Equity, Diversity, and Inclusion Across the Proof of Concept Network

Session Transcript:
2021 Proof of Concept Network Annual Meeting: Equity, Diversity, and Inclusion Across the Proof of Concept Network

Julius Korley: All right Good evening from the East Coast my name is Julius Korley and it is my pleasure to welcome you to equity, diversity, and inclusion across the network, I bring you greetings from the University of Delaware the XLerator Hub.  I'm the UD PI, I co-chair along with Monique the Proof of Concept action committee on EDI called PACE an advisory committee to NIH on EDI issues, we collaborate nationwide to advance inclusivity, and opportunities throughout the innovation communities.  We have been working really hard with the working group since March.  And hats off to Jake and Ian for starting this group and tapping Monique and I to co-lead, we've chosen some key initiatives to work on and hope to share the exciting news with you in early '22.  Additionally we would like to -- but we also want to focus on the passion around these EDI efforts and it's a sign of the times.  We're trying to capitalize on that.  But that's enough about PACE for now.  Today I have the pleasure of serving as your moderator. We have a wonderful panel discussion with some excellent speakers who are making great strides in EDI.  Our plan is a brief introduction and each panelist will have about five minutes to discuss the program and/or tools and how they contribute more to equitable access to achievement and innovation.  Afterwards we will have questions from, I have questions for the panelists and finally we will hear from the audience and Monique will be facilitating that.  And to kick us off, Monique, can you briefly introduce yourself and Almesha you're up next.

Monique Quarterman:  My name is Monique Quarterman. I use the pronouns, she/her/hers.  I'm a black woman with a floral jacket for anyone using accessibility equipment. I proudly serve as a co-investigator to the KYNETIC Hub, the Kentucky Network for Innovation and Commercialization also a co-lead to the PACE group which is a fantastic group of people across the nation, all passionate about equity, diversity and inclusion. I also serve as executive director for Kentucky Commercialization Ventures a public-private partnership here in our state that expands access to commercialization for regional universities and community and technical colleges. I promise I'm not the interesting one here. Super excited and grateful to all of our panelists for joining us today, they have been visiting the PACE group often over the past year sharing from best practices so happy to learn from them again today thank you.

Almesha Campbell: Greetings everyone my name is Almesha Campbell I'm happy to hear that Monique has more jobs than I do.  But I serve as the Assistant Vice President for Research and Economic Development at Jackson State University, a historically black college and university in Jackson Mississippi.  I also serve as the director for transfer and commercialization, center for innovation and entrepreneurship and the executive director for EnRICH program, a healthcare pre-focus XLerator program for historically black colleges and universities funded through this Hub.  So again thank you very much for having me today.

Julius Korley: All right.  You muted yourself.

>> Sorry, Eric.

Eric Padmore: Hi everybody, my name is Eric Padmore, I'm a senior policy adviser in the OD Office of Extramural Research.  I am one of happy to say one of the founding five as I like to call it in my previous role at NHLBI who helped to stand up the REACH and NCAI acceleration Hubs, and I would like to think that one of my proudest accomplishments I said we need to hire this guy named Alan O'Connor from RTI.  If you heard his previous presentation, he's been a tremendous asset of the work that RTI has done to really help us do the five things that he said we needed to do in terms of accountability, and tracking the results of that effort.  In one of my current roles, I also have the privilege of serving as the co-chair of the entrepreneurial workforce development group, and I do that with my colleague Stephanie Fertig, who is the HHS lead for the small business program.  So happy to be here and to be part of this dialogue.

Julius Korley: Thanks Eric.

Jonathan Fay: Hello everyone I’m Jonathan Fay I have two hats that I wear I’m the executive director of the center for entrepreneurship in the college of engineering at the University of Michigan.  The other hat I wear is, I'm the executive director of the Midwest I-Corps node, soon to be the Great Lakes I-Corps Hub.  So we're very excited about both of those things.  In my role as the director for the center for entrepreneurship my center engages with about 5,000 students every year.  About 2,500 in credit bearing courses innovation and entrepreneurship at about 2,500 in our co-curricular programs.  In terms of my role with the I-Corps Hub I've been an instructor since 2012 when the program was initiated.  And since then I've moved into administrative roles helping with curriculum and all of the different kinds of network effects that we're trying to generate here in the Midwest.

Julius Korley: Thanks Jonathan now let's jump into the programs and tools that you all have been utilizing that contribute to equitable access and achievement innovation, Almesha can you tell us a little bit more about EnRICH?

Almesha Campbell: So the EnRICH program is engaging research as an innovator in commercialization at HBCUs. I mentioned HBCUs are historically black colleges and universities, the majority of them are centered in the south region. So when we decided to, the group of us that are a part of this XLerateHealth, University of Kentucky, commercialization office and Jackson State University created EnRICH because we realized within our Hub the HBCUs that were engaging didn't have technology transfer offices and most of them didn't have commercialization activities.  But then we began to expand that to go to other HBCUs outside of the southeast region because of the interest that we had. So by the second year, that's what we did. So it's a health focused pre-accelerator program where we're giving them the basic tools of technology transfer. We also talk about commercialization.  Key information about how to do a start up, as well as expanded it to some of the I-Corps training because I'm the principle investigator for the JSU I-Corps program here, because we thought in the ten week program we can incorporate that piece, at least four-weeks of that into the curriculum so they can get a clear understanding of what's needed for them to take an idea from the lab to the market. And get them ready for full accelerator programs and other engagements outside of that. So basically, starting at the very lower level of that entrepreneurial mindset that access to tools and resources that they may not have at the institutions. Because Jackson State University is one of a few HBCUs out of the 115 that has a technology transfer office. So we wanted to be the lead in that, an example of how we started our operations and we moved into commercialization with the limited resources that we have.  And I was always trained by my new VPR. It's when you have limited resources is when you should be most innovative and creative. That's how we developed that program with the standard from the first year which is two different HBCUs participating to now we have about 9 different HBCUs participating in the program.  We're working on efforts to increase that so that we can get more engagement from the different HBCUs.

Julius Korley: Excellent.  Almesha, I really love that as you know, I'm a product of an HBCU as well, Clark Atlanta university. One of our mottos you're only limited by the limits of your creativity. So your VPR was spot on. Okay, Jonathan coming to you next, tell me what you're doing with your programs to increase innovation and achievement for all?

Jonathan Fay: Yeah, so I think, one of the things we did over the past several years, obviously we're tracking participation in our programs and seeing who's actually taking as advantage and who's not.  And then we've done a lot of work and research actually published by Nathalie Duval-Couetil and Eileen Wong Sod on what are the background reasons for that. So one of the key reasons that was identified was just this self-identity as an innovator or as an entrepreneur. Certain demographics just don't respond to that identity as strongly as others and kind of self opt-out of participating.  So one of the things we did with our Hub proposal was really try to attack that head on, how can we get in front of that so as they're spending time in our universities on the research side, they're developing that self-identity as an entrepreneur, as an innovator so that if the time comes for them to engage in commercialization activities they already see themselves that way and therefore will participate.  And so we've done a couple of different things to try to do that.  One is we've developed a set of programs called pathways to impact.  And these are really targeted at first-year PhDs or brand new faculty members to get them to think about themselves and the impact that the research is going to have and kind of by at adjacency lead them towards activities of commercialization, talking to people about the research and the impact you're trying to have to understand how it might be implemented in the real world.  We already have three workshops we piloted.  How to get the most out of the PhD, Being a faculty innovator and PhD career options.  We'll try to launch two more ideas worth pursuing kind of a historical perspective on innovation and entrepreneurship in the coming years we're excited about that. With that is the role of mentors, we have really found a scalable way of finding and matching different people with mentors throughout our network. We have a system called Protopia that uses artificial intelligence to help us do that matching both in terms of the interest of the students. We can also use demographic information to also do the matching. All of the mentor matching was one-on-one ad hoc, no you we have 3,000 mentors in the pool.  We asked this last semester wove done over 300 matches this semester -- we've done over 300 matches over this last semester that we could have never done with staff members.  Excited about both of those.

Julius Korley: That's really awesome.  It's one of the initiatives that we're trying to attack in PACE the mentor the mentorship issue.  Eric you're up next.  Tell me about the programs that you're doing at NIH to increase the response to be more inclusive in terms of innovation.

Eric Padmore: Yeah thank you Julius, as you can imagine there are a plethora of things that have happened, let's talk about just a couple. When we issued the fellow for the REACH Hubs themselves, one of the things we did as an evolution from the NCAI was to actually include the requirement for a diversity plan as part of that application in recognition that we weren't seeing the kind of participation that we hoped for in the additional NCAI responses which came back I believe in 2013 that was step one. Specifically around entrepreneurial workforce diversity, there are a number of things that have happened over the past three or four years, and I just want to highlight a come of those, we can get into more as the discussion goes on is one of the things that has happened is around the application systems program which is really a mentoring effort for people who have not successfully competed for small business awards or who haven't been given an award over the last ten years. And it's a ten week program in which they are mentored through the application process, and guided to help make their applications more competitive. And they are now I believe we're up to ten institutes that are participating in that program. And I think actually, the application deadline for this next cycle is in two days. So it's timely to talk about that now. Happy to talk about that later. The other sort of key piece that I think is important is the diversity supplement, which we evolved out of the original kind of omnibus diversity supplement that was available for all NIH awards in recognition that there were specific requirements or limitations in the small business program that made applying for that really not work for people. So we designed a specific small business diversity supplement which is inclusive of people all the way from undergrad up through postdocs and provides the opportunity for small businesses to hire minority or underrepresented applicants into their business programs and get them exposed to them.  I believe Jon Lorsch part of his presentation yesterday also referenced the links between the NIH UNITE program, which is the larger DEI initiative sponsored by Dr. Collins’ office and the specific work within that which is the e-team, which is now looking at ways to provide links and matching for students to persons out there in the research community to other businesses through the university supplement program.  So that's kind of an extension or ripple effect of the efforts that started within the small business program and are now branches out across all of NIH, any number of the institutes, particularly over the last 20-24 months with all of the social awareness around these issues are now beginning to implement their own kind of things. I think one of the more notable ones perhaps is at the National Institute of Aging where they have put together something called the REDI program.  And there are a number of different components within that in terms of entrepreneurial readiness.  There are K Awards for training, there are mentorship awards, R25 awards.  They've really put together a comprehensive table of offerings if you will, or funding mechanisms that help support DEI. That's one representative example of any number of things that are now happening across the NIH.  Let me stop there and we can get into more of that as the discussion continues.

Julius Korley: Sounds good, thanks Eric.  Almesha.  I've been told that I didn't mention that I am the co-director for the northeast region Hub kicking off in January along with Jonathan.  But, along with that process, along with that customer discovery process that's taught in I-Corps.  What kicked off the discussion and development of your resources Almesha.

Almesha Campbell: One of the things that we at the southeast XLerator have, we have maybe four different HBCUs that are a part of that. The whole idea was to include them so we can share resources and help them build capacity. But realizing that something is fundamentally missing from the process and you know, the language that we may use in our conversations may not have been what they understood so we had to figure out how can we help. And how can we use Jackson State University as an example being that we had a tech transfer office for the last 12 years and how can we use that to show that this can be done.  Even if it's at a small scale and scale up afterwards during the process.  So the process of discovery was actually done to figure out what are the needs for the different HCBUs, what are they lacking?  How can we help?  What are the strong points?  There are only four or five with medical schools that would bring out healthcare focused technologies.  But then you have the public health department.  You have the chemistry and biology that does a lot of work that are NIH related work.  So you wanted to reach those people as well.  As we're talking about EDI, we have to be intentional in how we develop programming for different audiences, right.  So even for HBCUs when we are developing programming with we to look at the capacity, we also have to look at the availability of the faculty to provide the time and effort needed to engage in some of these activities that we're talking about. Because, quite naturally they have high teaching loads when you look at student to faculty ratio, and different things. So that's one of the reasons why that program was created. The way it was. Even when we talk about maybe reducing the number of weeks of the program, because initially ten weeks seems like a lot.  But then I couldn't cover enough material even in a seven week process. But we did our customer discovery and we realized they didn't mind giving up Friday afternoons for ten weeks.  Even when we tried to say okay, we're not going to meet this week because it may be Easter weekend or something, trying to give them some time back because they have time away from the classroom, both faculty and students.  So to our surprise over the last two years they still show up on those holidays, right. So we saw that there is, did he have it in a need for the program.  And so that's why we have invested so much time in making sure that the program is really making it's intended impact and that we're meeting people where they are.  Because we're not expecting them to come in, already have a product, already have the greatest idea and all we need to do is four or five steps.  We come in understanding that some of them may just need a post on the entrepreneurial mindset.  Some of them may just need to know where to go to and who to have access to. And some of them may have mentorship, we wanted to have the program in a way to reach people within the HBCU communities.

Julius Korley: In terms of new HBCUs participating, what's the best way to do that?

Almesha Campbell: One of the ways we've been doing that is having open Q&A sessions, we just keep them open.  You don't have to register.  We set up communications from the VPR to the provost's office, deans, chairs, and programs.  We look at all the programs that NIH funded, look at any HBCUs that may have a program on their campuses, reach out to those project coordinators.  We also reach out to student organizations within those campuses and we reach them in different ways.  Because sometimes when you are thinking that, an administrator may do it, sometimes it may just be a student group who gets the word out.  So we try different mechanisms to get that information out on the campuses.  We've seen success at those different levels.  Last Q&A we had, we had more administrators than we've ever had in a open Q&A sessions. I got information like my provost told me to go to a meeting to represent them.  That was good to see at that level of the administration, that they wanted to know what this was.  And that whatever we communicated out of there was hitting something that says we need to find out how we can be a part of this.  So our job then during that session is to tell the story.  To sell this back, that this is something, it's not just for now.  But it's for the sustainability of your institution.  And I think that has really served us well.  We have to continue doing that.  And then once we start bringing in other partners that are supporting activities, it's not just done by Jackson State University, Kentucky, XLerateHealth, we have other partners that are from other institutions and other organizations that have given their time and resources to supporters.  And so sometimes when they see that these external people are giving of their time and effort for free to support it, then they realize, oh this is something important, we need to be a part of it.

Julius Korley: That's awesome. Thanks Almesha.

Eric Padmore: If I could just, if you don't mind, I just want to piggyback on that a little bit.  Because one of the things that we did do this year as part of our annual small business program conference was we dedicated the entire conference to diverse perspective on seeding impactful innovations. That was the title of the meeting. So over the course of probably four days in April, we had our entire program addressing issues around outreach and how to bring in. We got I think probably for the first time because we did it virtually. We had a tremendous response, and tremendous participation. We had registrants from 8 different HBCUs, 12 MSIs, and the level of engagement from those institutions was much higher than you've ever seen before. And I think probably have seen put a link to those, to that meeting materials which are in the chat, which I think are still available for people to look at.  So that's just a reference.

Julius Korley: Thanks Eric. So Jonathan, you began to get into this when you were introduced to what you're doing in Michigan.  But what impact has your resource made possible that may not have otherwise been?  You mentioned that mentoring and connecting all those, which I just have to know more about that.

Jonathan Fay: Yeah, no.  I think, since I've been at the center now for a little over 9 years.  Literally since the first day I got here, we need to do a better job of mentoring our students and our faculty.  The challenge has always become, these mentors are all over the globe, there are thousands of them.  When a particular person comes to you and needs guidance your brain has to do matching, you have to search through LinkedIn, you have to take time, at the University of Michigan you have hundreds of requests coming, you could have armies of people trying to do this and not doing it very well.  We've been searching for a tool for a long time.  When we came across this system Protopia we thought it might work for the first time, it does enable us to do that.  It really enables it to scale.  I use the word mentoring a little bit.  I think people think mentoring is a close-knit long-term relationship.  This system is really developed for that first engagement.  That's what we're doing.  The student to the faculty who are interested in getting advice to a very specific question about their project or about themselves.  In a way that the system can then break that down into tags then search the database for the best match for the given tags that were in that question and propose several usually four or five people get the question from the student.  That person can then reply to that.  And then what happens is both sides then rate the experience so we can catch if there's anything weird going on, or someone is really lowly rated there's a little bit of safeguards in there.  They have some safe word to throw the flag if certain things get mentioned.  That system has enabled our membership to scale, in this last semester we have now in some of our classes we actually have students put in a question into the system and actually get alumni to respond and we've already done 300 of those engagements this semester. We could have never done that in the past that would just have broken us in terms of our engagement team.  So now with the reach of that that system has you can do specialized things. You want to know about distribution in sausage making, I'm making that up.  We probably have someone who's been in the food industry who can answer that question and help you understand how that industry works in a way that would have never been possible before.  We have the opportunity to do some demographic matching in a way that we have never, would have never been able to search or our minds would never have been able to do that searching in a way.  Because we have our alumni base by some measures the University of Michigan has the largest living alumni base than any university on the globe.  You think we can mine that effectively?  Without an AI system?  No way.  Not possible.  Right.  So we can really get that diverse network working for us in a way that it has never, never been utilized before.  So I'm very excited about that.

Julius Korley: Excellent.  There is a note in the chat from Jennifer wanting to make sure that that was the system that you were referring to?

Almesha Campbell: Yes, I will double check, I will click the link and get back to you to make sure it's correct.

Julius Korley: Eric, next question for you.  What were the biggest challenges to starting up your resource?

Eric Padmore: That's a loaded question.  Well, I think one of the things that we became aware of and came up with a solution for back in, don't quote me on the date, I want to say it was 2015 or thereabouts, we became aware that with respect to small business applications there were a number of inconsistencies in the self-reporting of minority or disadvantaged, I think this that was the terminology they used, disadvantaged status.  Our program officers in many cases knew who the PIs of these applications were, when they looked at the applicant they were not indicating that they were women, or, disadvantaged populations.  And so, we actually did a survey in 2019 and asked questions about why people applied, why they didn't apply, what they thought the barriers were.  And coming out of that, there was a perception you know, there was a lot of perception about perceived bias.  And we actually talked about that.  We did a whole session in the program earlier this year and small business conference around that topic area.  What came out of that was that we actually changed the face page of the application and to longer collected that identifying information, which is now selected in SAM.  So that information does not go to the reviewers.  And that was one huge step that you know, the NIH took to remove that indication of perceived bias. And some folks actually did some statistical analysis around that question to see if we could detect any evidence of it prior to changing the face page.  And I'm happy to say that there wasn't any demonstrable effect there.  But nonetheless, we felt it important to give people the sense of comfort that that was not an issue. So that was one huge step.  There are many others.  I think that you know, the culture over our social culture as a society has changed in ways over the last 20 months that have now made it much easier to address these questions.  And when you see the statement that Dr. Collins made when they launched the UNITE program in which he actually apologized and said I am truly sorry for people who endured disadvantages due to structural racism.  That's a huge step and that was a huge change in the culture that was necessary and facilitates us moving forward to address some of these issues.

Julius Korley: Thanks, Eric.  Jonathan, coming to you next.  Where can you see other ecosystems or collaborators impacting our sharing your resources?

Jonathan Fay: I'll say, the big thing that we're going to try to do in this coming year is we're actually going to do a Protopia pilot with the I-Corps program.  For example we're having every institution in our Hub and a few other ones actually give us names of 5-10 folks that they think would help any regional team, any team in terms of technology commercialization and put them into the pool.  And what they'll do is every university with us has agreed to embed using the tool as part of their I-Corps short course experience, so they will be engaging with the tool all of the institutions will do it across all 22 programs and see if that can foster this cross-regional network that we've all been looking for.  I think all of us have been in conversations where there's probably a project at the University of Michigan with the right mentors associated with the University of Illinois, it's just not visible, you just can't see it.  In addition we're really excited because some of the other institutions with the other institutions like the Wayne State or University of Chicago that are minority serving institutions they'll also have access to that and gaining access do the same networking.  We're really excited by making it an open platform for the Hub, also making sure that everyone's embedding the same kind of question or assignment into their I-Corps course this, is going to be shared very broadly across the Midwest.

Julius Korley: That is excellent.  That is excellent.  So Almesha, the same question to you.  Where can you see other ecosystems or collaborators impacting our sharing your resource?

Almesha Campbell: So, I would say one of the first things through our network, what we did was also created a program for Hispanic-serving institutions, right using the model of what EnRICH started and expanding that for Hispanic serving institutions.  I think it created a program for women as well.  Most times when you think about DE&I we forget that women is also a subset that we need to focus on.  So even within the EnRICH program, we made an intentional effort to go around to make sure that we were reaching out to more women faculty and students to participate in the program.  The flipside of that is that this time we had more women than men participated in the program.  It's good because it kind of balancing out what we've had in previous cohorts with most men.  I think one of the things that we can do is the curriculum can be shared.  It's nothing proprietary to us.  Even what we develop, our outline, I think Monique shared the website of how we brand the EnRICH program.  We of course want to share our resources in terms of some of the mentors and the coaches that we work with. We've often encouraged them to help other institutions as well who have similar programs.  And I would say one of the good things is that a lot of people have reached out to us to, you know, to help with the programs.  So of course we show up we and we help the way we can.  The curriculum is there.  We are often tweaking it depending on as we move forward to make sure that we make an impact.  We do assessment from you know, doing our last ten weeks of our pitch competition, while the judges are deliberating for 45 minutes.  We have the participants in the separate rooms and they are talking amongst themselves and putting up information about what they saw throughout the program, what they would like to change. We have some of those best practices in the feedback from the participants over the time that we've had it. And those are some things that we can share to others that are trying to develop those programs.  But we could also learn from others right.  We're a new program, we're evolving.  So definitely we took a lot of some stuff that we did with our I-Corps site, a program I heard you all talking at your Hubs and different things, I'm a little bit jealous.  We look at those resources.  I'm so happy and grateful that we're a part of the National Innovation Network because then we get to look at the different people who are doing the training.  We get to look at a lot of the mentors and coaches share some of the resources, I don't think anyone of us would say I can't share this with you.  We want all of us to succeed.  The goal is it's not individual.  So we definitely want to share.  And I think working with minority serving institutions and HBCUs, understanding the differences sometimes.  A lot of times when people MSIs, they lump everybody in, we compete with MSI who sometimes have a bigger and deeper bench than we do, sometimes their political power is much stronger.  So, understanding that, understanding those barriers, understanding the challenges, also understanding the uniqueness.  Because we have some awesome students that just lack the resources and see people that look like them.  So we were very intentional in trying to make sure that when we look for mentors to participate in the program or even to present, come before them, that we make sure we have people from different backgrounds so they can see people not only look like them, but they can see how other people are making it work.  Apart from that, I think it's just for us to be very open in our dialogue with each other.  I often tell people for diversity for me is also diversity of thoughts.  I never want to be in a room with people who just shake their head and go along, that is a room I would bit immediately.  I want to be challenged.  And I want to have that dissenting opinion so we can kind of find a common ground for understanding.

Eric Padmore: Almesha I'll ask another question.  You have been speaking about all the wonderful things you're doing there.  In all of these different jobs that you have.  (Laughter).  So, now if we're going to amplify what you're doing like EnRICH, what kind of resources would help you to be able to not have so much on your shoulders?  During this period, my jobs have increased too.  I didn't expect to be co-chairing PACE and some other initiatives.  But I think we can't kick that can down the road any longer.  But what types of things would help alleviate some of the pressure?

Almesha Campbell: For me, it's people, human capital.  So you know, while the resources may not be there to hire people to sit in those positions, one other thing I've done with some external partners is talk about what, when they ask about what are your needs, because we love what we are doing, we love your passion.  But we see you may -- I don't know how long you'll be able to do this.  My kids say are you able to do this for another ten years?  Developing that pipeline, I created the innovation fellows program where we take on ten students every semester.  Those students get training not just for me but from industry partners but different universities that have those resources that can support.  We're about to form a formal partnership with a major university that would come in and help us train our students in technology, transfer and commercialization.  We also partnered and got resources from AUTM, you know, where we can train our faculty and students through so that I won't have to be the only person have a pipeline of students interning within the tech transfer office.  The ten students and the innovation fellows program they're in the center for innovation, they’re fully supported by funding, but then they also, like I said, were mentored by external partners, so that's how I had to be creative to have that support.  I'm also collaborating with the other research institutes in the state of Mississippi.  We've gone after funding and partnerships that would allow us to share resources.  In some case we may share two program managers, we may share software and different things, those are creative ways that we've been able to do that, that can alleviate some of the pressure off of me.  I still manage my own calendar because I want to make sure I'm not over booking or saying yes to things I don’t have the capacity to do, so something that I like to still stay on top of. But not only creating the pipeline of the student but making sure that faculty understands.  The dependency on I call Dr. Campbell for everything that I need, because she knows it right and them having the resources whether it's some sort of guide that I have and they could just flip through it or look online and see the video making the cases for those things and so we're working on video short snippets how-to little videos, so that they that would take them off of calling me and they can just click on that and in a very short five minute video they can see and get some responses some resources so that's what I'm doing to do that but of course I love to have an office with an extra two three four five six seven eight nine ten people

>> You sound like you're counting like LeBron James.  (Laughter).

>> I need a whole football field (Laughter).  But no.  Sometimes you have to just have the right people.  I have some excellent students that are doing wonderful.  I posted something on LinkedIn, if you follow me, you see one of my students he came in, he was ROTC.  I knew he was going to go into the military because that was in his blood, he said I want to be an innovation fellow, is there anything else can I do that's non-tech related that doesn't have anything to do with technology transfer and all of that.  I just want to do something.  He Just come in and help me manage the students that are part of the innovation fellows program.  Within three-weeks of him coming into the program seeing the stuff.  He got excited, started doing stuff in 3D modeling, doing virtual reality, he moved up, he helped me with some tech assessments and some technologies from the military we were given, and that made me proud.  Because even now he's being commissioned tomorrow, he has his assignment to go into the military. He's going with a set of skills that could make him better capable of serving the country and make us proud.  I often tell him that there's a role for the technology transfer commercialization innovation within the military as well.  He'll be uniquely positioned to do that.  Those are the things that sometimes I said no matter how tired I am, that part of it gives me the energy.

Julius Korley: Excellent.  Excellent.  And I understand that we have a lot of questions about building up Eric.  I want to come to you once more.  So, put on your crystal ball.  And tell me what are you, with all the initiatives that are going on with EDI, what are you most excited to see or expect to happen in the next few years?

Eric Padmore: Well, I think as I said, I think there's a sea change in the culture in the greater research community.  One of the things, many of us were toiling behind the scenes working on these problems just out of personal self interest and what was seen in the last two years is now executive sponsorship of those efforts.  So, people are now formally held accountable for some of these outcomes whereas, before I think some of those felt like we were kind of just tilting at windmills and trying to move the ball down field back to the football metaphors I'm sorry.  Trying to move the ball down the field just of our own volition, I'm excited that there is a cultural endorsement of these efforts.  I think one of the things that the pandemic has done for the scientific community in general and around research demonstrates to people that things didn't always have to go the way they've always gone.  Right.  We saw wholesale changes on how product development around the vaccines happened, people go oh, we can actually do this in less than 17 years despite what Allen was referring to.  People were now looking for ways to make things faster.  It may not happen in nine months like the vaccines did.  An acknowledgment that we can speak this up, we can make this more efficient.  We can include different types of people and representation and that there is benefit as a number of studies have proven.  Someone else referenced it earlier, those studies show that when you have diverse teams you get better solutions, across the entire economy, the data is there.  And people are recognizing that.  So, I think the groundwork has been laid, and we will start accelerated change in the next 10-15 years that maybe we didn’t anticipate.

Julius Korley: All right thanks Eric, I bombarded you all, thank you for the wonderful feedback, thank you so much, now Monique will be spearheading the questions and the Q&A from the audience.

Monique Quarterman: Thank you all so much what an awesome discussion. So I'll start here with a question from Laura.  From your customer's viewpoint, what has been the most valued or impactful programming you've offered?  This might be a good thing for those of us with constrained resources to focus on how to get the highest value out of our activities?  Would anyone like to go first?  I saw Eric un-mute

Eric Padmore: Well, what I will answer to that is, the Entrepreneurial Workforce Diversity Working Group which I'm part of is looking for examples across the country.  We are continually pinging folks like yourselves to say tell us what's working for you.  We as a central resource will help disseminate those processes across the research and entrepreneurial ecosystem.  For example, one of the things that we've done I didn't mention before is that we've established a partnership with MedTech Color.  We are helping to underwrite that's probably not the right word, but we're helping sponsor some of those efforts in terms of competition because we've seen results from that because we think need to be promulgated across the enterprise.  So those are some of the things that we're starting to do.  And, using the REACH Hubs and the NCAI as examples, all of that data collection of that entire presentation that Allen did in the last session, right, we're fact-based driven.  We're data driven.  So we collect that data.  We're doing a better job of collecting it, analyzing it, and understanding what works.

Monique Quarterman: Excellent.  Thank you so much for that Eric.  We received another question, it related to the discussion about venture matching.  For the AI-based mentor matching that Jonathan mentioned, how has the quality versus quantity trade off worked out?  Have you heard any feedback from the mentors or mentees yet?

Jonathan Fay: I think with the system that we're able to break that trade off because we really are just trying to get that first engagement between a student and the relevant person that has the experience then from that dialogue, those two people can decide if they want further conversation.  There's a lot about mentoring that's really about the personal match, not necessarily content knowledge.  So the students may need to enter multiple questions and see multiple mentors before they decide to engage in a more ongoing way, that's the perfect way.  The ratings all right, I would say the students rated the interactions of 8.5 out of 10, that's the average rating which is pretty high.  Think I the mentors are similar.  We're doing pretty well, everyone seems to be very happy with getting their questions answered and the quality and the opportunity to help our students and faculty.

Monique Quarterman: Excellent response, Jonathan.  And thank you so much for that.  Our next question is I've seen this term before in eRA Commons, do any of you use the ORC ID to track the careers and outputs of your program participants?  NIH requires the ORC ID for all participants in our training program.  Would anyone like to take that on.  A question about EDI and data?  I'll jump in first in case our panelists are thinking through some options here.  When we started organizing the PACE group it was really important to us to organize our Hubs and start having conversations about what are the top priority areas that we should look at in terms -- top priority areas that we should look at in terms of impact of inclusivity.  It was no surprise that EDI data rose to the top of that.  People and Hubs want to understand how is the existing data practiced within the NIH, and where are some places that we can sort of tweak that information to get more actionable data on the other end?  We've been so fortunate to partner with RTI international, both with understanding how data is collected currently, but also sort of dreaming up new data instruments to really understand our programs better.  That's been a really rewarding process for me.  And so I look forward to taking this down as a tip as we continue those conversations.  Would anyone else like to add onto that question about the ORCID.

Julius Korley: I think you covered that really well.

Monique Quarterman: Awesome thank you.  I'll move onto our next question.  There are so many good questions here.  Another one for Jonathan here.  Jonathan, did you build a new software tool for the mentor matching?  Or is it something that Hubs can get off of the shelf?

Jonathan Fay: This is off the shelf software Protopia is a private company, you can call them up tomorrow, talk about your needs they'll help to build a custom system for you that works for you.

Julius Korley: Then you can send the bill to Michigan.  (Laughter).

Jonathan Fay: No thank you.

Monique Quarterman: I think this is a related question to that.  We had a really quick question that popped up that says is Protopia only serving the three listed institutions or can it serve more?

Jonathan Fay: No, it's wide open, I think they're just a small company, they're just getting started.  I think they have like 8-10 institutions listed on their site now.  But I'm sure they would be very interested in growing that.

Monique Quarterman: Fantastic, thank you. Another question here from Kentucky from Megan, a member of my team.  We've heard a lot about supporting institutions that represent more diverse populations, but what are some things we can do on the campuses of those institutions to engage the faculty and staff and help the administration and leadership to understand the importance and value of getting more engaged in commercialize responsibly when it takes time away from teaching right? Would anyone like to answer that? I hate to put you on the spot but I’m really interested in what you think about this question Almesha.

Almesha Campbell: It's a very good question, it's one I can tell you in any programming that I've been a part of over the last 12 years I've gone through different administrations right.  So it doesn't matter who it is, so it's not personal.  But, it always, I'll make this analogy, so in my home country, Saint Kitts and Nevis we're accustomed to the beaches, the white sun, the black sand, the rainforests when the tourists come in and say oh my God this is wonderful.  We look at them not understanding how -- what a pleasure it is to see a place so beautiful because that's what we're accustomed to.  So, I put that analogy in my own institution that I'm here, right.  I'm beautiful.  No, I'm just kidding.  (Laughter) I'm here, if I bring anyone of you, it doesn't matter your background, if you come in and see the same language it's received differently.  So I've noticed that very early on.  And so that's why developing these types of partnerships was so important to me that even if sometimes I get asked why are you participating in this program?  There's no funding.  You put in more work.  But for me the ROI is when I bring those people on my campus, I'm participating with these groups, then the administration, you know, on different levels will go, oh you're partnering with this person, that is even more intriguing to them.  So coming to our campuses, giving talks, engage with the students, even sitting down with the senior design our capstone classes, providing feedback to them.  Sometimes these things are highly valuable.  Always take the opportunity when someone says how can I help you.  I always invite them to our campus.  So they can see some of the resources that we have, they can also get to meet our brilliant students and faculty and understand where we are so they can understand that sometimes it's not so much about the money, but sometimes it's just having people around that they can communicate with and they can say, you know, I can collaborate with this person if I have this idea.  Or there's another person, another institution that I can call if I have a question about a particular thing.  So a lot of times that's what we're looking for and, sometimes people come in thinking that we expect them to save us in a way.  And it's not about saving us.  It's about supporting us, it's about understanding what we have to bring to the table which is our excellent students, and our programming, and then understanding how that partnership can benefit both sides of the fence.  So I do appreciate that question Megan, because we see that so often.  An administration changes.  They get to see things.  And quite frankly, especially when you bring an -- fringe someone from the federal agency, or someone from an industry partner comes to campus.  We have that happening now because of having Deion Sanders in our program.  All of a sudden they go you have a Center for Innovation.  I'm like we've been here for three years.  It's great because now you get to do what you really want to do.  They see it and appreciate it.  Even though it's coming a couple of years down the road.  You don't take it personally.  You're understanding that in part and parcel how things are.  I hope I answered Megan's question.

Monique Quarterman: That answers it so well them is a really big question it's center to everything we do.  So any others have any good advice?  I'm taking notes on the side here.  (Laughter).

Eric Padmore: I don't know if it's good advice.  I will say that back in 2011 when we were deliberating in writing the actual funding announcement for the NCAI, one of the unstated goals of that effort in conversations that we had in the subsequent annual meetings of this group over the next five or six years was moving administrations to recognize commercialization and product development in consideration of tenure, right.  We move the needle on that.  I forget the specific examples off the top of my head.  But there are probably people listening to this conversation who remember that and as they evolve, we started to see some of the bigger institutions say okay, this is something we need in addition to publications and teaching this is something we need to factor in as we evaluate our faculty.  So, all of these who have been part of this have been part of the successful effort to help move that needle along.  I think you're going to start to see even more of that in the future.

Almesha Campbell: And Eric was right.  Apart from looking at the tenure promotion, for me I had an administration that came and say we want to do a strategic plan and someone like me gets selected.  Right so why did they do that?  Because I took the opportunity to make sure that what I do is included in our overall strategic plan, the institution realizes how it ties in, because when we were having those conversation and you're talking about research excellence and academic pursuits and different things you're realizing that these are some of the things that needed for us to really be on that trajectory to where you say you want to be in five years right. Even in my president's inauguration speech in October when he mentioned the center for innovation and what the students can do in there, like oh he gets it. Those are things you would never see happening, because we were able to be a part of it, be at the table, we were able to add some things, they would not have thought about initially in those conversations.  So, Jonathan beat me to it, you had not looked up, you have not looked up PTIES, it's a great thing if you're institution is not part of it, it's still time to join that coalition, we continued some of the work that Eric mentioned in getting that done, I can tell you, my institution benefited greatly from participating in Peter, I've been highly engaged with them.  The timing was so perfect.  I was able to get those recommendations in our promotion and tenure revamping of our handbook.  So it's a great thing.  And that only came about because of my engagement with people like you, right and understanding that these are things that we can do in our institutions, even at the smaller level to reach to where we need to go, sorry Julius, you can have mic now.

Julius Korley: You said it very well, University of Delaware is now engaged in very similar process fees, what I've seen over my time from Case Western to the University of Delaware, when institutions began to embrace entrepreneurship and entrepreneurial activity there is now institutional and ecosystem change.  You attract faculty that are just brilliant.  When we are interviewing faculty now, they come and ask us to discuss entrepreneurship and innovation in the ecosystem.  It's a vibrant community.  They want to come here, build things that will help mankind.  Dramatic change when you embrace commercialization.

Monique Quarterman: Absolutely.  This is a very hot conversation.  We've got hundreds on the line. I'm so grateful to our NIH partners for allowing us just a few more minutes to get through all of these excellent questions.  This is a great question from Ellen.  How do entrepreneurs in the community reach out to our academic community to develop products?  Do you have programs to reach you on the university doors?  I'm kick this one off, it a good opportunity to talk about what we've been working on here in Kentucky, we're so closely united the kinetic Hub is in service to the public United States across the state, R01 institutions, regional and community and technical college, they are eligible to go after the KYNETIC instrument.  We support them through Kentucky Commercialization Ventures, so what ends up happening for our startups and community and business owners and community is that they see us as an entry point an open door. So often we get a call from some random town in Kentucky, they say we have this need.  I promised them that within an hour's time we can get their ask in front of every academic institution in Kentucky within an hour.  That is a drastic change in the history of our innovation ecosystem.  It's made possible by being part of such wonderful instruments like KYNETIC as well as the Proof of Concept Network.  What do you all, what do entrepreneurs use in our community for some of your programs?

Almesha Campbell: For me, quickly, as someone mentioned, I have too many jobs, one of the things I decided to do because, I had so many people within the community, I'm in the Jackson community, there's not much support there, especially for minority entrepreneurs, and especially if they want to get into tech, at the very early stage.  Most of the time the organizations want to see that they've already been making money and all of that stuff.  No one wants to put in the work to get them to where they need to be.  I had a lot of people reached out to me, some submitted SBIR and STTR to NIH and NSF.  The feedback they got back they didn't know what to do with that.  I found myself taking that on.  I said there's another way to do that.  I wrote about the grant for the women's business center here at Jackson State through the SBA.  We got that funded.  The whole premise of that I was going to make the women's focus on tech commercialization.  Because I saw the gap within our community.  So while they do the regular business support and counseling, we have someone there who could help with tech commercialization as well.  So now those community folks who would come to me I would just recommend them over to the women business center, and if we reach a stage where I may need to come in and add other resources to connect them with different things I'll do that.  So we do the SBIR STTRs expand them that way.  For them it was one of the quickest ways for us to continue showing that support in the community.  But then we started like I said, a strong partnership with the other research institutes in the state.  Then we started working with the Mississippi development authority and other state agencies to see that they need to focus on emerging technologies.  So as they begin to adopt that model for the state economic development, then we start to see a shift in how they allocated certain resources that we can benefit from to help the community partners.  It's a long time coming, but we're there and can do a little bit better too.  But that was one of the ways we did that.

Monique Quarterman: I will actually close with two quick, one quick question and a longer question to close on.  One specifically to Jonathan on, thank you so much for that answer alley that.  Can we send potential mentors over to Jonathan or other folks who are using these mentor systems, what do you think Jonathan?

Jonathan Fay: So, if they're interested in engaging with us in our programming absolutely.  You can email myself and I'll pass them along to the appropriate people, and if they want to engage in the programs, if there's a different purpose, let me know what purpose you're sending them in to me for.

Monique Quarterman: Excellent, Jonathan, I'm working on some similar initiatives in PACE. I listed my email a hundred times in the chat, if you have someone who served as a mentor I'll get your note and I'll get you connected to Jonathan as well.  For a question to close on, this is a good one.  We want to make sure that all underrepresented persons are aware of these programs that we're a part of.  But we also want to support them and encourage them to actually apply.  Make that step and make that action.  What have you found is the most effective way to communicate the availability of these programs and motivate them to apply?  I'll just add a tail end of that here is because we each represent programs, how can they be a part of your program?

Jonathan Fay: I think for me, the big thing in terms of taking them from say awareness to actually interests or consideration is, rather than -- you're making someone aware, there's a flier, that's a thing.  What they -- they don't innately understand the value, what's the value to me.  You have to get them to experience that value in a very concrete and real way, where there's a very low barrier to entry.  So we have found very executive, one hour or two-hour workshops where you kind of keep it maybe focused on professional development, focus on research tools, something else.  But then they get to see how these entrepreneurial tools actually work and how much value they get from them.  And that increases their interest in participating in something.  So that's the tool we use.  Like frogs, right.  Get them in the pot.  Slowly turn up the heat, that's probably a bad analogy.

Monique Quarterman: Thank you so much, Jonathan, Eric, how about you?

Eric Padmore: We don't like to boil people.  (Laughter).

Jonathan Fay: This is terrible.

Eric Padmore: Let me just start with that.  No, seriously, so one of the things I'll give that, standing up the SEED office, which is Small Business Education, Entrepreneurial Development as a trans-NIH entity, has really served to help us consolidated an and act as a central clearinghouse for all of the NIH related information.  And one of the most recent things that happened has been a complete update to that website which was really a clunky legacy thing we cobbled together over the years, we have really streamlined that to make the user experience more functional for people, more informative and easier to navigate.  So one of the things that's on there for example, you know, the success stories where we actually have a page where you can go in and look at the map of a university and select by technology or by geographic area or look at projects or companies that have come through the small business program and achieve levels of success and let me look at all the technologies in Kansas are headed by a Black woman, the idea behind that is if you can see these examples you're inspired to do it yourself, right.  So that is something that we've developed because of the feedback that we've gotten through all of the surveys that we whipped up.  We continue to develop those kinds of tools and put them out there for people to see.  For me the other thing that I like to tell people is it's free money.  There's nowhere else that you're going to get $3 million worth of non-diluted funding so come here.  If that doesn't motivate you, I don't know what will?  Awe that's great advice thank you so much.  Almesha - and then I'll pass it over to Julius to close us out.

Almesha Campbell: Just one unique thing that I do.  I do some of those things that were mentioned but I always target my junior faculty first.  I make sure that I get to understand the research.  I get to understand their trajectory with the timeline of when they need to go up to tenure or promotion.  I get a lot of program information from external partners.  Then I look to them, I see before, I look at them and find the ideal faculty that should participate in these programs, then I tell them how it aligns with their program and their next step in the process so I would tell you the success rate in doing it that way has been tremendous.  I have faculty now participating doing this on SBIR and STTR who never thought about it.  But being able to align it with what they're doing, and the trajectory, tenure promotion and different things that that they're trying to do, that is the best part of working with me.  So the junior faculty are my best friends.

Julius Korley: Thanks Almesha, in terms of working with the northeast Hub, one of the things we're doing for recruiting, we have a small standing committee that's dedicated to recruiting being inclusive.  So, the workshops that Jonathan talked about we're taking it a step further.  Once we get that information, we're going to actually have unique people follow up with those candidates at the workshop to make sure that we push them towards application, let them know that they're not an imposter, it's supposed to be there.  They can gain valuable insight by becoming a part of the program.  And, with that, I want to thank all of our wonderful panelists, this has been a great discussion.  Almesha, you're working so hard.  So you need a break.  Thank you for your time, Jonathan, Eric, and of course, my co-chair, Monique.  I wanted to thank our NIH partners and we challenge everyone that participates in this session to find one of the things that we talked about here apply it to what you're doing so that we can change the status quo together.  With that, thank you for your time.