writer when you got here? You said that you had a science versus writing mentality.

Interviewee: Right. Definitely. That was just what I picked up as an undergrad. What I've learned through going through the undergrad process is a lot of what we learn as undergrads is not really a reflection of the actual profession, and what the professors do. It's what we've heard from our upper level peers, and so I associated this dichotomy between writing and science. What's really, really funny, I think, about the whole situation is I think writing and reading are intimately tied together, and we read a lot in science. I mean, I read a lot for fun. I've always loved, loved, loved reading. Once I realized that they were married, I realized, okay [laughter], gotta get over that.

*Interviewer:* Got it. Got it. As you think about going forward into graduate school, what are some goals that you have for yourself as a writer?

Interviewee: I really need to be able to develop my thinking so that I can communicate with a broad audience. One of the things that I was talking about was a grant that I applied for, and it's through the NSF, the National Science Foundation. Part of their mission is science and community. We really focus here in academia on being able to communicate with other academics, to communicate in the field. One of my goals also is to be able to communicate with people who aren't necessarily in academia, but need to have access to that vital information. I think that's coming to the forefront of science. We need to be able to

communicate our research with people who don't stare and look at these long ridiculous words every day.

*Interviewer:* I love it. Have you had any opportunity to develop that skill as an undergrad?

Interviewee: Yes. My PI [Principal Investigator] has been totally fantastic. We're actually working—one of my main goals is to bring science to rural communities. I'm from a rural community myself. I actually had the opportunity to present with, and kind of show people from my old high school around the lab situation. Then I was presenting, and writing, and communicating with them in a way that I still had to be able to get what I did across, like the science that I do, and be truthful about that. I also had to do it in such a way that I wasn't making it really, extremely, painfully boring.

*Interviewer:* I love it. How do you characterize the difference between writing science for the people at home versus writing science for other scientists?

Interviewee: At first when I was starting to read papers, I thought scientists used unnecessarily large words to describe things. Then what I found as I started writing was that we have a specific vocabulary, just like any field does, and it's just way easier to communicate in that way. You can use one word to describe what would have to be used as a whole sentence. Now what I'm finding is it's a lot harder to go back the other way, and try and explain what I do, but—I forget who, if it was Einstein? Somebody said something along the lines of if you can't explain it simply, then you don't understand it. I think that that's a great principle to live by in writing and communication.

*Interviewer:* Yeah. It might have been—Einstein is remarkably lucid. I've read some Einstein, and he's pretty easy to read on very difficult things.

*Interviewee:* I think that's so true. If we can't communicate effectively, and if you can't explain it to somebody that doesn't understand it, there's no point.

*Interviewer:* Right. Right. Yeah. As you think about your writing experiences at U of M [University of Michigan], what do you think it means to write well?

Interviewee: I think that the biggest thing I learned—and this is from working in the lab, and not from the writing classes I had. I wish I would have had this more in my writing classes—is that I always associated writing well with writing long, kind of just filling the page from it. The most important documents I've ever had to write have had an extremely short, strict page limit. That is so hard to communicate your ideas in that short amount of space, and get your point across. In classes I think it would have been useful—and this did happen in my upper level science classes when I had to write for those—if there, instead of saying,

okay, you need to write this much, saying you can only write this much, and communicate your ideas effectively.

*Interviewer:* Interesting. Do you think you would have understood the challenge of only writing that much if you hadn't also had the challenge of trying to fill the pages?

Interviewee: That's true. That's a great point. I think in high school I had to fill a page [cross talk 09:38]. I had to write a five paragraph essay. I had to do this, and communicate my ideas in that. You do have some longer documents that you had to write. For example, the thesis I wrote was 49 pages long, and in science that's a long document.

*Interviewer:* In college here?

*Interviewee:* In college, yeah. Each section was super concise. The words that I used had to be written in the same format as if I only had that page limit which I think really, really helped me because I still was writing a long document. I had all the information that I could possibly get in there because it was so concise.

*Interviewer:* Okay. Yeah, that makes a lot of sense. You said that this was something you learned in the lab, and not in the writing courses. Let's look at the writing courses for a second. What upper level writing courses have you taken?

*Interviewee:* That's actually a great question because I took my thesis—the thesis that I wrote was my upper level writing requirement. I only took one writing class when I was here.

*Interviewer:* Okay, and that would have been the first-year writing class?

Interviewee: Yes. Yes.

*Interviewer:* Okay. Was that [English course] or [English 100 level course]?

*Interviewee:* [English course].

Interviewer: [English course]. Okay, and then so your thesis was your upper level

writing.

*Interviewee:* Right.

*Interviewer:* Tell me about the thesis process. How did you decide you wanted to do that? What was the structure of it?

*Interviewee:* Well, that was painful.

*Interviewer: [Laughter]* I'm sorry.

Interviewee: [Laughter] no, no. It was a fantastic experience. My advisor for the lab really likes his students to do honors thesis, and after going through it, I could see why. It's really great to think about your research in that way, and have to do a literature review. From my perspective, if I was going to have to write about something, I wanted it to be something that mattered to me because I knew if I was taking a writing course, there might be an ability to choose something that I was interested in, but ultimately nothing is going to be more interesting, more important to me than my research. When I get to talk about my research for my upper level writing requirement, and develop skills, and kind of a science-type background, it was very—yeah.

*Interviewer:* Yeah. At what point did you decide that you were gonna do a thesis? Was that this year? Last year?

*Interviewee:* Everything happened crazily fast, and kind of in a hectic form for me. [...].

Interviewer: Okay. You started the thesis, then, fall of this past year.

*Interviewee:* I actually didn't start until winter—

*Interviewer:* Winter?

*Interviewee:* - of this year. I had all of my grad school interviews up to the beginning of winter semester, and then I started.

*Interviewer:* Okay, then you started your thesis. Was it direct one-on-one, hands-on work with the advisor?

Interviewee: A lot of it was reading a ton of primary literature, and beating my head against the wall, and doing several drafts, and then sending it to my PI [Principle Investigator]. Then he'd be like, "Well, look at this section. You might wanna try this." He was very, very helpful the whole time. He let me make my own mistakes, and then correct my own mistakes by saying, "This is what you did well. In science we kinda do it this way, so go back and redo it." My first introduction was five pages too long, and so I had to—

*Interviewer:* Yeah. Yeah. How did you get started? Did they give you models for a thesis? Did they—

*Interviewee:* No, they basically said look at a scientific paper, and then model it after that. Then my PI gave me a few copies of previous ones that he had after I had looked through, so I formatted and—kind of how in our lab we format journal articles.

*Interviewer:* Okay, so is the goal, then, to publish the thesis as a journal article?

*Interviewee:* Yes. I'm hoping—it depends on what journal we wanna publish in, where the research would go, but a lot of the backbone for my manuscript is gonna be from my thesis.

*Interviewer:* Okay. Great. Great. That's exciting. How would you say that this has affected this work of doing the thesis? How would you say that this has affected your sense of yourself as a writer? How has it affected your writing even?

*Interviewee:* My deal with writing is I find it very, very useful, and I enjoy what happens as a result of writing.

Interviewer: Uh huh. I get that.

*Interviewee:* Enjoying writing just seemed like a completely false statement to make.

*Interviewer:* I like having written. I don't like—

*Interviewee:* Writing [laughter].

*Interviewer:* - writing [laughter].

Interviewee: There we go. There we go. That's it. I've always been very, very worried about other people reading what I write, very conscious about that, especially because a lot of the books and the publications I read are from very great writers. Like I said, I love reading, and I've read a lot. When I read those writers, then I'm like, oh, well, this is what I've got. It's harder to turn it into other people, but it's given me a little more confidence which is great because I—reading, like I said, reading, and writing, and then communicating all seem really intertwined to me. This summer I'm hopefully going to either be presenting poster 14:46 or talks at two different conferences.

Interviewer: Congratulations.

*Interviewee:* Thank you, thank you. What's really nerve wracking about that is I don't like being in class where I'm standing in front of my peers. I'm standing in front of grad students, post docs and professors. This process of writing and having those same type of people read my writing is really helping me communicating in the spoken forum *[fading voice 15:08]*.

Interviewer: Spoken forum. Yeah, you got it.

Interviewee: There we go.

Interviewer: You got it.

*Interviewee:* There we go. Just in having confidence, and being able to communicate my ideas effectively.

*Interviewer:* Great. Yeah, okay. Think back to [English course] with me for a second, the other writing class that you took. Did that affect your writing at all?

Interviewee: It did give me more confidence than I thought it would. I remember GSI [Graduate Student Instructor] starting out the class with, "This is going to be a typical [University of Michigan] class in that the majority of you are gonna get Cs." Of course, as a freshman at the University of Michigan [extraneous noise 15:40], you hate hearing that. You're like, great. Awesome. I was like, ahh, this is gonna suck so much. Then I ended up getting an A in the class which kind of helped boost my confidence in that I was like, okay, maybe I'm not as bad at this as I thought I was.

*Interviewer:* That's great. That's great. Do you do any writing in any of your other courses in the Microbio [Microbiology] concentration?

*Interviewee:* We have to do writing in the sense of you'll be given a journal article. Then you'll have to summarize it very succinctly, and then show what you learned from that, and what product 16:20 can be brought it. That was pretty typical, but I actually took a philosophy course last semester in bioethics, and—

*Interviewer:* Sounds interesting.

Interviewee: Yeah. I was really surprised because I absolutely loved writing that. I read philosophy, but I absolutely love the ability to read, or excuse me, to write in that form. There's a little more flowy—a little more flowery, too. I didn't really have to be as—I still had to get my ideas across, but I could be a little, I suppose, less choosy with my words which was—I actually had a really fun time writing that paper.

Interviewer: That's great. What did you write about?

*Interviewee*: I actually wrote about kind of a science topic. [...]. That was a lot of fun.

*Interviewer:* Excellent. That's cool. Do you think that writing those short summaries—do you think that changed your writing in any way, or that affected your writing?

Interviewee: I feel like that was pretty par for the course at this point, just getting me comfortable with what I've been used to. The abstract and the philosophy course provided more of a contrast, I think more of a development, because it was a different form of writing. It also helped me reflect upon the way we write in science. Between the two, it showed me how I can communicate effectively when we do talk about—okay, so you're talking to more of a lay audience as opposed to the scientific community in communicating your research. Let's look at different ways to read and write the kind of health of the [cross talk 17:58].

*Interviewer:* Okay, yeah. You said you love philosophy. What kinds of things do you read? This is totally off the protocol, but I'm super interested.

*Interviewee:* Yeah. I'm a nerd, and I read a lot of journal articles which is just in science and all. [...]

Interviewer: [Laughter] I love it. You were destined for academia. I love it. That's great. Have you learned any specific skills or strategies in your writing classes that you use—or in any class where you've written even—that you use in other classes?

Interviewee: I think the most important thing is outlines, writing an outline. I absolutely hate it. I hate writing an outline as opposed to just sitting down, and getting my paper done. I'm like, this is taking so long. When I have to write an important paper, a long paper, whether in science, or for my classes, or any of the other classes, if I sit down, and write an outline, and organize my idea, the paper just flows a lot better.

Interviewer: Much better, okay.

*Interviewee: [Laughter]* it's not as awful.

*Interviewer:* We've already sort of answered this question, but the actual text on my page is thinking back over the last two years, what experiences in and out of the classroom have had an affect on your writing? It sounds like the lab is one of the major out-of-classroom experiences.

Interviewee: Right.

*Interviewer:* Are there any other in-class experiences that you can think of that have impacted your writing?

*Interviewee:* I guess it's happened both in class and in the lab is peer review, how much I appreciate that process. I'm not sure I'm going to appreciate it as much when I have to send in an actual manuscript to be peer reviewed. Sounds a little bit more awful—but also, just receiving feedback on the grant I wrote. Then, as well, it's very nice to sit down—especially with somebody who's kind of your

age, or just a little bit older—and say, "Will you read this" because what we find, even when we discuss science—and I'm sure this is ubiquitous throughout all fields—you think in a very specific way. Your ideas are, while they can be really great, are kind of consistent with your own logic. In writing, I probably write the same way. Then somebody will come in, and they'll read that, and they'll be like, "That doesn't make any sense." "That makes a lot of sense. I don't know what you're talking about." Then when you go back and read it—so that, I think, is the most important lesson I've learned in the classroom because we were forced to do that in [English course]. Then I actually picked up on that, and I was like, wow, that's helpful.

With my thesis, I mean despite the fact that I had my PI [Principle Investigator] reading it, and then also other people in the lab reading it, I got a group of my friends together. I bought them dinner, and I was like, "Will you read this?" They're like, "I guess." They read it, and I got some really great feedback

*Interviewer:* Good. That's really cool. Did you have to use peer review in any of your other classes?

Interviewee: I didn't have to, but I chose to. I would get a group of people together. I'm like, "Do you wanna sit down and read each other's papers," just because it also helps with your confidence before you turn it in. Your eyes have seen it, and then your professor's eyes have seen it. It's nice if you're like, "Okay, can you read this? Did I make any stupid little mistakes?" To see what—you could reread something like a hundred different times, and miss that simple little—

*Interviewer:* Yeah, it's crazy.

*Interviewee:* Exactly. That little—because our brains are trained that way, and so it's very helpful.

*Interviewer:* Yeah. Okay, so you would get the other folks in your class together, and you would all—

*Interviewee:* Right. It's kind of—I figured in a lot of science classes, you form study groups because you study well with other people. It makes sense to do the same thing with the papers.

*Interviewer:* Absolutely. The logic is right on there. Would you say that your writing process has changed at all as a result of these experiences?

*Interviewee:* I think I spend a little less time hating it at the beginning, which saves time [laughter], so—

Interviewer: That's amazing.

*Interviewee:* - I mean, I do spend a little time sitting there. I call it the contemplation phase. I save time there, and then I also do the outline which saves time.

*Interviewer:* Yeah. Okay. Sure. If I were to use the term "reflective writing," would that—what does that mean to you?

Interviewee: I see all writing as reflective writing. Maybe it's just based on my experience, but if I were to talk about my thesis, it's reflective upon the work that I've done. If I were to talk about experiences that I've had, that would be reflective. Even if I were to—for example, in philosophy when I was talking, it was upon reflection of thoughts that I've had. If I were to talk about my future, it would have to be based upon thoughts that I've had, experiences that I've had. I think in all sense writing is very reflective of your past experiences, whether you're writing about them in the past sense or not.

*Interviewer:* Are you someone who will process on your own? Do you process your reflection in writing?

*Interviewee:* Yes. Yes. I think that's why it's so helpful to me because I can look at, oh, look at this process that I wanna do. Sometimes we forget to reflect. We forget where we started, and writing forces us to do that. When we sit down, we have to go through the whole process. Even if we don't write about stage zero, and we skip right to stage one or stage two, you have to think about stage zero in the writing process. It was very helpful for me, at least in my science, and also kind of in life.

Interviewer: Good. Good. Have you ever used writing to reflect on your writing?

*Interviewee:* I have never used writing to reflect on my writing which is—I've used it to reflect on my life, for catharsis, I guess. Just nothing that was due, or just kind of write, which has been fun. I've never used it to reflect on my actual writing.

*Interviewer:* Okay, so that wasn't something that your [English course] asked of you, or anything like that?

*Interviewee:* Well, this is a long time ago [cross talk 24:54].

*Interviewer:* I was gonna say, I'm diggin' way back.

Interviewee: I think we might have had to write one of our papers about our previous papers. That was—I think we had to write at the end of the year a paper on the first paper we wrote. I think that that's always an interesting experience because, at least any time I write something, if I go back and read it, like a month

later, I'm like, "What was I thinking? [Laughter] what was that?" I think that writing can always be improved, and so you're never gonna have a draft where you're completely satisfied with it. I think that's a good thing, otherwise you're not gonna move forward.

*Interviewer:* Right. Yeah, that is that you never step in the same river twice. You're a different person the next time you return to that writing again, so—

*Interviewee:* Right. Exactly. If I were to read some of the things I submitted earlier for the study, I would probably cringes. I'm not gonna do that.

Interviewer: You're gonna let it go?

Interviewee: Yeah, I am.

Interviewer: What's your experience been like getting feedback from your PI?

Interviewee: It has been so transformative. Very, very helpful. I mean, he is a fantastic, fantastic guy. I couldn't speak more highly of him. It's been kind of—he hasn't told me directly on little things, right? "Do I need to fix this?" "You need to fix this. You need to do this." If something needs to be reformatted, or he's, "Consider looking at it from this approach."—I think in science, and I'm sure in other fields, it's very, very helpful because you realize that you've done something that you haven't communicated in an effective way. We haven't done it right, but you're not told how to do it, so you don't automatically pick up on somebody else's style, and make that your own. You still have to form it in such a way that it's your own style, but that you can communicate it in a more effective way with the person that's reading it. He did that throughout the entire process, and it was very, very, very helpful.

*Interviewer:* Okay, yeah. Have you done any collaborative writing?

Interviewee: I haven't, but I can definitely see that being a part of something that'll definitely be a part of my future. I'm interested in a lot of science techniques that employ a lot of physics, and I really hate physics. I'm gonna have to work with other people if I wanna address 27:09 my science. Then we're gonna have to write that together. I can see that in the lab. The graduate student that I've worked with is actually working with some people in biophysics, and they're writing together.

*Interviewer:* Okay, while it's not something you've done in the lab, you're watching other people in your lab.

*Interviewee:* Right. I could see how challenging it is, especially if you're coming from two different fields in science. As biologists, we think that the biology perspective is very important. We know what's important for other biologists to

read, and what they think. From the physics standpoint, they're like, "We've got this number here. The number is solved. The equation is set. We're good." At least, that's how we perceive their side. We're like, "But the number is not of biological relevance unless we put it in this framework." You see that back and forth. Of course, both parties really respect each other. Both care about the research. Both really care about the manuscript, but we're coming from two different backgrounds. You've got writing that's really important there, and then you've also got communication that's key.

*Interviewer:* Yeah, different ways of, yeah, interpreting, making sense of that data, what do you with it. Yeah.

*Interviewee:* Exactly. What's important from this? What are we trying to convey to our readers? You have different audiences there. Are we talking to biophysicists? Are we talking to molecular biologists?

*Interviewer:* Right. Sure, sure. Okay. Now that you're about to graduate, what advice would you give incoming students as they start their writing?

Interviewee: I guess the advice that I would give them is the advice that I'd give them in any sense, not just writing. I would tell them to not focus on the grade. My problem with academia is that we're all—and when I use the term we, I'm just collectively referring to academia—focused on marking things. What is this grade, what is that? In writing, writing's a reflection of thinking, in my opinion. I think that the most effective way to communicate, and the most effective way to write, aren't the same for everyone. We can't put everybody in a box, and we can't assess that box in the same way. I would encourage them to read broadly, to write broadly, to try different techniques, and, most importantly, to not be afraid of failure. We all think that an F is a bad thing. It means that you failed. You've done something really wrong. I think that, and I hope that, in my lifetime I see a switch in academia where failure is like, "Oh, that didn't work." That happens all the time in the lab. "That didn't work." That doesn't mean that you're a bad writer. It doesn't mean that you're a bad scientist. It doesn't mean that you can't think. It means you looked at something different, right? I would encourage them, if they do get bad grades, to not worry about that. Don't worry about—it doesn't mean you're a bad writer. It means that you need to look at it and say, "Oh, something didn't work that time. Let's do that differently."

*Interviewer:* Right. How do I do it differently? Yeah, yeah. Instead of internalizing it to have it mean something about who you are, to keep things externalized on the work being done.

*Interviewee:* Right. Exactly. Instead of trying to, say, let it label you, let it define you, that that mark say what your abilities are, just realize that you took an approach. Good for you for going out there and taking an approach. Take a different approach next time.

*Interviewer:* Absolutely. Absolutely. What was it in your experience that taught you this?

*Interviewee:* Like I said, I really was not a fan of academia for the beginning portion of my career. [...].

Interviewer: Really? Okay.

Interviewee: Yeah. It wasn't until I joined the lab. Then I realized how awesome and important failure was because I've never learned more than when I fail. It's so frustrating. It sucks so much. You're sitting there like, "Are you kidding me? How did that not work? That was a brilliant idea." I can't see life going the way that we've structured it in the school-type setting where there's As, and there's Bs, and there's Cs, and there's Ds. There's failure—because you're gonna run into failure all the time in life. You can probably avoid it in academia—but the thing is, if you're truly in it, I don't think you can avoid it. That's the lesson that I learned in research.

*Interviewer:* Yeah. Yeah. Can I ask, and this may be a little personal, and so tell me no if—

Interviewee: No, it's fine.

*Interviewer:* I'm curious as to what was so difficult in the first couple of years.

Interviewee: Yeah, so I'm from a really small rural community. Coming to Ann Arbor was a huge culture shock for me just in the sense that I had a very juvenile way of thinking. In high school I was a big fish in a small pond. [...]. I was very fed up with the system. Then that kind of transformed into this thinking, well, they're just trying to gauge my thinking based on standardized tests, and all this. I've always hated standardized tests. Then I got fed up, and gave up. Then I just started reading. I just read everything I could get my hands on in science. Then when it came to my junior year, I started taking microbiology classes. It was crazy to me because people were taking these exams, and they had studied out of the book a lot. I was like—I just knew the answers because they came out of the primary research, and all the books that I had read—

*Interviewer:* That you had been reading.

*Interviewee*: Yeah. That's when I was like, wow, this could work.

*Interviewer:* Interesting. Yeah, yeah. Interesting. It's almost like you got out of the social mill and into the actual scholarly stuff, and found a home.

*Interviewee*: Oh yeah, definitely. I just got into primary literature. I learned how to use the web site we have for [Shapiro Undergraduate Library]. Then I later found NCBI [National Center for Biotechnology Information], and I just pulled off papers. Read left and right. It was—

Interviewer: So cool.

Interviewee: Yeah, it was cool.

*Interviewer:* That's great. Have you had any experiences with new media writing, so stuff like blogs, websites, an electronic portfolio, anything like that?

*Interviewee:* I haven't. [...]. I like to read [my sister's] blog. I do that, but I haven't really done that so much.

*Interviewer:* Okay. Do you see that as playing a role in science writing at all?

Interviewee: I could see it if you could have a blog that's interesting enough. Then that comes down again to something that—communicating effectively. Making it interesting because—I mean, I think at it's fundamental core, science is fascinating, but maybe that's just because it's what I love. I would love to be able to share—people don't understand why I get excited, and I'd love to be able to share why I get excited, you know? I think maybe a blog, or something like that, is the way to do that.

Interviewer: Yeah, yeah. It's interesting. I've been working with some students this semester. We've been having some of these conversations, like the way that images can shift things, or the ways that Vine videos—where you speed things up, and you can see processes go quick, quick, quick, or whatever. Those things can be really interesting, and potentially helpful. Yeah, but that's not something that you've seen your PI [Principle Investigator], or the labs, or even your classes emphasize, then, I take it.

Interviewee: No, but I would definitely—what surprised me most when I get into academia is how open-minded people are. There are some close-minded people, but what I love about working with my PI is that he's super open-minded. I could see him willing to make that shift. I could see it kind of—like I've said, I hate physics. I really—I detest it, but I could really see my physics professor and the department trying new techniques. They would put a lot of demos, and incorporate those into our class. I was like, "Yeah, like blow it up. Let's see it." I was excited about physics [laughter]. I think moving into those different types of media, yeah—

*Interviewer:* Has a purpose.

Interviewee: Yeah.

Interviewer: Alright. Alright. [...]—when did you join this study, at what point—

Interviewee: I think it was freshman year.

Interviewer: Freshman year?

Interviewee: Yeah.

*Interviewer:* Okay. You've been uploading pieces of writing to the study archive on C-Tools [learning management system].

Interviewee: Yes.

Interviewer: What's your experience been with that?

Interviewee: It has never been—I always like seeing it up there, especially because a lot of the pieces I've done—I think it's really interesting if you were to look through the transformation because they definitely get harder in science. At the beginning I submit my first year writing sample, and then this other paper that I didn't really care about, but then another one that I was caring about. Then when you get to the end, they're the pieces that I—my final submission was my thesis—

*Interviewer:* It was?

Interviewee: - there's—yeah. There's not hardly any piece of writing that I would care more about than I do—like I spent more time because it's not just the writing, it's all of my research I've done. It's interesting in the respect of, as you go down that list, it's become—you can see writing becoming more significant in what I'm doing. You can definitely, I hope, see that I care more what I'm writing about, and the way that I can communicate most effectively, and be a good writer.

*Interviewer:* Right. You chose what you would put up there, then, based largely on what you cared most about.

Interviewee: Right. My first couple of semesters I was like, it's a writing assignment. There you go. It's another writing assignment. There you go. Towards the end, I was like, this meant a lot. This was the writing assignment—so, yeah.

*Interviewer*: Yeah, so if we were to look at that, we would be able to get a sense of how you understand what's most important to you over the years.

*Interviewee*: Right, yeah. I would definitely hope so. I think you can definitely see at the beginning that they're just some pieces that I wrote, and that I received

good marks on. It's like, alright, let's put those up there. Whereas at the end, I wasn't concerned about the marks. I was like, this is something I feel passionately about, and you can see that reflected in my writing.

*Interviewer:* Yeah. Did you upload anything that got a lower grade, but that you were excited about?

*Interviewee:* My writing experience has been good in the fact that I haven't really received awful marks on any of my writing, and so that will just—

*Interviewer:* Yeah, yeah. Okay. Okay. Yeah, so maybe not the thing that was like technically perfect, or whatever, but nonetheless that you were really pleased with the ideas.

*Interviewee:* Right, right. I uploaded a philosophy paper, the philosophy paper I wrote about vaccines. I mean, that could have improved in scientific format, and I think from a philosophical aspect I could have gone deeper in some respects, but I wanted to upload it because I was like, "Ahh, this was fun. You know, I had a good time writing this. It's a cool topic. It's cool to write this way."

Interviewer: Yeah, totally. That's great. Did you look at any of your old papers?

Interviewee: No. No. I actually made the mistake of—the grant that I wrote for was the MSI [Master of Science in Information] Fellowship—and I made the mistake of going back and reading that after I had submitted it after a couple of months. I was like, oh my gosh, I am so sorry. Why? Then I heard back, and I received the fellowship. I read it again, and I was like, oh, it's not that bad. [Laughter] I'm like, oh, yeah, it still is. Still is.

*Interviewer:* Isn't that good to know, that you're not crazy about it, and you still got the grant.

Interviewee: Yes [laughter].

*Interviewer:* [Laughter] which just goes back to your point, that nothing is ever perfect, and there's always a way to improve it. We are our own worst critic [cross talk 40:04].

*Interviewee:* I think that's fantastic, though. I think that's an important thing because if you're not critical about your work, I think in some respects it's just that you don't care, you know?

Interviewer: Yeah.

*Interviewee:* If you don't care about moving forward—if I read something, even if it was stellar when I wrote it like a month or two ago, if I'm not in a new place

where I can read that and say, "What were you thinking," then I've clearly not made any progress as an academic, and so—

*Interviewer*: Yeah, yeah. What do you think—one of the things that you mentioned that you would have liked to have had in more of your writing classes was the limited page numbers. Are there other things that you would like faculty to know about teaching writing?

*Interviewee*: Yeah. I guess this would go back to the advice that I would like to give people. I'm young, so I'm idealistic, and it's allowed. I would like to see a transformation of the education system where we find a way to get rid of grades—

Interviewer: Oh, preach. Yeah.

Interviewee: Yeah. We stop worrying about that because I think everybody has a lot to offer. We have a lot to offer because we have different perspectives. We're different people. I feel like the University of Michigan does a great job of expressing that, and saying that that's what we want. We do a good job with that in the social aspect, but from the academic aspect, I feel like we do a very poor job of that. We set up very rigorous A B C D system, and then we try and put people into those different boxes. I know it's difficult, but I think there's a lot of bright minds on this campus. We can find a way to get rid of that system, and really try and evaluate people based on ideas and—yeah, perspective, I suppose.

*Interviewer:* Okay, okay. Yeah. Great. Those are actually all of my questions. Has this jogged anything for you about writing, or writing at [University of Michigan], that you would like us to know that I haven't asked you about?

Interviewee: Nothing particularly. I think this writing experience for me has been very—it's been a very good one. I didn't expect that when I signed up as a freshman, but you go through so much in those four years that you don't expect to go to. I guess the most important lesson it taught me is that I still have a lot to learn yet, right?

Interviewer: Yeah. Yeah.

*Interviewee*: Looking back at myself four years from now I'm gonna chuckle.

*Interviewer:* [Laughter] it's so true. It's so true. Yeah. Yeah.

*Interviewee*: Yeah, it is. I mean, I've really enjoyed the experience, and I think I got a lot out of it. It's been fun to be a part of it.

*Interviewer:* Good. Yeah. [...].

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[...]
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Interviewer: That's great. Well, thanks so much for sharing your—

Interviewee: Oh, thank you.

Interviewer: - experiences with us, and good luck with your lab.

Interviewee: Thank you. Fantastic. [...].

Interviewer: Thank you.

[...].

[End of Audio]