

Robert Toker of Lantha Sensors

Speaker1: [00:00:04] This is the Investor Connect podcast program. I'm Hall Martin, I'm the host of the show in which we interview angel investors, venture capital, family offices, private equity, many other investors for early stage and growth companies. I hope you enjoy this episode. Investor Connect is a 501 C three non-profit dedicated to the education of investors and startups for fundraising. Please consider donating \$100 to the program to help others in their investor and entrepreneur journey. You can find the Donate button on the Investor Connect org website.

Speaker2: [00:00:44] Hello, this is Hall Martin with Investor Connect the day, we're here with Robert Toker, Chairman and CEO, Lantha Sensors. Founded in 2019 by a team of world class businesspeople, scientists and technologists, Lantha sensors offers an alternative to high cost slow trades chemical analysis such as NMR and Carl Fisher titration. Robert, thank you for joining us.

Speaker3: [00:01:05] Yeah, thank you. I appreciate making time for us.

Speaker2: [00:01:08] Great. So tell us about your background before investing in early stage companies.

Speaker3: [00:01:12] Yes, so I've had the proverbial non-linear background, so I've been involved in software companies, materials companies, medical device companies on both sides of the table, so both as an entrepreneur and as an investor, since moving to Texas, which is about 16 years ago, now been very much focused on energy. As you would expect, clean energy, everything from bio gas projects to solar projects and most recently, chemical projects. So spent the last seven eight years doing large tolling projects in the chemical business. So we did a project in Baytown, Texas, called Raven, and that's the dimerization of ethylene to butane, one on a tolling basis and very difficult to do those projects. So it's a non-recourse project finance type project and very common in pipelines and power plants. Not very common in chemicals. So eclectic, entrepreneurial and investor background. That's that's I guess that's me.

Speaker2: [00:02:13] So what excites you right now?

Speaker3: [00:02:16] So I became alerted to this technology that had been quietly incubated at U.T. for the better part of 10 years, it had been in the university. I learned about it in summer 2019 and I became aware of its potential pretty quickly. I think I met my technical co-founder, Simon Humphrey in May, and I think by early June understood that the bones of a venture fundable company are there, and we should marshal resources to make sure that this sees the light of day that this gets to market. I can kind of amplify that. I can tell you quite a bit more about that. However, you'd like to whatever you'd like to know,

Speaker2: [00:02:55] That sounds good. Let's talk about your advice. Do you see a lot of startups and investors out there? What's your advice for people investing in startups in your sector? What do you tell them to do before they write that check?

Speaker3: [00:03:07] The first piece of advice, and you and I have crossed paths at around the rice business plan competition and other venues, my number one piece of advice for entrepreneurs is be careful whose advice you take because everyone thinks that they know some special insight either into the way the business world works or in the way the technology world works, and everyone trusts their own background. So my advice is, you know, it's easier when you're a little bit older and you have a bit more experience is keep your own counsel like people come in pretty forcefully, especially folks that have had success. They come in fairly forcefully and tell you, kind of, well, this is what you need to do. And my caution would be so entrepreneurs be careful on that with investors. There's a reason why venture investing is fairly formulaic. You're looking for a large addressable markets, you're looking for capable teams with appropriate domain expertise, you're looking for highly differentiated technology, you're looking for protected technology, you're looking for technology that could be extended into adjacent markets, you're looking for strong margin opportunity. If you're succeeding, you know, can you make money on every transaction? All these things boil up to what makes a worthwhile and interesting opportunity. In essence, I mean, I boil it down for the investor into kind of three simple questions, and it sounds super simple to ask, not easy to answer in practice. Is it real? So is the technology and the approach real? Determining that is very difficult, especially in an early stage. Can you win? Can you displace competitors, can you go into the market and and win? And is it worth it at the end of the day, you know? Are you spending a million dollars to make

one hundred thousand dollars at the end of the day? Is it worth it for the founders, for the early investors and obviously follow on investors? So yeah, that would be my advice.

Speaker2: [00:05:07] Right? Well, let's talk about the state of startup investing. How do you see the industry evolving from here?

Speaker3: [00:05:14] I think we're at a bit of an inflection point, I think in startups, I mean, it's hard to kind of bundle all startups into one basket. I mean, obviously there are parts of the world that are completely overheated. We're living in kind of the time of corona, crazy valuations and kind of the unicorns. And I called a lot of those companies the proverbial dog walking apps. It seems like there's an incredible number of kind of meta investments out there, and investors are hurt animals just like everyone else. It's very easy to be first to be second, and I think that what I'm interested in are harder things. So it's called hard tech, deep tech, tough tech technologies that are really kind of the knowledge frontier. And the interesting thing for me right now is around clean tech and ESG type investing, and this is where I think Texas is very well set up. There's no Texas and anywhere else has no monopoly on smart, motivated people. Those people reside in Shanghai and Tokyo and London, as well as Austin. But Texas as well set up to do really deep tech energy stuff as any place in the world.

Speaker2: [00:06:25] Great. So what do you think is the biggest change we'll see and say the next twelve to twenty four months in the startup world?

Speaker3: [00:06:31] One thing I definitely know is the crystal balls have always been broken, so I hesitate to get the crystal ball out. You know, I've been wrong about a lot of things. Recently, I thought that bitcoin was not going to take off the way it did. I thought the Tesla was overvalued a year ago, so consider the source here. So I think valuations will come down to earth in some sectors. I think that that's a safe statement and I'm old enough to have lived through the the late nineties and kind of the first internet wave and some of the valuation kind of hysteria there. I'm hoping it doesn't kind of have a big knock on effect outside of certain sectors. I think clean tech is a durable opportunity. You look at the amount of money that's lined up serious institutional money, including venture money lining up and clean tech. I've been involved in several clean tech companies and it's not easy. Manipulating bits and electrons is one thing, but once you kind of get into manipulating atoms and you know, real objects and energy balances,

it's far more challenging. So I think direct investment, I think that the venture model for certain types of investing really works well. I think people are looking for direct investment opportunities as well. You're seeing that on the institutional side with insurance companies and endowments, but also individuals on the venture side.

Speaker2: [00:07:53] Right. Let's talk about your investment thesis and what you look for. What exactly is it and what your criteria for funding startups?

Speaker3: [00:08:02] Yes, so when I look at things, I mean, I've kind of alluded to this before is I will put it this way, the recipe for technology investing is super simple. It is. Does the team does the company know something that nobody else knows? And are they able to marshal resources around that that plan and execute on it in a compressed time frame? So the essence of strategy is very simple. Its objectives, resources and time. So is their objective clear. Is it achievable? Is it a boil the ocean strategy? Do they need crazy amounts of time and resources to actually get to market? So what I look for is like, you know what? Any other kind of energy type venture investor looks for capital efficiency, team markets, differentiation and ability to execute, stating the obvious. I think probably most of your listeners know this, but I'll say it out loud as the classes of risk. There's technology risk. Sure, if you're doing early stage investing like you're in the business of burning down technology risk, there's market risk. So when you get out to market, who you hurting, like, who are you displacing? You're hurting someone and then execution risk. So when I look at our business, the businesses that I've been involved with, we take on technology risk and accept that and manage it. We want to really understand market risks right from the outset. You know, can we compete and then do we have the resources to execute? Is it a boil the ocean strategy or is it something that's managed by human beings with kind of human processes?

Speaker2: [00:09:42] Right. So let's talk about the challenges in the startup space. What do you think is the main challenge startups face in today's market?

Speaker3: [00:09:50] I think there's a lot of meta deals out there. I'll focus on energy because that's kind of where I spend most of my time energy and chemicals, and a lot's been written about the Valley of Death, the crossing over from early stage kind of lab scale stuff, the university based start up to pilot, plant and demonstration plant where there is a second valley

of death for a lot of like hard stuff, especially process technology is crossing over from demonstration scale, where you need 30 50 million dollars to commercial scale, which is you need two hundred million five hundred million dollars. And no one is off ready to offer a process guarantee or a license guarantee that basically guarantees the technology. It's brand new. So like when I look at the aspirations around ESG investing and climate investing, all that stuff, there are a lot of technologies that sure, they made it to pilot. You know, they spent 10, 15, 20 million dollars to get to a pilot plant. They they spent more money to get to a demonstration plant. But who's going to write the check the first check for two hundred and fifty three hundred million dollars to get the first commercial to really demonstrate commercial readiness. And you are seeing more of that. You are. But there's a gap there between private equity and energy infrastructure type investors versus venture investors. But there was a Series B, it was a group up in Boston that just did a one point eight billion dollars Series B for nuclear. And that was this week. So I was thinking, it's like, Well, the world is definitely changing. The risk appetite is changing, and I think there's just so much money sloshing around that people just don't know where to put it. Like, there is more money chasing deals than there are kind of good quality energy deals. And that's not only for technology. I think that that's for project developers and established projects.

So is that the challenge investors face there's too much money or how would you state that?

Speaker3: [00:11:51] Well, I mean, I would look at it, it's kind of the flavor of investor, I mean, for a project investor, yeah, I mean, if you're sitting on \$5 billion that you get to get out the door in three years or five years and your fun life is 10 12 years and you can't take on development risk, that's not part of your fun mandate. You're looking for the perfectly contracted de-risk project. There's a lot of those guys out there, you know, there's hundreds of them. There's hundreds of billions of dollars of kind of project money that's on the sidelines waiting for the perfect project. And it's all Irwin, but also, you know, pipelines and chemicals and other things. But to get to a derisk project, it takes a lot of effort and it takes risk to get all those contracts ended up on venture. By definition, that venture has an appetite for risk. I think what you're seeing, though, is like if you present something to venture right now, that's really quite different. And I'm not talking kind of crazy man like this guy is obviously not going to be able to execute on this plan, but I'm talking about a highly differentiated product. It's tough to sell people on something that's truly different. I think that part of it's like investors or human beings

like everyone else, and they don't want to be putting themselves too far out on a limb like, oh yeah, well, x y z funded something very similar last month. It's like, Well, this one looks like that. Let's go do that. But if you present something quite novel and you have to do a little bit of brain damage to understand the technology or understand the approach, I think that there's still a problem there, whether like folks are really ready to take that leap. There are groups out there, but not the most common.

Speaker2: [00:13:32] Yeah, well, you see a lot of sectors and applications out there. If you had to pick one or two that you think are good immediate opportunities for investors to pursue, what would you put at the top of the list?

Speaker3: [00:13:42] Well, I think that this is probably like an unpopular thing to say in most of the country, but in Texas, I think oil and gas is going to be extremely attractive over the next five to 10 years beyond five to 10 years, who knows? But the whole industry is incredibly capital constrained. So what that means is demand is not abating. Global demand for oil and gas is not abating, like over the next five or 10 years. So you have a capital constrained in industry with not a lot of new exploration happening in the majors. You'd still have independence doing that. But the blackrock's of the world going out and saying that we're not going to be funding projects is a big, big deal. So you're seeing a pullback of trillions of dollars of production money from the industry. And so the idea of seeing routinely hundred dollar oil, one hundred and fifty dollars oil is going to be a thing. I really do believe that and I'm not. It's not just me. It's you know, again, I don't have a crystal ball. But concerns aside, that is going to be a big opportunity area and same for natural gas. If you look at natural gas as a bridge fuel and you need natural gas for the hydrogen economy and the folks that are placing big bets on the hydrogen economy, they're going to need a lot of natural gas. And again, it's the whole industry is capital constrained, stepping further back. My expertise is in energy and chemicals, so I don't have a strong opinion about a lot of consumer type things and enterprise software.

Yeah, I mean, it can be interesting, but looking at energy for the foreseeable future, you look and foreseeable means like 15 20 years out. We are looking at climate issue. We're looking at a carbon constrained world. There's a consensus building, not so much in the U.S. we're still split, but globally this is an issue. So you're seeing money kind of going into those projects. It's solar and solar. I mean, not just projects, but solar materials, new approaches, the solar cells, inverters, software controllers, I mean, sensors, sensor integration right across the piece on

solar wind, you kind of stack a wind turbine and what wind looks like, well, there's opportunities in materials, there's opportunities and gearboxes, there's opportunities and the tower, you know, you know, wind is getting bigger, it's getting offshore. I was involved with early efforts with pairing kind of offshore oil and gas in Texas, you know, the Offshore Technology Conference in 2007 and 2008, pairing the oil and gas world with the wind world. How do you kind of why not put these wind turbines out on production platforms? That's something that could be done in Texas. That's something that could be done in Houston in particular, and now it's being done. So I think wind has a future and offshore wind as a future. It's expensive, though, it's getting cheaper, and it is expensive, and I think it's safe to say that folks that are used to paying retail price in Texas seven or eight cents a kilowatt hour for electricity, they're probably not going to be paying that with offshore wind, like in places like Europe, where they're laying constrained and they don't have a lot of options for clean energy production.

Offshore wind can make a lot of sense, but those folks pay twenty twenty five 30 cents a kilowatt hour for electricity. So there is this inflationary pressure on some of these clean tech investments. So you go down the list bio gas, biomass, biofuels, sustainable aviation fuels, renewable diesel. There's opportunities in all these areas and in certain locations. They make all the sense in the world and other locations. They make no sense at all. So my focus would be ESG investing emphasis on environment. There's, you know, in climate, that's where I would spend a lot of my time. There's nothing new there, but I was involved in kind of investment funds back in 2008 2009 that. Didn't pan out like that wave of kind of clean energy investing kind of petered out. A lot of people lost money on that wave because things change. Fracking showed up, you know, and horizontal drilling in a big way. And the political climate in the U.S. just didn't support kind of that green wave this time around. It's only been 10 years that this time around feels like it's a more durable wave, and it feels like the pullback from oil and gas and coal. Obviously, the capital pullback is real and creates opportunities on the green side, and as I mentioned at the outset of that statement, it creates opportunities for for oil and gas as well.

Speaker2: [00:18:23] So great when the last few minutes that we have here, what else should we cover that we haven't?

Speaker3: [00:18:29] When I look at the investment environment out there, I think about the entrepreneur because I am one how best to kind of find and unleash kind of human energy. And

you know, I'm older. I'm fifty one years old now, so I've been around the block a couple of times. But there are folks, younger folks, the proverbial twenty five year old who can go work for Google or Goldman Sachs, or they can kind of throw their hand in on starting something new and perhaps a bit more interesting and perhaps a bit more valuable to society, I think. The question I have is how can individuals and institutions kind of help those folks take a harder decision? Like, how do you kind of not an easy decision? Yeah, you go work for Goldman Sachs or you go work for Google, like a harder decision is OK, I'm going to go do something hard, risky. You know, there's no guarantees I think of like you may have heard of Ernest Shackleton. He's a British Arctic explorer and his boat, the endurance or ship. The Endurance got stranded on the ice for three years, and when it put out his recruiting flyer for his crew, he said There's no guarantee of return. You know, he's very upfront about the risks that that his crew would be encountering. The amazing thing about Shackleton, though, is like they all survived, which is just miraculous. I don't know if this I wouldn't characterize his expedition as a success. It probably did take years off his life, but they all survived and they didn't take kind of the the easy life they took kind of a more challenging choice.

Speaker2: [00:20:03] Great. Well, so how best will listeners get back in touch with you?

Speaker3: [00:20:07] Well, I spend all of my time on my startup planet, the sensors, and we're here in Austin and I'm interested in connecting with folks. I'll give you my email address. That's Rob at lanta sensors. That's L.A. HCN, Suarez. And if you want to call me too, I'm happy to get a call. If you want to talk about technology investing and in chemical sensors in particular, always happy to feel those calls. Eight three two two five seven seven seven seven five Right.

Speaker2: [00:20:39] We'll include those in the show notes. I want to thank you for joining us today. We hope to have you back for a follow up soon.

Speaker3: [00:20:44] Great. Thanks for all. I appreciate it.

Speaker1: [00:20:47] Investor Connect helps investors interested in startup funding in this podcast series experience, investors share their experience and advice. You can learn more at Investor Connect. Talk All. Tim Martin is the director of Investor Connect, which is a 501c3 nonprofit dedicated to the education of investors for early stage funding. All opinions expressed

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