TB Education and Training Projects: Updates from the Field
November 18, 2015

This webinar is sponsored by the CDC TB Education and Training Network and the TB Regional Training and Medical Consultation Centers. Our agenda today includes Innovative Patient-Centered Latent TB Infection Education materials presented by Marisa Chiang, Massachusetts Department of Public Health. Tuberculin Skin Test Workshop Online Portal presented by Helen McGuirk, Michigan Department of Health and Human Services. And Many Infectious Disease Updates for Nursing Education presented by Kristin Gall and Jude Dean.

Before we get started with the presentations I have a few housekeeping items to go over. Today's event is scheduled for one hour including the question-and-answer period. This webinar is being recorded and will be available on the Southeastern National Tuberculosis Center's website for future viewing.

To verify your participation in this event, please provide your email in the email pod on the screen within Adobe Connect. If you provide us with your email address, we will send you an email with a link to the online evaluation following today's presentation. There are no CE credits available for this activity, but we do value your feedback.

You may submit questions for the speakers at any time during the presentation by typing your question in the Q&A Chat. Time permitting questions for the speakers will be addressed after each presentation. Speaker contact information will also be available at the end of each presentation.

And now our first presentation, Innovative Patient-Centered Latent TB Education Materials. Marisa?

Thank you very much, Peri. Good afternoon and good morning to some of you. Hi. My name is Marisa, again, and I'm with the Division of Global Populations at the Massachusetts Department of Public Health. Thank you very much for this opportunity to share with you all some of the work we've been doing on innovative patient-centered TB infection education materials.

To start off, we recognize here at MDPH that targeted testing and treatment for TB infection is an important strategy in the fight against tuberculosis. And when thinking about TB infection, immigrants and refugees certainly come to mind as that priority population. They also face many challenges to completing TB infection treatment. So with our Health Department's focus on health literacy in health education efforts, we saw this as a great opportunity for us to put together new TB education materials that would actually meet the unique needs of refugees and immigrants, many of who have limited English proficiency and limited health literacy skills.

So to start off the assessment process, we reviewed existing TB educational materials. Internally we found our materials pretty old and outdated, created a very long time ago. And we knew that they really weren't being used. In the larger environmental scan, there were many parts of various materials that we liked and thought could be adapted, but in the end very few were entirely designed with refugees and immigrants as the primary audience.

So with all of that we decided to move forward. And from the beginning we knew that we needed outside expertise. So we partnered with Communicate Health, and they brought a new level of communication and health literacy experience. And because of this partnership, the project immediately honed in on the value of developing highly motivational and action-oriented messages. Graphics were created that demonstrated actions rather than just communicate information. And in this partnership, what we really saw was that we were moving beyond just translation and into intentional design.

In embracing health literacy as a priority through this project, one thing our group had to learn was really to let go of words and content. So many of the early development meetings consisted of hours of back-and-forth, fighting over words, getting everyone on the same page around what language was important, what wasn't. And one outcome of note for our materials was the choice to actually use TB infection rather than latent TB infection. Some of the reasons behind this was that latent actually translates very poorly and is often understood as sleeping. So in translated materials, and thinking about refugees and immigrants here, latent can convey a level of non-urgency. And if you think about it, that can be a little bit

self-defeating if you're talking with someone about the importance of a six-to-nine-month course of treatment.

Another benefit to working with Communicate Health was their experience in conducting an effective and efficient pilot testing process with immigrant and refugee communities. They knew that well-conducted interviews would be sufficiently informative even with just an eight-person focus group. Their experience running these also meant that they knew how to hear and interpret and implement the feedback to make impactful improvement to the materials.

And Communicate Health actually suggested that pilot testing with providers was not necessary. Their rationale was that health providers were not the primary target audience. And while this is true, we at the Health Department did feel like it was important to have provider input because they would be potential users as well. So we conducted the interviews with a select group of public health providers.

The assessment looked at participants' ability to identify and retain key messages as well as whether the graphics were being connected with the intended actions that they were pointing toward. Participants were also asked about their preference for bilingual or monolingual languages or materials.

So from the pilot testing process, a lot of helpful information was gathered, and we did find that some graphics were misunderstood by our refugee and immigrant focus participants. And so they were revised. One area where there was overwhelming consensus from both providers and participants was the positive reaction to the bilingual materials. And that was actually a surprise to us as well as to Communicate Health. So it was a huge learning point for both of us.

In terms of the designs of the materials veering away from the more traditional health education materials, this was particularly noticeable in the providers' feedback. So several of the providers expressed concern about the limited amount of information in the materials, and a couple of them even suggested very specific content that we should add in. And while this may have been – or could have been – understood as a critique of the materials, it actually pointed to us that we're moving in the right direction as our goal from the beginning was to focus on very simple, direct, actionable messages rather than just delivering a lot of information or a lot of content.

So with all this process behind us, the final product resulted in the design of four new materials. These materials were designed as a set but can also be used as standalones. It's really about encouraging the provider to think about the patients they have in front of them and to make a conscious decision of which material in the series best fits with where the patient is at in their TB infection testing and treatment process. So here I'm just going to briefly flash the materials at you, and then in a later slide I'll break them down a little bit more.

So the first material is called, You Can Have TB Infection and Feel Healthy. So you can see here the bilingual component of the materials. This is Chinese and underneath is English. The second set of materials is, You Have TB Infection, What Type of TB? The third here is How to Take Your TB Medicine. And the last one is titled, Keep Taking Your TB Medicine. So you can see that they are translated into several languages and they've been translated into 17 different languages.

So in terms of implementation or sort of rollout of the materials, we conducted a webinar introducing the materials, which also included a provider tip sheet. So within our state the invitation was extended to state providers, and we had 53 providers who participated. Many were from our local Health Department and some from our TB clinics.

Our team of bicultural and bilingual community health workers across the state were also trained in the use of the materials. And the materials are available online, and we have seen a pretty consistent and steady online traffic and downloading of the materials since this rollout.

In terms of next steps, for the future we hope to conduct a more thorough evaluation of the materials' impact looking at feedback from our community health workers who use them as well as other public health providers. And of course we hope that we will have, also, the opportunity to look at if the materials have a measurable impact on patients' knowledge level and health behavior patterns.

So while that is something that we hope to do in the near future, in the meantime we do have some very interesting anecdotal feedback from patients, community health workers, and from healthcare providers who have been using the materials, so I'm going to highlight some of those pieces by focusing on a few case-specific education materials.

And the first one here, which is pulled out from You Have TB Infection, a Type of TB, patients have confirmed and said that indeed the graphics are simple and easy to understand and they appreciate the picture-based nature of them.

From the same set of materials there is a part that highlights the benefit of taking medicine for TB infection. And one of the benefits the material talks about is that taking medicine as being good for the entire family. And as Communicate Health workers have interacted with patients over this part, they found that this statement really seemed to elicit questions. So it seems like patients understand the concept of choosing to take medication as good for me and a good thing for me to do. But they want to know a little bit more about why is it also good for my family. So it's a slightly different perspective, and it's motivational from a very – from a different angle in a very subtle way. So it's been interesting to see that these materials are starting conversations and they are giving providers the opportunity to engage and walk through these conversations with their patients.

And the third material, How to Take Your TB Medication, there's a graphic for providers and patients are encouraged to put together a plan of action for when and how to take medication. So, again, we're hearing positive feedback on the interactive elements.

And finally, we've really seen that the bilingual materials format are really serving multiple purposes in a positive way. Not only providers and patients able to look at materials together, more fluidly, we have heard from patients that they started to pick up some key health literacy vocabulary from just having these materials in their hands.

So in summary, what is really exciting to us is that we now have materials that are patient centered. Again, we moved from translation of materials to materials that are more intentionally designed and materials that have been tailored to more effectively engage and motivate patients for which preventive medicine often is not a priority. And we do that through the action, the pictures, the interactive graphics. And what is really innovative is that these materials anticipate questions patients might actually ask rather than just pushing information at patients. And so in that way the patient-provider relationship is strengthened, and patients hopefully are encouraged to engage with TB infection treatment.

And yes, we would love for you to take a look at these materials to see if they fit in with what you're doing in your area. They are online. Here is the link, and I invite you to come and take a look.

With that I want to thank you very much for your time. I also want to recognize and thank the hard work of Colleen, Sharon, Jennifer and our team of community health workers as well as the partnership with Communicate Health.

Thank you very much.

Thank you, Marisa, for such an interesting presentation. We have a few questions for you from participants. The first one is can you list some of the languages that these materials are translated into? I know you said 17 languages.

Yeah, 17 languages. I will try to list a few of them. So we have Spanish, Portuguese, French. We have Chinese, Mandarin as well as Simplified. Several sort of more of the refugee languages, Somali, Hindi, Vietnamese, Kamai, Karen, Burmese. There's quite a few of them. I know that's an extensive list. And if you go to the website, they are listed out all by language. So the first page just gives you a list of the materials, and then when you click on the materials, it takes you to a second page that then gives you links to all of the different languages that they are available in.

Great. Thank you. Another question. How will your community health workers be trying to use these materials? You had mentioned that in one of the slides, that that's one of your next steps.

Sure. In fact the community health workers have already started to use them. Our team here, and the way that our clinics are structured, we do have close partnership with some clinics and we also have the capacity for community health workers to connect home visits to sort of priority patients. And so the materials are being used in the TB clinics as well as in the home with patients directly. It does require some planning and thinking in terms of setting aside time and space, and we found that those clinics that have been able to really use them are sort of the ones that have some time where there's some nurse interaction, which has a little bit more flexibility in time, and then there's an MD time which is a little bit less flexible. And so I think those are the clinics that have really been able to kind of use the materials for the benefit of – yeah, for the benefit.

Great. Thank you so much, Marisa, and there are some other questions that came in. We're going to move on to the next presentation. Marisa's contact information is on the slide there, so you folks who still have questions, you can email her directly.

Thank you so much, Marisa.

Thank you very much, Peri.

Marisa, this is Donna. If you don't mind, could you please put your contact information in the Chat box? People can then copy and save it.

I will do that. Yeah, I noticed they're not in the slides. Thank you.

Thank you.

Our next presentation, Tuberculin Skin Tests Workshop Online Portal. Helen?

Hey Peri, thank you very much. And Marisa, thank you for that interesting talk. That was really cool.

Okay, so as stated I am Helen McGuirk from the Michigan Department of Health and Human Services, TB Control Unit. And today I'm going to be presenting on our Tuberculin Skin Test Workshop Online Portal.

The Michigan Tuberculosis Control Unit, we'll be calling it TCU in this presentation, has provided a Tuberculin Skin Test Workshop and certification for healthcare professionals for over ten years. The goals of this workshop have always been to improve TB case detection through TST training and improve the quality and competence of TB skin testing for healthcare professionals.

In 2014, the TCU evaluated the workshop system and identified five gaps for improvement, the first being incomplete reporting of Workshop records, individuals providing courses who were not certified, and inappropriate curricula used in workshops by instructors. These issues were in part due to burdensome recordkeeping and logistics for staff, workshop instructors and participants, and a difficulty in conducting an accurate evaluation of the workshop.

In response, the TCU collaboration with Michigan Public Health Institute, otherwise known as MPHI, to implement an online management system called the TST Online Portal which would address these issues. Workshop, instructor, and participant records were moved online for better accessibility, tracking, and evaluation.

On to implementation. On January 9, 2015, the TST Online Portal went live. Each type of user had individualized access designed to meet their needs. Participants could search, register and access records for TST workshops. Instructors can create workshops, create course material, and upload participant information for certification and Continuing Education requirements. The TCU can upload new course content and relevant guidelines as they become available, and MPHI manages daily maintenance of the portal, certification, and Continuing Education applications.

In May of 2015, TCU and MPHI started an annual survey of Workshop participants and instructors in order to assess three main elements of the portal. Usability, capacity to appropriately manage needed components, and the ability to improve reporting completeness. Our survey information is continuously being updated and used to assess the portal Workshop.

As of September 2015, the portal has assisted in holding 254 workshops, certifying 1,777 participants. Hosting 149 certified instructors, and identifying the 15 instructors with expired credentials. The portal allows us to easily identify these instructors and students with expired credentials for follow up with recertification without burdensome and time consuming recordkeeping.

Additionally we have at least one TST workshop was offered in 42 counties, which represents about 83% of the total counties in Michigan. And on the next slide we're going to see how these numbers compare to the preceding five years.

So this graph demonstrates the total number of TST workshops, students and instructors from January to September in the years 2010 to 2015. When comparing 2015 post-portal launch to the average of the previous five years, there is a 22% increase in the workshops as seen in the yellow bars, and a 26.5% increase in the number of certified instructors in the blue bars.

The increase in the number of workshops and certified instructors represents the growing demand of institutions and organizations interested in employing certified instructors, holding their own TST workshops, and certifying their staff in a standardized fashion.

This graph represents the number and types of issues identified in the Spring TST Workshop Survey. There are three main issues that were identified by the launch of the TST Online Portal. The first being instructors with expired credentials in the red. Individuals teaching but never certified as instructors in the yellow. And instructors with current credentials but not registered in the Online Portal in the blue.

When we compare the first five months post-Portal launch, January through May, 2015, with the following months, which are June through September, 2015, we can see a decrease in two of the three main issues, that being from January of 2015 to September 2015, the number of instructors identified with expired credentials has decreased from 12 to three people. And in the same timeframe the number of uncertified individuals has decreased from four to zero.

And this graph demonstrates the average number of days between workshop completion and provision of certification and CEs to participants from January to September 2015. And since implementing the TST Online Portal, MPHI has decreased the average number of days between workshop completion and provision of certification and CEs by 58%, or from approximately two months to three weeks.

In a Online Portal that has been very helpful in minimizing extra paperwork and effort in certifying our healthcare professionals in the TST testing and reading skills.

I would like to thank Sherri Hines and Linda Holton of MPHI who worked continuously on this project. And Peter Davidson, our Program Manager and co-founder of the Portal.

Thank you.

Great. Thank you so much, Helen. A couple of questions from our audience. The first one is who and what entity certifies our instructors and how often is this done?

So through this workshop, the Department of Health and Human Services designs content and other information based on CDC's current guidelines. And we present it in a sort of standardized fashion for each workshop. We train our trainers out in the field. We have a main group of about 15 trainers for the state of Michigan. And they go out and teach the instructors how to teach this content. And in that case we have the same people teaching the same amount of information over and over again in order to maintain quality control.

Okay, great. And there's another question. Is there a cost for this credentialing?

In the state of Michigan, we don't have a fee necessarily. We leave that up to our instructors. We do ask that they provide materials for the class, such as – they have a practicum, so they're doing – they need the TB skin tests, syringes, and they need saline to do the practicum, and everything like that. So we ask them to provide that, and if they want to ask for a fee for registration for the class in order to pay for some of those materials, they are welcome to. But we leave that up to the instructor.

Okay. And another question we have. What type of quality control measures are in place?

So as I mentioned before, we maintain the same information for each class. And we also assess our instructors yearly with a survey ensuring that they know the information and they're able to answer any questions that come up accurately. And in that way we are ensuring that every workshop in the state of Michigan is as similar as it can be.

Okay. And do you use CDC, TFC training materials?

We do. Unfortunately, and the reason why we started doing this workshop, is there aren't many TST training materials from the CDC, and specifically not as updated as they should be. But we use as much as there is out there.

Okay, great. Thank you so much. That was very interesting, Helen, and we certainly appreciate it.

Okay. Thank you, Peri.

Our final presentation today is Many Infectious Disease Update for Nursing Education, Kristin and Jude.

Okay. Can everyone hear me? This is Kristin Gall.

Can you speak up just a little bit?

Yes, most definitely. So I am here to talk about the 2013 and 2015 Nebraska Infectious Disease Update. My name is Kristin Gall, and I'm presenting with Jude Dean with the Nebraska Department of Health and Human Services out of Lincoln. And we do have a couple of presenters. We have had a program change here in Nebraska. Our longtime TB Program Manager, Pat Infield, retired after 40 years of service to the program in August, so I'm serving as the TB Nurse Consultant, previously serving as the TB Education Focal Point for quite a few years. And our new Focal Point is Jude Dean, who is the new TB Education Focal Point as of September of this year. And she has previously served as – or she currently does continue to serve as the Hepatitis Program Coordinator, and this fits in very nice with the presentation of hepatitis as part of our Many Infectious Disease Update that we did.

So just looking at our needs assessment, we have the creation of the DHHS Nurse Provider Unit which where we were had the opportunity to provide free nursing continuing education through our agency for public health entities, and Jude actually served as a Lead Nurse Planner for that unit.

While it was running. We focused – the need was identified that TB, hepatitis –

That TB and HIV were identified. We had local providers and health departments needed updated IGRA information. IGRAs were really coming up and about at this time, and a lot of our healthcare providers, especially in rural areas, were lacking this information and unfamiliar with this topic. We hadn't done training since 2009 and wanted to update all of our providers. And we decided to call it the Traveling Bug Show, which was sort of fun on our end, is what we had called it here internally, and we wanted to go to nurses, to reach out to them. We have many updates provided in our larger cities in Nebraska, but it's really hard for some of our rural providers to get to the eastern side of the state where the population is in most of Nebraska. And we partnered with our AIDS Education Training Center, or the AETC, and we had the nurse practitioner presented as part of our Update in 2013. And she's out of the University of Nebraska Medical Center in Omaha.

When I came up developing our objectives for being a speaker, and Pat Infield and myself both spoke at these trainings, we wanted to describe the benefits and limitations of interferon gamma release assays, also known as IGRAs, with different tuberculosis risks, so we wanted to talk to folks about the history of IGRAs, updated guidelines using IGRAs and MMWRs. In 2013 we had the shortage of the TB antigen and were prioritizing for our high-risk populations, and so that was another big topic that was covered in 2013.

Also discussed the limitations of the tuberculin skin test, also some case studies, and also discussed the 3HP regimen, which was fairly newer at the time, or the 12-week INH-rifapentine regimen. And also, too, during the training, we had a lot of questions just about general TB in Nebraska, how to treat, diagnose, just a lot of things where people just needed updated information.

So our education implementation plan included using the nurse provider unit for the free Continuing Education unit. And we had four professionals travel to distant training sites. And we wanted to head out west and to the north side of the state, which are more rural parts of the state. What we did is we offered a four-hour session doing one hour of STDs, one hour of HIV, one hour of HIV and hepatitis C co-infection, and one hour of TB, and that way we would get a variety of audiences, maybe someone, you know, came for one thing but then they would get the other topics, so we wanted to target all those areas. And we started in the morning. And we did have to provide food since we were doing four hours, and that was problematic since none of our areas have extra funding for food, so we worked with our bioterrorism area who did a short training, and due to that we could provide some food for our participants.

And this is rather challenging, having four practicing professionals to get our schedules organized and to get ongoing and advertised. So it did take a lot of coordination and time planning this effort to get out to this community.

We, of course, we traveled using a van, and that was actually sort of a funny story not so much at the time we had gone out to get in the van and realized the van we had reserved didn't have any seats, and so we had to use a SUV to head out west. And they were long days. Nebraska is a long state, so it takes a whole day to get out to the west. And we did require overnight stay and meals. And we did do three locations during this effort.

In total we educated 118 nurses and healthcare workers in a couple of months. And while the numbers may not seem great, we are a low incidence state for TB and we also are a rural state, and this is exactly where we wanted to target our efforts. And so I consider this a very good turnout for people in rural parts. We had folks driving, you know, hours away just because that is the norm out in some of our rural parts, especially western Nebraska, so this is a win-win situation for everyone.

We did go to Scotts Bluff, which is right pretty close to the Wyoming border, and North Platte, which is more in the west central part of the state. I also did send the invitation out to Wyoming State TB Control Program. We did the advertising to make sure any of those folks who wanted to attend could attend because there's far and few between trainings for providers on TB and other infectious diseases in rural localities.

And then we hit Norfolk, Nebraska, which is up in the northeast part of the state in October.

In 2014, you may be asking yourself why didn't we go and do more in 2014. Well we had some different issues going on at the time in 2014. We had a big number of cases in Nebraska. We had a 55% increase from 2013 to 2014. And this was the highest percentage increase in the nation. And I do realize we don't have the number of cases that many other states have, but this kept us very busy with our limited staffing. I had the opportunity to do the National Jewish TB course out in Denver in April, which was a wonderful experience. And we never had the funds to go, so it took eight years for me to finally get out to the training.

And our cases are focused a lot on just the intensity of our cases are very complex, and so a lot of my attention was devoted to providing education to our healthcare providers with investigations, case management, and also to, you know, we have 1.25 FTEs for managing cases, myself being .25, and that was challenging to begin with, but then I was also pregnant and had my baby last year around this time, so I didn't really want to schedule another update at the time pending I would have any medical problems with my pregnancy.

Looking at our cases, in Nebraska for the last five years, you can see most of our cases are concentrated on the eastern side of the state in Douglas County, which is Omaha, and then Lincoln-Lancaster County Health Department, which is in Lincoln, and we're based out of Lincoln. But as you can see, around the state, especially in our rural areas, we do have scattered cases noted, and this is a lot of work and a lot of education that is needed for our rural health departments who are given the task to manage TB cases where they just don't have the numbers that have folks updated and used to dealing with this. So just an important note why we wanted to focus on some of our rural areas initially on this update.

Looking at our evaluation plan, looking from 2013, the CE evaluations were completed and multiple requests were done for more TB information. The length of training was challenging. Getting people four hours away out of the clinic was rather (inaudible). Also you combine this time with driving. And we also had requests to focus on the eastern side of the state. We had phone calls coming in wanting to know when we were going to come and do the eastern side of the state as there are, you know, the majority of the population is on the eastern side of our state. And people were hearing about TB, locals needed support to answer their questions. And then also, too, we knew Pat Infield would be retiring soon. She hadn't announced her plans but I sort of knew that would be happening sooner than later, and so we wanted to get out and sort of give updates before we had the staffing change here at the State.

So what we decided to do in 2015 is we decided to offer a two-hour mini-update, and at this time we just did TB and hepatitis. And we sort of took away the TB antigen shortage information, and drug shortage information, because that wasn't as big of a deal at the time. So we focused more heavily in the IGRA updates and the case studies. And the two-hour sessions, we offered multiple times a day. We wanted to target, you know, we had people from all different areas of healthcare professionals, school nurses, clinics, college health nurses, health departments. And mostly we did it three times in one day in Lincoln and in Omaha. And for the further off locations we did morning and afternoon sessions. And it was very easier to schedule two professionals with our schedules so we could get out and do it very easily. And we had fairly good turnouts because of nursing shift work, working with people's schedules. And we did five locations, two in Lincoln and Omaha and a session in southeastern and central Nebraska. And we totaled 242 nurses and healthcare workers were educated in one month, and so Jude and I were very busy.

Just so you can see that we pretty much targeted the whole state starting in 2013 in Norfolk, in North Platte, and in Scotts Bluff. And then in 2015 targeting Grand Island, Auburn, Lincoln and Omaha. And so we really – the north central part of the state is a very rural part of the state. We did have discussions

possibly about going back to the location with one of our local health departments, so that's something we are interested in pursuing possibly next year.

The evaluation and impact. You know, we discovered IGRAs were not being utilized in the field. And a lot of people just didn't even know IGRAs existed, so this was a big learning point success in my opinion. We also had a lot of basic TB education that is needed based on the questions where a lot of our providers needed more TB 101 information. And participants were so grateful for the Traveling Bug Show. As I said, you know, being a rural state, a lot of times the rural localities are sometimes forgotten, so folks were very happy that we could get out and reach to our population. As I said, you know, we have TB all across the state, just not so much, and it is harder for folks when they don't see it as much as some of our more populated areas.

Limiting the time we required people to attend the training assisted, too, as we seemed to have fairly good turnouts, especially in 2015 with the two-hour sessions.

We have had some more education requests on TB topics since our training such as infection control and more IGRA questions.

And then we had 242 participants rated the two-hour sessions as excellent and meeting all objectives 99.38% of the time.

And just wanted to thank Pat Infield who really was a strong supporter here in Nebraska for TB efforts.

And I have my contact information here as well as Jude's contact information since she will sort of be taking over the TB education efforts here in Nebraska.

And Jude, did you have anything to add?

If I can get off mute here. No, I think you did a good job.

Okay, I think we're open up for questions.

Okay. Thank you so much Kristin and Jude. One question I had for you was when you were planning the actual training, how much of it was didactic and how much was it interactive? Did you have some time built in for folks to ask a lot of questions?

We did. We had ten minutes at the end of each session built in just for questions, but when we started talking, both Kristin and I are a little more casual when we train. We try to even sit down with them so they feel more comfortable asking questions, and so we always put that disclaimer out there stating if you have a question, ask it in the middle of, you know, whenever it comes up. I'm sure someone else has that question. So we usually used the entire hour each, if not more, because we answered questions as we went along and that seemed to make a little bit more sense for everyone involved.

We also did the case studies where we didn't have the audience response system , which would have been nice since we're a little bit more informal here. But, you know, we did get some audience response back about, you know, proceeding with cases or a suspected TB case interpreting an IGRA, so we did do some of that during the presentations.

Okay, great. Another question for you, it says you referred to IGRA – that IGRAs have had some changes, updates, and one participant wants to know what these are.

I think the big thing we face in Nebraska is the turnaround time, especially in rural areas. We have had significant problems with getting people to utilize IGRAs with the transport time being out in very rural parts of the state. You know, we have had the change in our Public Health Labs processing time, but, you know, we have people that would not even do IGRAs because there was nowhere to send them. I know

of a case where someone had to go up to Rapid City in South Dakota to get an IGRA done because there was no place out in western Nebraska that could process a sample timely. So I think eliminating that was one of the big goals I wanted to capture with our population. You know, T spot, I know that's different where you have different time requirements. The problem with T spot is we don't have the Public Health Lab using it, but it definitely is an option. You know I – we talked about both testing options to our audience so they were aware of both options for them to utilize to encourage use.

Okay, great. And you also mentioned your Traveling Bug Show might go back on the road in the future. What changes will you make to your training based on feedback from your participants? Do you have any things you're going to add or revise?

You know, I think we did pretty good. I think I would maybe do some more TB 101, especially, you know, if we go in more rural parts just because we don't have the statistics to support it where we need more of like a TB 101 just, you know, differentiating between infection and disease and then moving into IGRAs. Our provider unit did expire at the end of September, so we're going to have to provide a new application with new objectives, so I would look at possibly that. And then, of course, since Jude is the new Focal Point Education, did you have anything you wanted to focus on, Jude?

No, it will probably be more of the TB 101 and then we'll have one that's more specific. What we decided to do for this Traveling Bug Show is open it up to more bugs and even infectious disease, so we're going to have kind of a smorgasbord of about 15 one-hour CEUs of different groups across the state, across the HHS, including radon education for nurses, some influenza education, West Nile Virus, and people are going to get to pick who they want to come out and when they want them to come out. And so that's how the Traveling Bug Show Part Two is going to happen. So what we'll do is we'll probably do a real specific provider one for TB and then we'll do a basic TB 101 also. And that will be part of what they can choose. So they could do the basic 101 and then do something more specific for providers or testing, nurse case management, those kinds of things. But we're in the process of putting that – let me back up – I'm in the process of putting that application together.

Well it sounds fantastic, and it sounds like you being out in the field and having an opportunity to hear from helps really helped you guys, too.

Yes, most definitely.

That's great. Well thank you so much, Kristin and Jude, for your presentation. And it looks like that's all the questions we have. I'd like to thank the speakers for their time and effort putting this webinar together, and to thank all the many participants who joined. We had lots and lots of folks on the line today.

I'd also like to acknowledge the Southeastern National Tuberculosis Center, especially Donna Setzer, Karen Simpson, and Emely Eluguardo for their assistance and expertise. Also thanks to the Curry International TB Center, the Global TB Institute at Rutgers, Heartland National TB Center, and the Mayo Clinic Center for TB for recruiting presenters.

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Please be on the lookout for details on our next webinar, which is scheduled for January 28th at 1:00 p.m. Eastern Time. Thank you so much. Good-bye.