The following content is provided under a Creative Commons license. Your support will help MIT OpenCourseWare continue to offer high quality educational resources for free. To make a donation or to view additional materials from hundreds of MIT courses, visit MIT OpenCourseWare at ocw.mit.edu.

PROFESSOR:

So tonight, the first part of tonight is the financing sources panel. And we have two of our three members here. So I'll invite them to take seats. Julianne, we're putting you in the middle because you have to keep the guys on the end, and Axel. And what I'm going to do is, to give them some context about where we are in the course, just do a recap, so they know.

And then I'll have them introduce themselves and we'll go from there. It'll be a Q&A after a brief description of what they do. So where's the class so far? We started off two nights ago with an introduction to business plans and planning. We talked about the importance—the basic tasks were to figure out how to create value and how to capture value, both for the entrepreneur and for investors.

There are the three whys. Why this? Why is this an important thing that you're doing that you're going to spend your time on or you want people to invest resources in. Why now? Why now is the right time to do it. We've all been on the burning leading edge of the wrong time. And then why this team? The investors are going to say, well, is this the right team? And you need to be asking, do I have the right team of people?

And then if you get those first three right, you should be asking yourself the fourth why, which is why won't this work? What am I missing here? That was the first part of Tuesday night. And then Steve Purse came in and talked about how to give a pitch-- taking all of that planning you're going to do and put it in a way to communicate. He focused pretty much on pitching to investors, but he did point out the same concepts apply to pitching to partnerships and other things.

Last night we had Bob Jones come in and talked about finding your customer. It's not sales. It's not marketing. It's finding your customer. What do they want? What will they pay for it? How do you find them? And he gave some really personal examples of situations where he succeeded and where he did not succeed. And it was very interesting. I got him to speak after the break about something he's actually working on.

So that's an important part of what this class has been. It's not about abstract thinking about things. The people that are talking are actually doing the things they talk about. And he's right in the middle of that. And then we had Rich Kibble come in and talk about business models. So I've got a customer. I think I have a value, but what's the model that I'm going to use to generate revenue.

The second part of tonight, Charlie Tillett, who will come in after the break, is going to do financial projections. How do I take all of that, figure out what it means economically? And we talked about it being not a static process but a dynamic process-- test, redo, until you get it right. So once you've done all that planning, you're going to need some resources. And one of the resources is funding. So that's what the panel is about

The people on the panel represent sort of organized forms of financing. But entrepreneurs get financed in a variety of ways. So a lot of people talk about just venture capital. But plenty of great companies have been launched through angel, friends and family type money. A traditional way is using customers. You work for a customer. You see what they don't want. You then try to move from a services business into a product business, productize it.

There are grants. National Science Foundation, small business innovation research funding, SBIR. This money is available from each of 11 or so federal agencies and can be up to a million dollars. I'm working with a company I think is at a million dollars of SBIR funding. And we have more recent types of funding, which crowd sourcing, where the following at Kickstarter and others have been to fund products.

And we're just beginning under the JOBS Act that was passed a year or so ago to have rules out that are going to get finalized around crowd sourcing of investment. So in Kickstarter, traditionally it's I want to find this product. In the crowd funding of investment, it'll be I want to put money into a company or a business. And they're probably some other ways people have funded, like credit cards. Business plan competitions have launched companies.

I was involved in the company who got launched because they got sued for trademark infringement and settled and sold the name to another company and got \$25,000 for that. So that's how they got launched. So lots of different ways entrepreneurs got to be creative. But for the panel, we'll start with the basic organize and maybe we'll open it up to Q&A.

So I've asked each of the panel members to introduce themselves-- a little bit about their background, what you should know about them. They're entrepreneurs in the sense that they

raise money from people in order to turn around and invest it in your project. So just as you're an entrepreneur to them, they're an entrepreneur to their investors. And asked them to talk two, three, four minutes-- whatever you feel comfortable-- to set the stage.

So Axel, we'll start with you.

AXEL BICHARA: Sure. Happy to start. Good evening, everybody. I'll go through my background a little bit first. I am from Germany originally. Came to MIT in the late '80s, studied mechanical engineering, and sat in one of these classes and ended up co-founding a software company, mechanical design automation software company, out of-- at the time it was 15-375.

> And we raised venture money relatively quickly \$1.5 million to start with and then some follow on rounds. I was VP engineering in that company. We sold it after about four or five years. I then became a venture capitalist, was at Atlas Venture for 19 years in total. Raised and invested about \$2 billion to \$2.5 billion while I was there and did mostly early stage, self slash early stage technology startups.

> I left there about two years ago to do deals on my own. And so I have helped start a couple of companies and have made a number of personal investments as well. And one of the companies I helped start is actually an accelerator for hardware startups. Called Bolt in downtown Boston. So that's another financing model I got exposed to and really got involved with where you don't provide just capital and some high level expertise and strategy, but real hands-on work on product, much more hands-on company building, team building, than you do in a venture capital. And we're doing that with very early stage companies there.

So I can I think in the evening here talk about it angel financing. I'm an angel. I'm involved in this accelerator. I've been in the VC business for a long time. And I'm also involved in a company called Dragon Innovation, which is a crowdfunding company for hardware startups. So I think that's actually one of the very interesting ways of getting companies off the ground that may not show necessary the highest potential from the beginning, but to launch an initial product and then kind of see what happens.

So in all this experience I've accumulated, probably maybe the most important lesson-- the most important lesson is probably always work with good people. Whoever your investors are, you can't fire your investors. You need to select carefully who you end up working with. But also a match between the financing source and where you are as a company in terms of the potential of the market, the potential of the team and everything.

And often people think, you're only a great company if you raise VC eventually. That's just so not true. That's probably 1 in a 100 interesting startups is really suitable for VC at the beginning. And it depends a little on the stage, a little bit on the potential, and also the potential may only discover over time. So I think that's the great and also-- great other ways of getting company off the ground.

And one of the things every good entrepreneur is focused on is dilutions. So you want to be kept really-- you want to be capital efficient, but also dilution efficient from the beginning. And I think that often means-- mean crowdfunding is a great way to get pretty much non-dilutive capital for a product. But whether it's friends and family money, incubators, accelerators, angels-- and then of course VCs have been going to very early stage funding as well, where you have a number of VCs writing \$100,000 to let's say a \$500,000 checks with very, very low barrier to getting a deal done, which can be attractive.

But it's attractive in terms of you get capital relatively easily and quickly. But the question then is, is that actually the right VC to help you build the company in the long term. Is VC the right sort of financing to build that company long term? So I guess we can zoom in to all of that as the evening progresses. And I guess I'll stop here with the introduction.

PROFESSOR:

Right. Well, before I ask Julianne to speak, Axel has been here before to talk about this. And as I was putting together the panel thinking, who's the right mix of people, it struck me that your recent venture Bolt fit well with nuts and bolts.

[LAUGHTER]

But I did ask you to figure out who I could get for the nut part. So we haven't figured that one out yet. Welcome. Julianne, you're not the nut by any means.

JULIANNE ZIMMERMAN: Well, I guess we'll leave that up to the audience to decide. So before launching into my background and my focus and my reason for being here on the panel tonight, let me just say that the thing that I hope all of you recognize by the end of tonight, if you don't already know it, is that every form of capital has a use and a cost.

And different forms of capital are appropriate not only at different stages, as Axel said, but for different kinds of businesses. So you've already been challenged in your first session in

And to a lesser extent again, in second session, to think about why you're doing this and what

you ultimately aim to accomplish. The answer to that question is really important for a variety of reasons, not least of which is to guide you in making decisions about the appropriate resources to call upon to achieve that goal. And one of those being capital.

And there are very, very different kinds of capital that have different uses, different benefits, and different costs. And by the way, I can't remember the number, Joe. You might know it. But it's a minority fraction of companies that they go to IPO that were ever venture funded. It's something less than a quarter. It's like 16% or 17% percent. Do you remember, Axel.

AXEL BICHARA: I bet it's less than that, actually. And so many of the great wealth creation stories I found who never have raised money, or just raised tiny amounts of money and kept it all for themselves. If you can pull it off, it's a great way--

JULIANNE ZIMMERMAN: So there are lots of preconceptions, as Axel mentioned about, it's only a really good company if it's venture backed or you only really have steep growth potential, if you can attract venture money. I really hope that by the end of this evening, we've really completely dispelled those preconceptions from your mind. So about me, I'm also an alumna.

I came here in the mid '80s. I double majored in aerospace engineering and literature, neither of which would lead anybody to imagine that I'd be on this panel here tonight. And my first career was in the manned space flight business. It was a great first career. When I came to the end of that first career, I was looking for something that was equally challenging and very different.

And I ended up co-founding a company called Greenfuel Technologies before there was such a thing as clean tech. As a matter of fact, at that point in time, the greens and browns feared and loathed each other, absolutely wanted nothing to do with one another. And here we were founding a company that was algae biofuels. And I'm very proud of the fact that in the time that company was alive, we actually managed to change the tenor of those exchanges.

In fact, we ended up being frequently featured in industry magazines like *Industrial Light and* Power, which is about as far as you can get from Mother Jones in the known universe. So I've been on the entrepreneur side of the table, too. One of the things that is important to notice about that is we raised about \$23 million in-- good evening.

We raised about \$23 million, had a very interesting proposition, made some mistakes, encountered significant obstacles, had a good team. And when the market cratered and project finance went away, we defaulted on all their contracts. And that was the end of the company. So there are many things that can trip you up that have nothing to do with the things that you thought of or the things that you planned on.

Interestingly enough in the entrepreneurial realm, having a company crater is not necessarily the death knell of your career as an entrepreneur. I went on to be involved in a handful of other companies. By then, there was such thing as clean tech. And having been involved before there was even a commonly understood wave or trend or segment, I was-- a venture mentoring service, clean tech open, the 100K-- mentoring and judging a bunch of really interesting startups, some of which never actually went on to launch. Many, in fact, didn't.

But the teams would join and break part and reform. And that's probably something that you also talk about in terms of the way that you form teams together. As Axel mentioned, really above all, the most important decision you make every day is who to work with-- who to work with on your team, who to work with as investors, who to work with as partners, who to work with as vendors. Ultimately that is far and away the most important decision you make.

So having done all this mentoring and judging and blah blah, of course I found myself drifting perilously close to pretending I knew something useful. And a friend and colleague and I had been discussing for about two years some trends we saw going on-- not exclusively here in the Boston area, but especially here in the entrepreneurial community.

And it's slowly dawned on us that we had what sounded an awful lot like an investment thesis. So in a very entrepreneurial way, we wrote that down, started showing it to people. Keeping things secret is not a great way to start. We started showing it to people. We showed it to everybody we thought would be able to give us a candid response to the question, is this completely wrong? What have we gotten wrong and what have we missed? What have we imagined? What have we left out? Why will this not work?

And we did that for about five months. And we got some great feedback and we ended up founding and new seed stage venture firm here in Boston area called Vodia Ventures. That firm is now a year old and we are still raising our first fund, so we are also, as Joe alluded, we also raise capital for our investors. And we've done four deals so far. So we've made four investments in companies here in the Boston area.

And we don't focus on clean tech, per se. We invest in segments that people often associate with clean tech-- energy, air, water, food security, public health, are the two that kind of don't

fit the clean tech set. And I'd be happy to talk with any of you afterwards about why those sectors are-- why are we doing that. But the thing that I'd really like to finish up this sort of background monologue on is, when you are thinking that you might want to go to an outside investor to fund your company, as Joe alluded and as Axel did as well, it's really important not only to know what kind of money you want and how much and how much dilution you're willing to accept and what an appropriate model is for your stage and all the rest, but are your interests and investor's interests actually aligned?

Do you share the same interests? You're going to be working with this person, an actual person, very intimately for an extended period of time. And so you really do want to be very, very careful. You don't want to send your elevator pitch or your presentation to everybody you think might possibly be interested. You really want to be very selective, as selective as you are about your team members, in picking the people you think you probably are going to share a good working relationship with.

PROFESSOR:

Amir, thank you. I know it's hard getting in. But I just wanted to fill you in. Same format as before. We're introducing the class to financing sources-- where do you get your money, what do you look for, and then we're going to have a discussion about the financing environment and all of those sort of things. So Amir, go ahead.

AMIR NASHAT:

I'm extremely sorry for being late. Getting lost on campus, I suppose. So my background is that I actually was lucky enough to do my PhD here on campus in a lab in chemical engineering, Bob Winger's lab. I currently am a managing partner at Polaris. We've had probably about 25 years of investing in Boston. As Polaris, we're going on about 18 years now.

My partners had worked in another firm. We invest in all kinds of stuff. We're a pretty traditional venture capital firm, I would say. And we kind of stick to the old model from the '80s and the '90s of how to invest. Again, my background, I was a chemical engineer. I actually wanted to go work at a startup that was being spun out of Bob's lab, and I had a very simple logical train of thought which was my adviser and another guy on my thesis committee were both starting a company. And I figured that if I took a job at their new startup since they were desperate to find employee number one, the chances they would let me stand well for my thesis and not ask tough questions was very high.

So I said sure, I'll go work at your startup. And then what ended up happening was just randomly I ended up interviewing with-- so it was being seed funded by a series of venture

capitalists at a company called Polaris I've never heard of before. I had actually briefly worked at Goldman Sachs-- can people hear me OK or-- I briefly worked at Goldman Sachs in fixed income trading stuff briefly. And I had never heard of venture capital. And venture capital is the freckle of the freckle in the financial markets.

It's such a small industry financially. So I no idea what to expect. I had no idea who these guys were. But kind of interview after interview, I was smart enough to realize they were probably actually interviewing me for Polaris, because I don't think I need to meet the guy that founded 3Com and created ethernet to get a lab job. And so little by little I started to ask around and they seemed like people that would be really good teachers.

And that's kind of what I've done most of my life, including as a venture capitalist. I just kind of associate myself with people that have something to teach me and some really good mentors-whether that's people I work with or whether that's the entrepreneurs in our companies and people we surround ourselves on boards with. And so that's kind of what I do.

Within that context, we've started several companies that I've been CEO of that we've spun out of MIT. Sun Catalytics is one in the energy space. A consumer product company called Living Proof is another one that's more kind of materials and consumer products. Provasis Therapeutics was a cell therapy company that we spun out of the lab here at MIT.

So there's been a series of companies. Again, I'm not an entrepreneur. I'm not very entrepreneurial. I did those projects just because it seemed like it was really logical technology that was going to help change the world and nobody wanted to be CEO but me. But as venture capitalists, we follow other people's leads. We're actually quite conservative in some sense. And that's kind of maybe what we try to do.

With that said, obviously we take much, much greater risk than any other investors tend to take. But we view ourselves as kind of chicken shits, for lack of a better term. And say anyway, that's kind of us. That's me, and I don't know what else I can say.

PROFESSOR:

So I think this would be a good point just to maybe start some Q&A if people have some questions. Otherwise I have some things I can T up. But is there any pressing issues that anybody in the audience has? There we go.

AUDIENCE: [INAUDIBLE].

AXEL BICHARA: So it's like any deal you do. You give up a bunch of equity. You get some capital. And kind of

what you get in return. And there are many incubators, which are typically sort of-- if you desk a little bit of mentoring and an internet connection. In accelerators, you often have sort of a multi-focused program, just more value added and one dimensional another.

So I think the short answer is, do your homework. Who are the people? What have they done before? What kind of real work are they going to do? And how committed are the people you're working with? Is it sort of a loosely connected network of people helping out? Are there people involved who have full time dedicated to making the companies they work with successful? And obviously there needs to be a fit with your objective.

Is your objective too-- I got some introductions. I'm networking, financing sources, or are you looking for some help to really build a product, help you build the team? Step back and figure out, what financing sources should I go after and who are these guys? How can they help me figure out what the best path is. So when we started Bolt, we saw the need for entrepreneurs who have a piece of hardware as part of their offering basically totally grinding to a halt in traditional sort of software accelerator settings where the expertise simply isn't there.

And it's much harder to build hardware than it is to build an iPhone app. And so we built-- we have a big machine shop where you can build anything. We have a full time staff, engineering staff, that helps you products done. And then people like me on the financing, company building, team building, strategy side. But there's a full spectrum, from things that are really lightweight to things that are fairly involved. We're probably more on the involved side.

But there's no good or bad. It's really what's a fit with what you're looking for.

PROFESSOR:

Axel, Y Combinator kind of program where you get accepted, there's sort of a set formula about we'll give you x dollars for y percent of your company-- is that how you work or is it a set formula?

AXEL BICHARA: We have, I would say, a default formula, and then there are exceptions to the rule depending on specific circumstances. For instance, if a company has raised a bunch of venture money already. So we're not just working with companies that are-- three guys out of MIT and the slide deck. Some offers are long. Some have been software entrepreneurs before, are looking for the expertise to getting a piece of hardware to market.

> So if the company has, for instance, raised a bunch of venture capital, sort of the totally formulaic approach of a Y Combinator wouldn't work. So we have the formula and then the

rule, and then the exception to the rule, basically. And my philosophy and our philosophy is, if there's a good company and a good entrepreneur that we want to work with, there's a way to get a deal done that makes sense for everybody.

PROFESSOR:

Are you willing to tell us the default formula?

AXEL BICHARA:

Yeah. The default formula is, we take 10% of common stock. We put in 50K. But the main thing you get is you work with us for six to nine months basically around the clock helping build product, helping build team, get the company set up for financing. And there's often the discussion, well, it's only 50K. What's evaluation?

You kind of do the math. And the answer I normally give is, let's take the 50K. Give it to a charity. The reason for coming here is everything else we're doing. It's not the 50K. So it's very much a company building is a value we provide in this particular case, which is really diametrically opposed from what I did in the past, which was big VC firm where it's really all about the capital.

But that goes back to what stage are you at and what do you need help with? And maybe one more comment on the hardware thing-- in the amount of money and time companies I invested at Atlas that was wasted because we made kind of beginner's mistakes in getting hardware products to market would have been significant value added if something like Bolt had exited, even for a VC company at the time.

AMIR NASHAT:

Can I make one comment about incubators? And as Axel put, now come in different shapes and sizes. One thing I noticed as a voyeur at Dogpatch Labs. We had set up Dogpatch Labs some years ago. It's now exists within Cambridge Innovation Center. It's more the value of being around other people when you're trying to evaluate these places.

One is the services they provide. The other is actually the value of being around sitting next to someone who's doing better than you, and how that motivates you, and there's this competitive dynamic that kicks in. And you could watch it actually. Whenever I would over there, someone would get off the phone with Pepsi and they were talking to some VD person over there. And you could see the other teams around them really kind of-- what have I done today?

Maybe I'm a biotech or maybe I'm a software company or something and I've got nothing to do with Pepsi. But it just gets you thinking, what did I do today? And you could feel the energy

that grew. So I think surrounding yourself in an environment where it feels like people are quite intense is actually surprisingly valuable. And I think for a lot of people that benefit from going into these environments, whether it's an incubator or accelerator or anything else-- sitting at home alone and having to motivate yourself is actually quite difficult a lot.

It's like going to the gym. Some days you're great and some days you're not. It just kind of helps if you're at the gym with a bunch of other people that are kind of running around acting like they're lifting a lot of weight. So I just think that's one part I would look at when I evaluate. It is a soft factors. It's obviously not a hard factor.

PROFESSOR: We have some other questions?

AUDIENCE: [INAUDIBLE].

PROFESSOR: Yeah, we haven't covered that in the class, so if you want to just take a moment and explain it

to the people that don't know.

AXEL BICHARA: Oh, explain?

JULIANNE Sure. Go ahead.

ZIMMERMAN:

AXEL BICHARA: So explain convertible note? So an equity deal is not a convertible note. I'll start with that.

Equity deal is you basically sell shares in your company. You give away a percentage for the capital that gets invested. Convertible note is basically you basically borrow money and you owe that money back to the investors unless there's an event under which the note converts

into equity.

So may or may not convert into equity depending on what the terms of the note are. Often somebody does, as an example, let's say, \$500,000 convertible note that has a term that says it converts into the next equity round of financing off a million dollars or more. And so if there's such an equity financing, it converts and there's some other terms like a discount interest rate.

Or it may not convert if the company, for instance-- well, if it goes bankrupt, the money's gone. If the company is acquired, there's typically a term where you get 1 and 1/2 to 3 times your money back of the note. So that's kind of the basics. So why did convertible notes become so popular? It's very easy and quick to get done. It's a one to two page document.

And as an entrepreneur, you get the money quickly and there's no more complicated legal documents to do an actual equity deal. On the flip side is, you owe the money. It's debt until it converts. And normally the rule with debt is that if things go well, it's a good thing to have taken. If things don't go so well, you may end up regretting it.

Now in many startups, things don't go so well. So you just need to kind of think the different scenarios through. We actually had a discussion earlier today with a VC in one of the Bolt companies. So do we do a convertible note deal or an equity deal? I could argue either side. But maybe as a rule, if you're talking about raising \$250,000, \$500,000 and you're likely to raise more money, like whatever, another million plus a year later, it's not a bad thing to do. It's a quick way to get started, low legal fees and everything.

By the time you reach \$2 million or more in convertible note, it's just odd. There's this amount of money you have spent that's converting, that's going to be dilutive. It's starting to be a biggish amount. What if the pre money is \$4 million, let's say. Well, already \$2 million converting at \$4 million pre, a third of the company is already gone.

So I would say up to \$500,000, a million, \$1.5 million maximum. If I see a convertible note at more than that, it's probably starting to get pretty uncomfortable.

AUDIENCE:

[INAUDIBLE].

AXEL BICHARA:

Right. Where they would not do it. One way to think about it is, it really depends upon the terms of the note. If you go in and there's something called a cap or no cap. Basically a valuation cap or note. So let's say I give you a note for like 500K and it has no cap on it, so it converts in some future financing. So you're actually using my money to increase the value of the company, which I then buy shares at.

So some VCs actually do that and it's all about competing with the next guy, get a foot in the door with some interesting entrepreneur. But from a purely financial standpoint, it's actually kind of crazy to loan somebody the money-- it's typically 2% interest rate to increase evaluation, in which you then invest. The other effects-- if you are a note holder, you're actually not a shareholder. So you won't get a board seat.

So that's one. But for many investors-- understanding thee objective of the investors is actually important. Like for many venture firms especially, it's a foot in the door. You care about the option value of doing a deal later. So if that's the valuation, the main objective, that's kind of

one thing. Now if all the money the company will need is let's say \$1 million-- it's a bunch of angels and they really help you to work on the deal-- understanding the objective is actually very, very important.

Do you have alignment of interests or actually conflict of interests? Is the objective of the investors to increase your evaluation or not? So there's actually no simple answer. There's something beautiful about an equity deal. You have aligned interests. You own more or less-preferred versus common-- but it's more or less the same shares in the company. So on the margin, I actually tend to prefer equity deals.

JULIANNE ZIMMERMAN:

So if I could just expand on Axel's comments. Remember I said at the beginning that every form of equity has its intended use, it's benefits and it's costs, right? So as Axel said, a note tends to be a really good instrument when you are expecting there to be fairly rapid succession of events. So you're going to hit some milestones. You expect to raise more capital.

It's an opportunity for you and the investors, when your interests are aligned, to do a relatively lightweight deal. It's relatively inexpensive to do. It's relatively quick. You don't have to agree on evaluation when things are in flux, which is also easier for both parties. And the advantage for you as the founder is you haven't already committed a portion of the company away. You have the opportunity to hit those milestones and justify evaluation.

The advantage for the investor, again, might be the optionality. So the option itself have value to them. It might be that they like the idea that their note will convert at advantageous terms in the next round, and that's when the cap and the other terms come in. But again, the purpose of a note is really kind of a temporary instrument. It's not designed to be long term instrument and it's not intended to be a kind of one off or permanent instrument. It comes due. It has a termination date.

So on the date when it matures, you either have to go back and say we need an extension or you have to pay back that money or you have to have a subsequent funding round in order for the note to convert. So what you want to keep in mind is that's what it's designed to be. It's designed to be an interim instrument. Does that make sense?

AMIR NASHAT:

If I can make one cautionary statement with notes-- in general, I think if I was an entrepreneur I'd tried to take notes if I could, because I'm paying you Tuesday which is in stock for a hamburger today, which is the cash you give me. The one thing you have to watch out for is if

I gave you \$100,000 in equity and I own 5% of your company, things go sideways whatnot, I own 5% of your company.

So you may not like me. We may be in an argument, but I'm a minor shareholder. And most of the controls is in your hands. If the company goes belly up with it's \$100,000 note, I'm a creditor actually, which means your intellectual property and a whole host of other things show up in court and I'm first in line probably, unless you've taken other loans. So my power becomes extremely strong for the same \$100,000.

So you really don't want to screw up a note you never want to borrow money when you're close to the edge. If you feel really good about how things are, or you do what are called auto converts, where at your option, the note converts to equity, if investors will give you that. A lot of them wont. But if they allow you to auto convert at some evaluation, then you never really owe them the money. It will get converted to equity. But be careful about owing people money, because they become the controllers and it's a court process, which nobody controls.

AUDIENCE: [INA

[INAUDIBLE].

AMIR NASHAT:

How do you define structural fit versus strategic?

AUDIENCE:

[INAUDIBLE].

AMIR NASHAT:

Let me start with the first part of your question, which was the presumption that kind of alignment might be different. I think you should be really careful taking money from people where you don't feel like there's 100% alignment. Every one of my entrepreneurs and I, I hope, have the same exact goal. If you don't, it can get quite tricky.

And then in later rounds, strategics come in, people come in. Maybe objectives shift a little bit. My price point maybe lower for my stock than somebody that led a very later stage round, so our sensitivities to certain events may be different. But in general I think everybody better be rooting for the same thing, which is the company to be successful.

And that's one of the reasons I would always worry about people with too much of a strategic interest. Because a lot of our bio-techs bring money from corporate partners, pharmaceutical companies. A lot of times they're kind of interested in the company, but they're really interested in a particular asset. And we have to excuse them from the room when we have strategic discussions, because we're trying to play them against other pharma.

It makes it somewhat of an awkward situation. It's very workable. But it's not the same as having someone you really trust that you can just be totally open with. So every VC obviously has a Rolodex, a series of people, a network, that they bring to the table. But if you've got a group that's very, very specifically interested in a particular piece of intellectual property or a strategic fit or something like that, you have to be careful that your company doesn't drift away from that or that there aren't moments where you really can't be as frank with them as you'd like to be.

JULIANNE ZIMMERMAN:

I think that's a really lucid answer. What I would say is that people throw around the word strategic, and as you heard just now, strategic meant two different things in the same sentence. So the way that I like to think about it is, do we all agree what success is? Does success mean the same thing to all of us? How will we know that we've succeeded?

And if the answer is we've gotten \$100 million or whatever figure it is, that's not a useful answer, because there's a semi-infinite number of trajectories that pass through that point. So what are the things that we all care about accomplishing, and do we share compatible ideas about what it will take to accomplish that success?

So in the course of starting and growing any company, you're putting yourself in, by definition, a high conflict environment. You always have more things to do than you can do. You always have decisions to make in an absence of complete knowledge, so you never have complete intelligence ever, even when you really good situational awareness, you never have complete intelligence.

So even when everybody is really tightly aligned and everybody shares the same objectives, the same goals, the same motivations, you're going to have honest differences of opinion. If you have divergent notions of what success is or what we care about, you have a problem. You don't just have legitimate differences of opinion about how to solve an agreed upon problem, you have different definitions of the problem.

That can get very ugly very quickly, and it can just be disaster. So ultimately what you really want to be sure of is that everybody on your team, everybody internally, your investors, everybody, agrees on what success means. What do we aim to accomplish? How do we win collectively, all of us together. How do we win? And then you have the recipe to be able to deal with all of those uncertainties and all those decision points in a productive way.

AUDIENCE:

[INAUDIBLE]. some sense of what scale of money is involved in your experience in making

investments in [INAUDIBLE] could be as big as [INAUDIBLE] or as much money as [INAUDIBLE] a sense of perspective.

[LAUGHTER]

AXEL BICHARA: I can try that. I mean, a typical seed financing, angel financings, 250K would be really small. \$500 million, I would say up to \$2 million, \$3 million of angel is pretty doable these days. Valuations, again, talking about a vacuum is always, always tricky. But there are a few deals that get done at less than \$3 million pre, I would say. And \$5 million or \$6 million pre is a lot for a million dollar angel round.

> No VCs start at 100K with a foot in the door kind of strategy and typically A rounds are these days whatever-- three, two, \$6 million, \$7 million in the tech world. Bio tech obviously is much bigger numbers. There are definitely VCs and also, depending a little bit on the backgrounds of founders, plays where you raise a lot of money quickly.

> One company that I helped get off the ground called On Shape we raised an A round of \$9 million in November of 2012 and we raised a B round of \$25 million in April of this year. It was the all-star team going after big opportunity and some VCs was very like multi-billion fund saying, this is a big play. I want to be in there, and kind of paying up to do a deal early.

> And that happens up two \$100 million rounds to if a VC firm is convinced that there's an emerging market segment or some really interesting disruption going on, by piling a lot of money you obviously acquire a meaningful ownership as a VC, but you also help establish-- if you're executing well-- help establish the success of the company.

> It would be very hard for competitors to raise money if you have \$100 million into bank already. So there's all kinds of-- especially sort of in emerging winners, you look at, oh, these are crazy evaluations, They're crazy deals. If you really look at it, they may not be the crazy if it is an emerging winner in a multi-billion market disruption, for instance.

JULIANNE ZIMMERMAN:

So again, I would say-- sorry. Again I would say, there are so many different kinds of companies. And remember that we've all commented that venture money, professional money, is a very small segment of company finance. So I would say the way I would answer that is starting from 0, the lower end is zero. You take no outside money. And there have been companies that have famously gone bust after taking in more than \$100 million.

So there's an extremely wide range. The appeal that I think tends to get overblown in a lot of the press coverage of big deals is it sounds very sexy. It's very exciting. It sounds like a lot of momentum. And that's the intention of a big round certainly. But there's also, again, there are always costs and always downsides.

The downside is, if you take a huge amount of capital-- whether that's hundreds of millions for \$10 million depending on your stage of development-- if you take a huge amount of capital, it also puts a tremendous amount of pressure on you to use that capital very aggressively. And so companies have also been blown up by taking too much capital.

So really what you want to be doing is focusing, again, on Joe's questions. Whys? What are all of the whys? Why are you doing this? Why now? Why this team? Why this amount of money? Why this timing? Why this instrument? Why this firm? Whatever. Because you really want to be focused on is this the right amount of money for my company to do what it is intended to do at this point in time? It's really easy to get wildly out of balance there.

AMIR NASHAT:

Yeah. I mean, again, we write checks as small as \$50,000, \$100,000 to get started. Our goal is probably \$5 million to say \$20 million in an investment. It's a wide range. If the company only ever needs \$1 million and we all know that going into it, it's probably not a fit for us, because we have a reasonably large fund so we'd have to make so many small bets.

It's perfectly fine if a company only takes \$1 million and is either successful or unsuccessful. Because we all learned in a very quick way that it was really great. You're never going to complain if you took \$1 million and turn it into a big win. I have had a lot of co-investors who complain about that. But my view is, come on. You've got to be kidding me.

And then of course we kind of sometimes have to plan to put 20, 30 million hours through to support our company. I think the fundamental question is exactly the why. And for us, we are so focused on backing entrepreneurs, every single deal we've been in pretty much, the intellectual property shifted. Almost everything about the deal changed. Very rarely does it work exactly the way you want.

The people are what make it happen. And if a person doesn't own a lot of it, then why are they coming to work every day? So I think whenever we own a venture entrepreneurial type deal, whenever we own a lot of company, something went horribly wrong. And when we don't own a lot of it and it's a great company, something's going great because they're raising money at great valuations. They don't need the money to bring capital in. They give a shit about stock.

They don't want to give it to me. They don't want to give it to anybody.

They're going to charge a lot of money for that share of stock. That's the best kinds of deals we're in. Whenever we own 75% of a startup, of a venture backed company, it's because we had to bridge them three times, they had terrible financings. So I love it when entrepreneurs say, I don't need your money. I'll do it some other way. I'll just take a little bit.

Again, it puts you in a precarious position. But it's exactly what Julianne said, which is once you raise \$100 million dollars, you need to generate \$200 million, \$300 million, \$400 million dollars worth of exit to keep your investors happy. They're all on your board. They're not going to let you go down a path that's small. So your flexibility just went out the window. They're going to push you down a path that's big return, big win, and that may not be what you want to do.

PROFESSOR:

Let me-- in the materials, there's a PowerPoint on beginner's guide to venture capital. And if you haven't read it, you should have before the class. But these guys compete for capital to invest in their funds. And they have to show a return history to the people that are going to invest in them. And one of the issues is that when these guys put money in your company, that's when the stopwatch starts on how fast are they generating return.

So you've got to be prepared to have everything running as fast as you can once that money comes in. And they're going to push you to it, because they've got to turn around and say, to their investors, you gave us X and we returned so much time X. So even if you can convince them to invest in your company, if you're not ready to run like crazy, if you don't have a model that you think could work, pedal to the floor, it's going to be a tension filled environment. Would you disagree?

AXEL BICHARA: I would probably agree.

PROFESSOR: Was there a question? Then I'll ask one.

AXEL BICHARA: There's one up there. All the way in the top.

PROFESSOR: All the way in the back. All right.

AUDIENCE: [INAUDIBLE].

JULIANNE Well, so first of all--

ZIMMERMAN:

PROFESSOR:

Maybe generalize it so you could work it in. I was going to ask a variation of that, which is what are the biggest problems you see for people trying to raise money, because that's sort of what you're saying. I don't really understand how they're--

AUDIENCE:

[INAUDIBLE].

JULIANNE

ZIMMERMAN:

So here's the first thing. Or actually here's the zero thing. The zero thing is you really need to have not just exchanges like this, but you need to have meaningful exchanges with someone who's a mentor to you who can give you ongoing sanity checks and guidance. This is my plug for the MIT venture mentoring service.

It is the most amazing thing. It is free to you. Go sign up right now. I mean, seriously. Do not wait. Immediately. Go immediately. The premise of the venture mentoring service is that these amazing people, Joe included, will spend time with you to advise you and, under the terms of the program, cannot take any interest in your business.

And so it's purely objective advice. It's in your interest, not even in the business's interests, it's advising you personally as founder. So go get that. The first thing then after that is, forgive me if I'm reading too much into your question, but it sounds like you've already have some tensions that have already started. That's a warning sign. Klaxon's are going off.

If you already have significant frictions with someone and you haven't even made a financial transaction yet, I think you want to step back and think about where those frictions are coming from. Are they coming from legitimate discussion points, things that you're being challenged to think about that are in the interest of the company you're founding, or are they personal frictions? Are they differences, again, in objectives? What's behind those frictions? And are those productive frictions?

So both of my fellow panelists have spoken about the beneficial frictions that you can encounter, whether its from peers or from advisers and investors and incubator staff pushing, pulling, tugging. Those can be productive frictions. But if you're actually experiencing a lot of discomfort, I think you should listen to that.

AUDIENCE:

[INAUDIBLE].

AXEL BICHARA: I have-- it really depends on who you're working with. But I'll answer your question in a slightly different way. When an investor funds you, they probably make a whole bunch of calls. Who are you? What have you done before? What's it like to work with you? I'm often amazed how few entrepreneurs actually check out the investors.

> So if you take somebody on your board as a lead investor, call up three, four CEOs they worked with before. I mean, I would say it's almost irresponsible not to do it. And it's not just, oh, they're nice guys. Do they have a Rolodex? It's what happens when things get difficult. Because they will get difficult. How have they behaved in follow on financings, in work with strategic investors, at exit, management team building. If there's a problem with a founder/CEO, how do they behave under those circumstances. So just do the reference checks. Because as I said earlier, they can fire you, but you can't fire them.

JULIANNE

Did that answer your question?

ZIMMERMAN:

AUDIENCE:

[INAUDIBLE].

JULIANNE

ZIMMERMAN:

Mechanically, there are only three ways that anybody gets deals. You go out and get them, you get referred to them by peers and folks in your network, or you get cold submissions. That's it. There are three mechanisms. Different firms have different ways of going out and getting them. And by and large, the return on effort for an entrepreneur for a cold submission is pretty low.

So if you're someone thinking you want to raise venture funds at any scale, it's in your interest to go see who looks like the most likely best fit for you and go find a way to meet them. But really ultimately it's important recognize that those are the only three channels. There aren't any other channels. Does that make sense?

PROFESSOR:

What role do introductions have? Referrals? Entrepreneurs should be building a full team of people. Is that an important part of who surrounds them in your experience?

AXEL BICHARA: Wait, this seems to be to questions. Is a referral or the--

PROFESSOR:

In other words, having a deal referred to you, is that elevated higher in the stack if you know the person and how does an entrepreneur who doesn't-- get into that network? Any advice on that?

AXEL BICHARA: Well, I would say certainly anybody in this room should be able to get an introduction to any of us with-- I mean, it should be trivial. It's really not that hard at all to get good introductions and they absolutely do matter. And there's some that are good, some that are great, some that are not so good. But a lot of it is through networking, who do you know, and you absolutely want to pursue investors through strong introductions. It's a no-brainer.

AUDIENCE:

[INAUDIBLE].

AMIR NASHAT:

I'll take that, I guess. It just really depends on-- in the Langor Lab, we used to have a formula which was science-- you publish the paper in science, you file the IP, and you have animal data. You're ready to roll. That works in general. But I think I think that there's a point at which the technology and innovation stops being a series of questions and it starts being a series of answers.

And I think what you find is that that's a good transition wherever people who in academia like to ask questions are no longer really interested in pursuing that. And what companies like to do is create answers-- a technical translation of concept into a product. And the rigorous-ness of the precision of the answers and all those things becomes really important. And it just becomes boring. It's very hard to get a grad student to do it, for a postdoc to do it.

So I think that tends to be the point at which it kind of hits a stalling point in whether it then finds a home on the other side where a group of people say, yeah, this could easily be a product. Let's go for it. It's worth being a product. It'll either sink or swim. But I think I've always-- at least in the lab, you could see a trajectory of a project just stop being interesting to people because the next steps were kind of doing it 100 times to get the quality control levels right or what not.

To do a lot of animal work just wasn't that interesting anymore. So that's when we typically tried to kick it out. Yeah. When the questions become-- I think that curious people love unpredictability. And I think that scientists love unpredictability in the data. Every experiment you do, you find something you thought was going to do X and it's not going to do that.

I think that's a very hard way to make a product. I think that's kind of a good scientific discovery. I think at some point then it becomes a series of business unpredictabilities. Can we raise the money? And so I think when it transitions from being a science experiment to being technology is kind of when you go from questions to answers in my mind. I don't know how others--

AXEL BICHARA: I would answer it slightly differently in that there's so many potential investors out there. And I quess my view is more from a software, hardware tech company, not so much life sciences. By networking with potential investors from early on, you're likely to create value in what you're doing and that could be helping validate technology or not, finding competition.

> It's just interesting. What's a body language? Do you have really short meetings or are there people leaning forward and wanting to spend more time with you? Every entrepreneur needs to build a team from the beginning. I think value added investors have great networks and may give you feedback on where there at the holes in your team and maybe make introductions.

> Some of the best deals I've done is I ended up introducing the founders to each other. That doesn't happen to you if you don't go out and talk to people. So I would say, if in doubt, I would start turning financing sources earlier. That doesn't mean you do a big pitch and set up a meeting at a VC firm. That's let's grab a coffee at a Starbucks with somebody who has some domain knowledge and get some feedback.

AUDIENCE:

[INAUDIBLE].

AMIR NASHAT:

What's the triple one? What's the double?

AUDIENCE:

[INAUDIBLE].

JULIANNE

ZIMMERMAN:

So this is again one of those it depends kind of answers. The first thing that I think you have to recognize is that by declaring that you have multiple objectives, you've set yourself a much harder task. That doesn't mean it's not worth doing. But the point is, from the get go, you've set yourself a very challenging proposition.

And there is a much smaller segment of investors who are interested in that kind of proposition. Most of them are not here on the east coast. It's not that there aren't any, but most of them are not. You will find congregations of them at places like SoCap, the Social Capital Conference. You'll find them at places similar to that.

There are foundations that are beginning to do some investment because they may want to see a return, but they don't have to. So Omidyar for example is one. Domini is one. There are several like that. The Kahn foundation does some. But again, you're talking about seeking out investors who are a very tiny sliver of an already small pool.

So it just makes it incumbent on you to be that much more focused about really seeking out investors who are interested in your specific proposition. Not double bottom line or triple bottom line investors, but people who have declared publicly that they are interested in whatever it is you're doing. Because it really is a very, very narrow segment.

The good news I would say is that there is a lot more happening in that segment of late. It's very disorganized. Extremely disorganized. And you'll find that there are even more, on a relative scale, there are even more people looking for that capital than there are looking for conventional venture money, whatever that means.

So it's challenging. It's not impossible, but it's really incumbent on you. You need to be very, very focused in targeting exactly the right folks. That's the last thing I'll say about that is that there are some really good groups to join if you haven't already-- again, to share peer knowledge. So the social entrepreneurship groups, for example, are really, really worth being involved in to share intelligence with peer companies so that you can help each other out.

AMIR NASHAT:

If I can make a comment on it. Again, I'm going to color my comment by saying that I invest in biotech and health care stuff primarily. I find this whole concept of double, triple, and quadruple, and I'm sure people make up more bottom lines to be kind of intellectually-- like it lacks intellectual rigor. Without question, every single person I've backed, especially in the health care area, is not doing what they're doing to make money.

They're doing what they're doing to make a huge impact. If you want to make an apology for not making a huge impact by saying, well, I'm going to do some other stuff. I've got these multiple objectives. They've got one objective, which is to cure that disease. The faster they can cure it with the least amount of money, with the fastest amount of time, the most efficient way to do it is in the benefit of the patient.

And so what you find is that if you then want to treat the most number of patients with that medicine or that approach, the most efficient business model which creates the greatest profitability, which allows the maximum amount of sharing of value between the person that gains the benefit and the person who provided the benefit is the best way to do it.

And when you look at even in places where social entrepreneurship is a big deal, I think when you'll find ideas that really take off, it's because there's a sustainability to them. The person that receives the benefit is willing to share that benefit with the person that provides it. And I think this idea that we're going to skimp on all of that and not come up with a business model

that's the best alignment of everyone's interests is to me where I kind of get lost in the whole thing.

I feel like usually when you have these situations where you're kind of compromising, I suppose-- because every time someone said double or triple bottom line, which I'm not implying is your case, it feels to me like a compromise versus saying, let's align the interests of the farmer in the village who doesn't have enough money for the weather data, but they've got interest in other things-- let's find a way to make it a win-win-win and really line up everybody's interest.

And then it becomes actually only one objective, which is maximum impact for everybody in the equation. So I don't like the idea that it's compromise. And so maybe it's colored by health care and maybe my tech partners wouldn't necessarily view the world that way. But in every one of our health care companies, everyone's only got one objective-- cure that kid or make that impact.

And the money is just part of the whole equation to make it as efficient, the Carnot efficiency of the idea basically. Just get it as perfect as you can to line it up. So that's kind of the way I do it.

JULIANNE

I think you should get extra points for saying Carnot efficiency in a discussion about finance.

ZIMMERMAN:

This is how we know we're at MIT. We're geeks.

AMIR NASHAT:

Everybody understood it. No one was not understanding it.

PROFESSOR:

It's on a cheat sheet beforehand.

[LAUGHTER]

What about with all the different--

AMIR NASHAT:

They don't use that word at Harvard, that's for sure.

[LAUGHTER]

PROFESSOR:

With all the different financing sources that are out now with crowdfunding coming on and the traditional friends and family and everything, can you talk a little bit about mismatch of investor groups? Have you seen deals that were really good deals but they got the wrong initial investors and you can't work with them and you pass? What kind of watch words would you have for people about how they approach that? Is that a common mistake? Or anyway, just

can you comment on that? Anybody?

AXEL BICHARA: I can start with a few. The most classic is-- well, I guess the two classic ones that jump to mind right away are amount of capital relative to the opportunity, where you're going after some marketable opportunity which turns out to be kind of narrow, but you've raised so much money that you kind of need to assume a level of success that the market will just not yield.

> These are the worst deals. And the conflict may not happen immediately, but it happens over time. So being realistic about the potential of the market you're going after and raising the capital to really pursue the upset over time, but not all upfront because you think the stars will line up in terms of what you pursue. Some of the worst deals I've done had exactly that problem.

The other one-- strategic investors. Strategic investors, by definition, have a strategic interests and not primarily a financial interest. And just think about how long it takes to build a company. I would say most overnight successes took 10 years to get there. So let's say there's a 10 year time frame to build a great company. During those 10 years, whoever did the deal from the strategic investor, which is often a biz deaf, culp deaf person, whatever.

You've gone through two or three board members. They totally forgot why they invested in the first time. They're not professional investors like VCs. And you inevitably end with-- not inevitably. You very, very often end with situations where there's a lawyer for some strategic investor sitting there reading the fine print of the legal agreement done eight years ago looking at all the rights they have and really becoming a nightmare to work with.

I've been in situations where the strategic investors, you're trying to go public, strategic investor has a board seat. I'm not signing off on DS1. We don't want this company to go public. People actually do that. Professional investors like VCs would never ever do that. So I think having professional investors on board first before you take on strategics is a very good idea, because professional investors help you get the terms and also relative ownership and all of that right with strategics.

And I've just seen it so many times, that it may even be great for a few years. But over the life of a typical company, you very frequently run into significant issues.

JULIANNE ZIMMERMAN:

The other thing that I've seen happen again and again is where there have been large numbers of early investors, whether they're friends and family or loosely affiliated angels or what have you, and someone has made the oversight of making decisions unanimous. This is a nightmare. Because what ends up happening is you might have, who knows, 17 or 20 or God knows how many individual parties who have to sign off on every subsequent thing that happens.

And I've seen this happen many times. It it's a terrible mistake. It costs an incredible amount of time to fix that and go back. And I've seen individual investors who have put \$10,000 into a company just tie up deals for days or weeks or even scotch deals. So not just strategic, not signing an S1, but individual very, very tiny investors preventing a deal from happening.

So if you do the friends and family route-- I would not advise you not to do that-- just make sure that you have good counsel. You don't have the benefit of a professional investor to advise you. Make sure you have good counsel to structure that round so that you're not bound to having every single person participating agree with every future decision you have to make

AMIR NASHAT:

I'm going to give a squishy-- like an early biomarker or squishy answer for how I kind of have viewed people I have found difficult work with. Again, we're kind of in the same boat most of entrepreneurs are in. We invest early. We bring other VCs on the board and we get frustrated by our colleagues. So we're like, pulling out our hair, too, sometimes.

And so I've always found that investors that actually ask a lot of questions-- and it's very specific to a particular deal. Someone who's a good listener asks questions and is just listening and questioning is usually probably a better investor. Whenever I've been in these kind of nightmare situations, you later kind of remember that, you know, they didn't really ask a lot of questions. They just told me a lot stuff.

They kept lecturing me about my idea, my company. I think usually that's like my first alarm bell whenever we're involved in stuff. And it can go wrong 1,000 different ways. But if they're not asking you interesting questions and listening, you're probably in for a bruising relationship, in my opinion. And the sooner you get-- and then reference checks, whoever said that earlier-- Axel had say reference the hell out of investors. We do.

PROFESSOR:

We're coming up close to break time. Maybe one last question and then I'll ask the panel if you have any last comments. Don't feel you have to, but if there's something that's pressing. Was there a question over there?

AUDIENCE:

[INAUDIBLE]. Do you know they are going to have to be part of the gang that's employed,

would you go talk to them straightaway if they were very [INAUDIBLE].

AMIR NASHAT:

I'll give you a general answer. I think you should get rid of your biggest risk with the least amount of money as fast as possible. And the way you described the situation maybe your friend has-- it's like, my friend has a rash, at the doctor--

[LAUGHTER]

I guess is basically like, if there's a point at which you are stuck, then you should get unstuck. I'll give you an example. Sun Catalytics is a really good example. If I'd gone to my partners--we were developing this energy stuff. And one of the big markets was India initially for the company. If I'd gone to my partners and said, hey, we need to put in a bunch of money. It's going to be great. We're going to go commercialize in India and all this. Or any other VC people.

They'd say, India? What are you going to do there? So very, very early in the life of the company, I realized we needed to have that fixed, because it's a major risk that one of our largest markets was one nobody new. So we went and we did a deal. We got an investment and partnership dollars from the Totten Group. I've never heard that question in four or five years about the company.

We can say anything about India. Yeah, we're going to go sell spaceships in India. They're like, oh yeah, you're with Totten? No problem. And we just basically got rid of the biggest risk which was this perception that there was no market by solving it. Now could we have gotten better terms later or whatever? Maybe, but I got rid of it at the earliest point in the context of deal.

And so if you're really going to be stuck with these guys, I think you're going to worry about that, that you don't get rid of your big-- whatever your risks are. I always kind of list them and I say the biggest one first.

JULIANNE
ZIMMERMAN:

I absolutely agree. The other thing that I think you want to be really careful about is if there's honest to God only one major player you need to cooperate with you and whatever that means-- first of all, you want to make sure you're not going down a cul-de-sac. Not only do you want to retire the risk, but you want to make sure that you're not aiming for something that's not going to exist when you're ready to get there.

So you really want to understand what's in it for them, not just now, but when you're ready in whatever, a year or five years. Are you aiming for a place where they will no longer be? Because what you don't want to do is spend that next chunk of your life going into a blind alley. And I wasn't here last night. I miss Bob's talk. But I've seen it before.

And if I remember correctly, one of the things that he likes to say is, go talk to people and don't try to sell them. Just have a hypothetical conversation. If I had this, would that interest you? I understand your interests like this, do I have that right? Do I understand what you really want? You can have those conversations without having to make big disclosures, without having to formalize any kind of relationship.

And just like you want your investors to ask questions, you want to be asking a lot of questions along the way of any party you're going to be working with. And if it's really true that you are going to be dependent on this one entity, then you really need to understand how vital it is to them that they're going to get to have access to whatever you're developing.

And you need to stay very close to that vital interest because even if you sign a deal with them today, as Axel said, people change roles. They go on and work for another company. You lose a champion, and if you don't already have a deeper connection with that organization, you could be talking to a lawyer, which is not a really great feeling.

So yeah, you definitely want to prioritize your risks. You want to retire them. You also really want to understand if you're really pinning your prospects on this one company, you better make sure that they're going to be there when you get there.

AXEL BICHARA: So I would get the deal done early, at least get started early, but get people experienced with deal making on board, whether it's an investor, advisory, friend of the company. Some of these big strategic deals, they may take more than a year to get done. And the way to think about them is really like a chess game. You need to think a bunch of moves ahead to really achieve your objective.

> And I'm a big believer in skilled negotiation actually creating value fundamentally because you find win-wins, alignment of interests, and you may only discover that after five or six moves in the chess game. And people who have done that many times in their lives, just from experience, turns out they can add a lot of value. So that maybe another perspective.

PROFESSOR:

Are there any final words of wisdom you'd like to impart? Well, we'd like to-

AXEL BICHARA: Not met.

PROFESSOR: I think have some very valuable MIT-- [LAUGHTER] no, wait, wait, wait. These are MIT paper

weights. You can have them if you promise not to throw them at entrepreneurs. I leave it to

your discretion of whether you use them with your investors, your fellow investors. And we'd all

like to thank you very much and hopefully you'll stay around for a few minutes for a chat. So

thank you.

[APPLAUSE]