

APRENDICES 3 - DESGRABACIÓN EN INGLÉS

Paula Martinez

<https://www.youtube.com/watch?v=0C3LL0dymCE>

INTRO

I knew from high school that I wanted to do something related to engineering.

What formal academic training gives you, above all, is the ability to learn, the ability to think critically, to work on new things.

Mixing disciplines and knowledge is super important and it also implies that we can work with other people, that we work as a team, that is essential.

You have to keep going, you have to keep moving forward, you have to keep building things.

PREVIA

That's a lot of things. I don't know how you find what you need there.

Ah, because I already know this by heart.

Close your eyes.

Later on set it'll be looking at you and we can touch anything up, especially the brightness.

Come, Paula.

Aprendices

OK.

How nice everything is.

Welcome.

Hi, how are you?

Welcome.

How are you, Paula?

Hello.

All good?

All good.

How did they treat you?

Good, good, super great.

You see it's very intimate, you can see the stage there.

And the program deals with the learning experiences that one has had in life, beyond the educational system. Beyond the grades, the titles, and what one has studied as a career, you know?

Perfect.

There is a question that we have as a guideline, which we do as a rule, which is: How do you define yourself? With that we always start the conversation.

Well, good. Excellent, excellent.

Thanks for the welcome.

Let's go down.

There it is.

CHARLA

Well, I think that I define myself in several ways, or as a set of features perhaps, really. I think I am an optimistic person. I tend to think that things will turn out well, that they'll come to be, that the result will be good, which is something that also motivates me to pursue objectives, to take certain risks, that kind of thing.

I also think that I am an analytical person. Using the information that is available, I like to analyze it, to understand what ramifications it has, what impact it has, but at the same time also trying to be practical because if not, that can also paralyze us sometimes and I think that you have to learn to not let it happen.

And one thing that also happened to me over the years, with my professional experience, is that I realized that I really like working with people. I like to see how teams are created, how people evolve, how they grow. The whole subject of interpersonal ties interests me a lot. It is a part that I also enjoy a lot in my work.

And another thing that I also enjoy a lot, especially also in my current role, as an entrepreneur, is the adaptability that you need to have, the ability to adapt to different roles, to be able to wear different hats. To suddenly be in a situation where you have to make a sale; or talk to a person and give them feedback; or discuss finances. I think that is also something that has helped me grow a lot in different aspects.

How did this Paula who likes teamwork and undertaking get established? You define yourself as an entrepreneur in some way.

I think it's all a set of experiences. I think that since high school I knew that I wanted to do something related to engineering. Perhaps in high school, or in the early stages of high school, I wasn't sure which type of engineering, but I knew that I liked mathematics, physics, the hard

Aprendices

sciences, to sum up. I knew that I liked that and also had a knack for it. I knew I was on that side of the road, so to speak.

Actually, when I finished high school I said, "Well, I'm going to the Engineering Faculty", even though I didn't know the exact career. I ended up doing Electrical Engineering. Actually, it was like a mixture of several things, which is why it caught my attention a bit. And the truth is that it was a very nice career, it was a stage that I really enjoyed. I learned a lot of things, I made friends. The truth is that it was a super comforting stage in that sense.

And so I started working there, first in technical roles, then with Plan Ceibal. I think that I also had the luck or the opportunities to lead projects, lead teams, at an early age. So I think that this also gave me tools, all those experiences. Tools for later in the future to be able to do things with more responsibility, lead larger teams, lead more complex processes. Until eventually one day I decided I wanted to be an entrepreneur too and take that to the next level somehow.

Even in my house my parents always had a company, so that also showed me a reality, a possibility of what could be done. Something that is possible, that can be done and that is among the alternatives that you have in your professional development. So I think it was also something that encouraged me. I think it's good for other people to see that this can be done, that these are viable things, that it is an alternative like any other.

So I think that's it, ultimately. A sum of things, without a doubt.

Paula, since those first years, which I imagine look like a long time ago from a distance, from those early years until now, what has changed, shall we say, in your professional work?

Everything.

Let's see, in the first years I started in technical roles where perhaps the contribution is more individual, that is, you have to solve certain tasks, learn about certain topics, investigate, or do technical tasks that you have to develop.

Aprendices

So, those first years helped me to learn a lot of technical things and to insert myself, let's say, in the job market, acquiring professional experience. After a few years in those kinds of roles, I started to have more project management roles, for example, then team management and process management.

So, I think that there you develop other types of skills and it's a different job, in a sense. It stops being an individual contribution because you actually don't make so much of an individual contribution, but you do have to set the climate, the tools, everything, so that other people can continue developing.

So I think that's also a paradigm shift and it is a super experiential thing. It's hard, sometimes. There are courses, there are a lot of things, but I think that the experience itself, having the opportunity to experience it, to make decisions, make mistakes, correct them... All those kinds of things also give you tools that you'll use your whole life, it seems to me.

One has this idea from the outside, a prejudice perhaps, that electrical engineers involve themselves in a solitary task with the devices. A Paula interacting with a device. How much of that is prejudice and how much is it actually something else?

I believe that teamwork, actually, today, in any of these disciplines, is essential. Because they are complex things, many times they are large, complex systems.

Even speaking of software development, for example, in systems engineering, like you mentioned, it is a team that works, with different roles, even with different knowledge and specialties. Then all of a sudden there's a person programming something, and another that does the quality control, another that does the project management, another that talks with the client and understands what the needs are and then communicates it to the team. There are many roles being juggled and it is necessary to be able to coordinate that.

Aprendices

So, I think this is all a team effort, without a doubt. The kind of job that is solitary and more isolated, I think that there are people who like to work in this mode, but today it is really difficult to work so isolated and not as part of a team. The development of technology itself also leads a bit to that because things keep getting bigger and also grow much more. I think that in this sense, working with peers or with people from other disciplines makes us learn new things, makes us grow as people.

So, I think that in this sense technology is good in that allows for people with very different profiles. From developers, designers, management, quality control, there really is space and opportunities for very varied profiles. I think that is also an opportunity that we can take advantage of.

We see new AIs being developed every day. The educational world has activated some alarms, right? First, how do you see the arrival of artificial intelligence? Do you see it as an opportunity for education?

Going back to the first part of the question you asked me. I believe that in artificial intelligence, in machine learning, a particular thing happens which isn't true for all disciplines, and it is that the industry and the academy are working closely together. So, that makes people with doctorates, postdocs, people very trained in these subjects, sometimes go work in the industry, in industry research groups, and develop applications, innovations, or whatever, that pass very quickly onto the industry. So I think that is what is happening in this field. It has been advancing very quickly, and those more academic or scientific advances move very quickly to the commercial industry in applications that we see every day around us. I think that is the peculiar thing, and it has been advancing very quickly. Things that couldn't be done six months ago are possible today. So you have to keep up-to-date on all this.

What has also happened in recent times is that some things have become popular, on a more general level, so that they're not a niche thing anymore, so that we're kind of waking up and saying: "Wait, I could apply this in several ways to what I'm doing, maybe it's not really that far from having a concrete application in my industry or in my work". So I think we are at a crucial moment in that sense. We are actually being bombarded with a lot of new things and so on. We are beginning to say: "Wait, how is this going

Aprendices

to affect me? Where am I going to be able to apply this?" So I think that in that sense there is a great opportunity to improve a lot of things, of customizing a lot of services, of improving the way we do things, basically.

And I believe that a time of strong automation is coming, of a lot of personalization as well. I think that you have to try to take advantage of that, make it something positive, something that helps. In education, make it so that students truly learn and that they have an experience that is attractive, that amuses them, that helps them to develop. So I think that the challenge we have is precisely how to apply it well. How to use it to meet our needs. This obviously has certain risks, certain risks in terms of privacy, in ethical terms too. There are a lot of things to tackle, aren't there? But there is a great opportunity to bring that to each field of application, to really improve how we are doing things and to bring us a benefit.

For example, when we give students tasks to find information, it's no longer a Google search, but maybe it's heading to some chat. That has been changing, hasn't it?

I remember when I was a girl and went to school that we had magazines that came with the newspaper and that you took info from there for every subject you were studying and so on. Later that became more of an internet or digital search. That has been evolving, it has been changing. I think we have also been adapting and understanding how to use those tools. Since the introduction of computers, for example with Plan Ceibal, the ceibalitas in schools, that is also something that changed. I also believe that this change is here to stay. These changes will not be reverted.

You are a woman, an entrepreneur from a small country, Uruguay. Are you aware of your role and the importance of having a Uruguayan female entrepreneur participating in these communities? I mean for younger generations.

Having a company, having a startup, being an entrepreneur, is a bit of a roller coaster. Obviously, you always try to move forward. There are things

Aprendices

that go extremely well and others that you hope will turn out well but don't. I think that in this sense the important thing is to move forward, have perseverance, be convinced of what you are doing. In that sense, how I understand it is: we have to move forward, we have to keep moving forward, you have to keep building things. I think I see it that way, you know? I think being in Uruguay has some disadvantages, of course. The Uruguayan market is small, but that is also an advantage because companies are born knowing that they have to export, because the market is small and that affects the very conception of the company, how you deal with things, from the beginning, how you structure the company, in terms of exportation. So that opens up a much bigger picture for you.

So I think that it is a disadvantage, yes, Uruguay being a small country, with a small market and so on, but maybe you can also use it as an advantage, in that it opens up the possibilities, knowing that you have to go outside and you have to... And this is also an alternative, a possibility, that you can have a small company that exports and is connected to the world. I think, in that sense, we must try to use the advantages of Uruguay. For example, in Uruguay we all know each other, we know that very well. And so you can make it, you're just an email away, a reference or whatever, away, of talking to someone who is working in a field similar to yours, who has done fabulous things and who can help you on your way. I think that happens here in Uruguay, because it is so small, and it's a very good thing that you can get a lot of use out of. Those are simply the circumstances given to us. And, well, I think you have to use it to your advantage.

I wanted to ask you how would you like for this conversation, considering your experience in the educational system, and your experience undertaking different activities, though they may seem dissimilar, when one actually begins to order them, they are related.

How would you like for this conversation, for your experience to set an example in the classroom, in a school?

I think what sometimes happens is that not much is known about these things. Women in technology or women entrepreneurs in Uruguay. I think

Aprendices

that these things, and maybe there aren't many of them, these experiences are not widely known. So I think it's very important to set examples. For more women to go into technology, there have to be more examples of women who went that way, who did well and it wasn't the end of the world and they can identify with them. I think that with entrepreneurship the same thing is true, right? So, being able to have people as an example and in the future also a network of contacts, of people, offering contention and support is super important.

I think the best thing is being able to set that example, to have that network and access to it all. I think that's one of the most important things and they can help you at any stage of the way.

What do you recommend? Thinking of other Paulas out there at school, in high school, in the early stages of college. What do you recommend teachers to do so that there may be more Paulas sitting here one day defining themselves as entrepreneurs?

The path of entrepreneurship obviously has a lot of high points and it is great, with a lot of learning, above all. It is also a path where you have to cope with frustration, you know? Because not everything goes as you expected. There are things that don't even depend specifically on you. So, I think being able to tolerate frustration and getting over it, saying, "Okay, this went wrong, but it is what it is and I'll move on to the next thing I have to do". I think that this is a very important thing to work on. You have to get used to the fact that it is like that and try to let it affect you as little as possible.

Then there's the issue of the constant learning and reinventing yourself in some way. I think that in my career I have reinvented myself several times. Like I was telling you, when you are an entrepreneur, you have different roles and wear different hats and you have to attend to really varied things. So I think that being able to reinvent oneself, having the ability to learn, showing curiosity for what's new, getting involved, dedicating yourself and choosing which path to follow, are all very important.

Aprendices

I think that, especially from now on, looking to the future, we are all going to end up reinventing ourselves several times in our professional careers. That is going to be very important. Not being afraid of that, but daring ourselves to have the ability to learn a new topic, to get into such topics. I think these things are fundamental for us to develop as people.