

Spinoff research short interview [2023-05-12], Ahmad Gharanjik

[transcript]

0:0:0.0 --> 0:0:5.740

Christian FISCH

So thank you very much amount for for sitting down with me. I've just started the the recording.

0:0:6.700 --> 0:0:13.990

Christian FISCH

The questions that I'm going to ask to you are very basic. Can you first give a please a brief introduction of you and your com?

0:0:15.150 --> 0:0:32.390

Ahmad (Guest)

Uh, so yeah. My name is Ahmad gharanjik. I'm originally from Iran. I came to look some work in 2012 to do my PhD at University of Luxembourg, Snt and also KTH. So it was a double degree program.

0:0:40.900 --> 0:0:41.190

Christian FISCH

Umm.

0:0:34.30 --> 0:1:2.720

Ahmad (Guest)

And yeah, I also started the company spinoff from University of Luxembourg Databourg, so it's a data analytic company and we develop a new way for rainfall monitoring using existing satellite infrastructure. So using this approach we can provide very affordable and scalable rain data in real time to.

0:1:3.160 --> 0:1:5.220

Ahmad (Guest)

Underdeveloped countries?

0:1:7.300 --> 0:1:7.630

Ahmad (Guest)

Yeah.

0:1:5.760 --> 0:1:11.980

Christian FISCH

It's super interesting. Um, can you describe how the idea for that came up?

0:1:18.870 --> 0:1:19.190

Christian FISCH

Umm.

0:1:13.400 --> 0:1:20.890

Ahmad (Guest)

So the original idea started during my PhD. Actually PhD research. So one of the.

0:1:32.870 --> 0:1:33.200

Christian FISCH

Mm-hmm.

0:1:22.130 --> 0:1:37.380

Ahmad (Guest)

PhD topics. My PhD topics was to investigate how we can reduce impact of rain on communication satellite system. So one of the main issues for.

0:1:41.870 --> 0:1:42.410

Christian FISCH

Umm.

0:1:43.950 --> 0:1:44.490

Christian FISCH

Umm.

0:1:38.860 --> 0:1:47.650

Ahmad (Guest)

Satellite communication is rain, so when there is a rain, this quality of the satellite links or wireless links.

0:1:47.730 --> 0:1:51.140

Ahmad (Guest)

Uh drops, right decreases.

0:1:51.870 --> 0:1:59.540

Ahmad (Guest)

And then I realized that there is a high correlation between satellite signal quality and rain intensity.

0:2:0.700 --> 0:2:2.360

Ahmad (Guest)

Right. And I said.

0:2:3.340 --> 0:2:16.610

Ahmad (Guest)

The why not we use actually this kind of do reverse engineering and instead of so trying to reduce the the remove the impact of rain we actually.

0:2:17.330 --> 0:2:23.200

Ahmad (Guest)

And extract information about rain intensity from signal quality.

0:2:23.610 --> 0:2:23.940

Christian FISCH

Mm-hmm.

0:2:25.50 --> 0:2:26.190

Christian FISCH

That's super cool.

0:2:28.530 --> 0:2:28.950

Christian FISCH

Mm-hmm.

0:2:34.700 --> 0:2:35.40

Christian FISCH

Mm-hmm.

0:2:39.610 --> 0:2:40.100

Christian FISCH

Mm-hmm.

0:2:43.630 --> 0:2:43.990

Christian FISCH

Mm-hmm.

0:2:26.400 --> 0:2:45.350

Ahmad (Guest)

Yeah. So this is the original idea. And then we saw that there is a potential for commercialization and then we start, we decided to investigate more. And then yeah then when after doing the proof of concept, we start with the company and then?

0:2:45.290 --> 0:2:50.460

Christian FISCH

When did you start the company in which years was after you finished your PhD? D or during your PhD?

0:2:51.40 --> 0:2:55.420

Ahmad (Guest)

No, it's it was after actually my post doc. So I finished my.

0:2:58.530 --> 0:2:59.240

Ahmad (Guest)

Yeah. So.

0:3:1.790 --> 0:3:2.930

Ahmad (Guest)

Yeah, actually, yeah.

0:3:4.500 --> 0:3:4.680

Ahmad (Guest)

Yeah.

0:2:55.100 --> 0:3:9.340

Christian FISCH

I you did PhD in Luxembourg Post talk in Luxembourg and then spun out the company, but the idea came in your PhD already. OK, so long time in the making. Cool. Very cool. Did you also in your post doc base work on this idea?

0:3:14.280 --> 0:3:14.630

Christian FISCH

Nice.

0:3:17.100 --> 0:3:17.430

Christian FISCH

Umm.

0:3:9.620 --> 0:3:24.900

Ahmad (Guest)

Yeah, actually the main work started during my postdoc. So during my PhD I couldn't work on this project because it was not directly relevant to my PhD. But the idea started during my PhD, right?

0:3:32.500 --> 0:3:33.70

Ahmad (Guest)

Yeah.

0:3:24.40 --> 0:3:35.180

Christian FISCH

OK, cool. What was the initial? I'm so I do research in entrepreneurship in one of the main questions is composition of founder teams. So my next question is, what was the team?

0:3:35.830 --> 0:3:37.620

Christian FISCH

That started the company like.

0:3:38.640 --> 0:3:39.60

Ahmad (Guest)

So.

0:3:38.360 --> 0:3:41.70

Christian FISCH

Was at university people also from outside.

0:3:41.940 --> 0:3:42.670

Ahmad (Guest)

So.

0:3:42.300 --> 0:3:43.250

Christian FISCH

Did you do the alone?

0:3:43.660 --> 0:3:45.670

Ahmad (Guest)

I was alone but.

0:3:45.560 --> 0:3:45.890

Christian FISCH

Oh.

0:3:46.410 --> 0:3:47.980

Ahmad (Guest)

Uh, yeah, the.

0:3:52.510 --> 0:3:52.820

Christian FISCH

Mm-hmm.

0:3:54.490 --> 0:3:54.700

Christian FISCH

Mm-hmm.

0:3:48.760 --> 0:3:56.220

Ahmad (Guest)

But the the Pavani Shankar, my Co supervisor, also was involved in the project.

0:3:56.620 --> 0:3:56.910

Christian FISCH

Mm-hmm.

0:3:57.100 --> 0:3:59.390

Ahmad (Guest)

So he was the.

0:4:0.310 --> 0:4:1.200

Ahmad (Guest)

Umm.

0:4:7.780 --> 0:4:8.140

Christian FISCH

Umm.

0:4:2.370 --> 0:4:9.100

Ahmad (Guest)

Principal investigator of the the of the research project that we.

0:4:9.920 --> 0:4:11.650

Ahmad (Guest)

Developed during the.

0:4:12.520 --> 0:4:17.520

Ahmad (Guest)

Uh my postdoc and I was the researcher on this project, so.

0:4:21.490 --> 0:4:22.320

Christian FISCH

Yeah, sure, sure.

0:4:18.800 --> 0:4:27.900

Ahmad (Guest)

Maybe I can give you more information that after my PhD actually we submitted for a apply for a proof of concept.

0:4:28.30 --> 0:4:28.430

Christian FISCH

Mm-hmm.

0:4:32.670 --> 0:4:33.40

Christian FISCH

Mm-hmm.

0:4:36.940 --> 0:4:38.10

Christian FISCH

Umm it?

0:4:29.60 --> 0:4:39.730

Ahmad (Guest)

And for FNR it was to develop our algorithm our system to make it close to commercialization.

0:4:39.930 --> 0:4:54.940

Christian FISCH

It just to to to make it more concrete proof of concept SNR is to get funding for the development of proof of concept phases, right? And this is provided by the National Research Agency of Luxembourg. What is the sum that you can receive from proof of concept?

0:4:56.880 --> 0:5:1.250

Ahmad (Guest)

At that time was around 250K for two years, but.

0:4:59.480 --> 0:5:2.630

Christian FISCH

OK, great. I think it's similar today.

0:5:3.320 --> 0:5:3.530

Christian FISCH

Yeah.

0:5:10.60 --> 0:5:10.370

Christian FISCH

Mm-hmm.

0:5:2.930 --> 0:5:11.400

Ahmad (Guest)

Now it's I think there is it. It has two parts, so one part is called Bridge and then it's John I guess.

0:5:13.270 --> 0:5:15.330

Ahmad (Guest)

But before it was altogether.

0:5:11.350 --> 0:5:19.180

Christian FISCH

Ah, yeah, yeah, yeah, you're right. So this. Ah, OK, Now I understand. OK, this this has turned into that. OK, cool.

0:5:19.10 --> 0:5:19.630

Ahmad (Guest)

Yeah, yeah.

0:5:20.580 --> 0:5:29.340

Christian FISCH

So it was initially you and then did the. How did people join? Did you, did you hire a call? Did you find call founders or did you just hire employees?

0:5:29.710 --> 0:5:31.120

Ahmad (Guest)

Now I started alone.

0:5:31.330 --> 0:5:31.680

Christian FISCH

Umm.

0:5:31.950 --> 0:5:39.970

Ahmad (Guest)

After my post Doc. So after five years of being at university, I, you know because of this.

0:5:43.450 --> 0:5:44.660

Christian FISCH

Yeah, I I hate it.

0:5:47.20 --> 0:5:48.290

Christian FISCH

Hmm hmm.

0:5:55.940 --> 0:5:56.430

Christian FISCH

Umm.

0:5:40.230 --> 0:5:59.650

Ahmad (Guest)

And written the five years limitation I had versity and start the company immediately and yeah, I was alone. So first, you're actually after my post. You know, after starting the company, I was still working on this proof of concept project.

0:5:59.390 --> 0:6:0.430

Christian FISCH

Hmm hmm.

0:6:2.280 --> 0:6:5.830

Ahmad (Guest)

But as an external service provider to university.

0:6:6.580 --> 0:6:8.120

Christian FISCH

I understand. OK.

0:6:16.200 --> 0:6:16.550

Christian FISCH

Umm.

0:6:7.700 --> 0:6:18.190

Ahmad (Guest)

Right. And yeah. Then later after two years, my co-founder also joined him as a CTO.

0:6:24.480 --> 0:6:24.870

Christian FISCH

Hmm.

0:6:19.430 --> 0:6:25.950

Ahmad (Guest)

Umm. And then yeah, from there we we we speed up our progress and.

0:6:25.610 --> 0:6:29.760

Christian FISCH

You're cofund that does it also come from research background in the university?

0:6:29.650 --> 0:6:30.430

Ahmad (Guest)

Yes.

0:6:30.500 --> 0:6:31.890

Christian FISCH

OK, also from sitcom.

0:6:34.370 --> 0:6:34.830

Christian FISCH

OK.

0:6:32.280 --> 0:6:37.250

Ahmad (Guest)

Not from Luxembourg, but yeah. From France actually.

0:6:36.970 --> 0:6:38.460

Christian FISCH

OK, cool. Very cool.

0:6:38.600 --> 0:6:41.630

Ahmad (Guest)

Is originally from Germany, but yeah he did PhD.

0:6:41.60 --> 0:6:47.410

Christian FISCH

A nice in vain. France. OK, cool. What support did you get from the university?

0:6:48.710 --> 0:6:50.0

Christian FISCH

Or spinning out the company.

0:6:50.380 --> 0:6:55.330

Ahmad (Guest)

Yeah, main support was the during this proof of concept.

0:6:55.590 --> 0:6:55.980

Christian FISCH

Yep.

0:7:0.100 --> 0:7:0.560

Christian FISCH

Hmm.

0:6:56.220 --> 0:7:3.680

Ahmad (Guest)

Project. They support us to 1st apply for this program and then for executing also this.

0:7:4.50 --> 0:7:4.340

Christian FISCH

Umm.

0:7:3.760 --> 0:7:6.640

Ahmad (Guest)

The this project they helped us.

0:7:9.460 --> 0:7:10.300

Ahmad (Guest)

Yeah, listen.

0:7:13.60 --> 0:7:13.500

Ahmad (Guest)

Yeah, yeah.

0:7:7.10 --> 0:7:13.560

Christian FISCH

And that was as and TTO or some other entity. SNS snt. OK, cool.

0:7:14.420 --> 0:7:19.970

Ahmad (Guest)

And they also what was for very helpful for us is the connection with the SES.

0:7:20.330 --> 0:7:20.700

Christian FISCH

Mm-hmm.

0:7:21.90 --> 0:7:30.490

Ahmad (Guest)

So through this partnership, snt partnership, we could also work with SES to get some sample data from their net.

0:7:31.250 --> 0:7:31.520

Ahmad (Guest)

Yeah.

0:7:30.200 --> 0:7:33.470

Christian FISCH

Oh, nice, nice. Oh, that's very nice.

0:7:33.760 --> 0:7:34.510

Ahmad (Guest)

Yeah. So.

0:7:35.720 --> 0:7:37.230

Ahmad (Guest)

That helps a lot for us.

0:7:34.960 --> 0:7:46.70

Christian FISCH

Cool. And you? You. You, you, you. You just got the data by asking them because they had good relations with snt or did did you have a joint project with SAS something?

0:7:47.980 --> 0:7:48.340

Christian FISCH

Yep.

0:7:51.240 --> 0:7:51.660

Christian FISCH

Nice.

0:7:52.510 --> 0:7:53.170

Christian FISCH

That's cool.

0:7:45.680 --> 0:7:54.900

Ahmad (Guest)

Uh, so during this proof of concept we got the data through the partnership. The that s s and SNT has have.

0:7:54.560 --> 0:8:0.350

Christian FISCH

That's that's very good. That's very helpful. Cool though this proof of concept was the initial funding that you got.

0:8:1.480 --> 0:8:2.70

Ahmad (Guest)

Uh, yeah.

0:8:1.370 --> 0:8:5.900

Christian FISCH

Did did you get any other funding or did did the company run up at it?

0:8:4.220 --> 0:8:7.740

Ahmad (Guest)

Well after that also got the.

0:8:8.830 --> 0:8:12.120

Ahmad (Guest)

The quick start funding from European Space Agency.

0:8:13.430 --> 0:8:13.920

Ahmad (Guest)

Yeah.

0:8:12.400 --> 0:8:16.180

Christian FISCH

Oh, cool. Wow, congratulations. Nice.

0:8:28.240 --> 0:8:28.550

Christian FISCH

Umm.

0:8:15.820 --> 0:8:29.770

Ahmad (Guest)

Yeah, listings. Ohh now yeah. After that we also got another funding. So we so far mainly was funded through RND or activity was through R&D projects, RND grants.

0:8:30.140 --> 0:8:34.480

Christian FISCH

Umm. And the the third funding was again national in Luxembourg or.

0:8:34.900 --> 0:8:35.740

Ahmad (Guest)

Uh.

0:8:38.280 --> 0:8:39.0

Christian FISCH

OK, cool.

0:8:36.820 --> 0:8:42.410

Ahmad (Guest)

Was national. Yes, it was. Uh, through Luxembourg space agency.

0:8:42.490 --> 0:8:43.10

Christian FISCH

Ah, nice.

0:8:43.690 --> 0:8:44.10

Christian FISCH

Nice.

0:8:43.670 --> 0:8:51.670

Ahmad (Guest)

But the management of this uh program was done through by European Space Agency.

0:8:54.650 --> 0:8:55.250

Ahmad (Guest)

Thank you.

0:8:52.80 --> 0:8:59.250

Christian FISCH

Wow, super successful. Congratulations, cool. And now now the plan is to to get initial customers. Do you already have customers?

0:8:59.310 --> 0:9:3.410

Ahmad (Guest)

Yeah, we already have customer in Asia in Philippine.

0:9:4.540 --> 0:9:5.200

Ahmad (Guest)

We are.

0:9:4.610 --> 0:9:13.680

Christian FISCH

And do you target because you said in the very beginning that you you want to help countries understand this better, so do you target really country level institutions?

0:9:20.270 --> 0:9:20.680

Christian FISCH

Yeah.

0:9:14.480 --> 0:9:24.410

Ahmad (Guest)

Yeah, actually we can provide the country level product. So now we have coverage and three countries.

0:9:24.700 --> 0:9:25.50

Christian FISCH

Mm-hmm.

0:9:25.540 --> 0:9:34.900

Ahmad (Guest)

Philippine, Indonesia, New Zealand and soon we will expand to Brazil. Actually now we have some trial phase in Brazil.

0:9:35.270 --> 0:9:41.320

Christian FISCH

Very cool. I have to ask. This sounds kind of random. What what? How come those countries? Well, why those countries?

0:9:44.770 --> 0:9:45.430

Christian FISCH

Yeah.

0:9:41.900 --> 0:9:49.270

Ahmad (Guest)

Well, we are focusing on underdeveloped countries because they don't have the infrastructure for rain monitoring, right.

0:9:49.20 --> 0:9:51.130

Christian FISCH

OK, cool.

0:9:54.720 --> 0:9:55.40

Christian FISCH

Hmm.

0:9:57.630 --> 0:9:58.10

Christian FISCH

Mm-hmm.

0:9:50.440 --> 0:10:4.560

Ahmad (Guest)

And the Asia is one of our main focus primary focus because first they don't have the infrastructure. Second, they are impacted a lot with the extreme rain events and so.

0:10:5.850 --> 0:10:6.990

Christian FISCH

So it umm.

0:10:5.520 --> 0:10:8.930

Ahmad (Guest)

There is a big need for this monitoring.

0:10:12.50 --> 0:10:12.520

Ahmad (Guest)

Yes.

0:10:8.700 --> 0:10:33.850

Christian FISCH

So it's a deliberate choice to target those countries. Very interesting because I teach a lot in, in, in, in, in the interdisciplinary space master program where teach space business and want preneurship. And I often tell the students that market analysis, market choice, market entry choice is super critical, especially for startups who have to focus on one market. This is the great example that a company like you chooses the Philippines.

0:10:38.460 --> 0:10:38.830

Ahmad (Guest)

Yeah.

0:10:34.510 --> 0:10:41.560

Christian FISCH

Because you felt that the the the need for your product is potentially the greatest data, that's super interesting. That's very cool.

0:10:41.160 --> 0:10:43.70

Ahmad (Guest)

Yeah, exactly. Yes.

0:10:42.630 --> 0:10:44.590

Christian FISCH

OK, what what are your plans going forward?

0:10:48.950 --> 0:10:49.290

Christian FISCH

Mm-hmm.

0:10:52.930 --> 0:10:53.190

Christian FISCH

Umm.

0:10:45.840 --> 0:11:4.170

Ahmad (Guest)

Now our plan is to scale our business right now, as I mentioned, we have customer in Philippine and we need to just scale it. We are talking, we are trying to now enter Brazil and expand our commercial activities.

0:11:4.320 --> 0:11:4.620

Christian FISCH

Umm.

0:11:5.60 --> 0:11:11.250

Ahmad (Guest)

And to do that, we need to, uh, we are raising actually uh fund.

0:11:11.670 --> 0:11:12.150

Christian FISCH

Mm-hmm.

0:11:12.160 --> 0:11:16.710

Ahmad (Guest)

And we already received some commitment from an investor from Asia.

0:11:17.670 --> 0:11:18.530

Ahmad (Guest)

Is showing.

0:11:17.550 --> 0:11:20.420

Christian FISCH

And then the venture capital business, Angel.

0:11:20.40 --> 0:11:22.250

Ahmad (Guest)

Is that institutional investor?

0:11:23.220 --> 0:11:23.390

Ahmad (Guest)

Yeah.

0:11:31.980 --> 0:11:32.320

Ahmad (Guest)

Umm.

0:11:40.450 --> 0:11:40.760

Ahmad (Guest)

Yeah.

0:11:22.390 --> 0:11:46.120

Christian FISCH

Wow. Wow. Nice. Congratulations. That sounds very. That sounds very exciting because entrepreneurial finance on to start fundraising of of startups is one of my main research areas. So we are doing the project that I presented yesterday at Partnership day was about business, Angel finance and understanding the selection of business, Angel investment, super interesting. Cool. So I wish you all the best of luck with that super interesting.

0:11:50.440 --> 0:11:50.730

Christian FISCH

Hmm.

0:11:52.530 --> 0:11:52.840

Christian FISCH

Mm-hmm.

0:11:45.30 --> 0:11:57.470

Ahmad (Guest)

Yeah. Thank you so much. Now we received the commitment, but to close the round, we need to build a syndicate around. So we are talking with other vices as well. So hopefully we can close around.

0:11:56.130 --> 0:11:57.940

Christian FISCH

Good luck. Good luck.

0:11:58.130 --> 0:11:59.50

Ahmad (Guest)

Done, yeah.

0:12:9.440 --> 0:12:9.850

Ahmad (Guest)

Thanks.

0:12:25.690 --> 0:12:26.280

Ahmad (Guest)

Yeah, sure.

0:11:58.890 --> 0:12:29.180

Christian FISCH

Yeah, but I think if you you have such a promising track record, I have already received that. It sounds like a great company. So Snt is really proud of it, that ups and you know one of the of the ones that are named first. So that's that's really cool to success story. So that already concludes my question. Of course I would out of personal interest, I would like to have have more information, but maybe we can do this when we meet at like the next partnership day or at one point in the future. Thank you so much for taking the time to sit down with me.

0:12:29.280 --> 0:12:30.470

Ahmad (Guest)

Yeah, it was a pleasure.

0:12:29.640 --> 0:12:34.210

Christian FISCH

It's really helpful. Super appreciated if you ever have any.

0:12:34.930 --> 0:12:45.290

Christian FISCH

Um, any entrepreneurship innovation related questions, business model related questions feel free to to reach out to me I'm happy to to see what I can do in that regard.

0:12:45.730 --> 0:12:47.930

Ahmad (Guest)

Sure. I appreciate that. Thank you so much.

0:12:46.570 --> 0:12:59.510

Christian FISCH

No, I do not have a concrete off my leg. I cannot build you anything because my one of the main differences between me and the other guys here, they they they build physical stuff. But I don't like how do business angels make investment decisions.

0:13:5.640 --> 0:13:6.820

Christian FISCH

Yeah, yeah.

0:13:9.830 --> 0:13:10.240

Christian FISCH

Yeah.

0:13:12.630 --> 0:13:13.660

Christian FISCH

Yeah, indeed.

This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 101035795

UNIVERSEH – European Space University for Earth and Humanity is an alliance of

