Dr. Robin Masheb: And good morning, everyone. Welcome to today's cyber seminar. This is Dr. Robin Masheb, Director of Education at the PRIME Center of Innovation at VA Connecticut. And I will be hosting our monthly pain call entitled Spotlight on Pain Management. Spotlight on Pain management is a collaboration of the PRIME Center, the VA national program for pain management, the NIH-VA-DoD Pain Management Collaboratory and the HSR&D Center for Information Dissemination and Education Resources. Today's session is the educational mission in interprofessional pain care. I would like to introduce our presenters for today, Dr. John Sellinger, Dr. Ellen Edens, and Dr. Sara Edmond.

Dr. Sellinger is Director of Clinical Health Psychology at the VA Connecticut Healthcare System, Co-Director of Training for the Clinical Health Psychology Postdoctoral Residency at VA Connecticut and Assistant Professor of Psychology at the Yale School of Medicine.

Dr. Ellen Edens is the Co-Director for the VA Interprofessional Advanced Fellowship in Addiction Treatment. She is also an Associate Professor of Psychology at the Yale School of Medicine.

And finally, we have Dr. Sara Edmond, who's a Research Psychologist at VA Connecticut and an Associate Research Scientist in Psychiatry at the Yale School of Medicine.

Or presenters will speak for approximately 45 minutes, and we'll be taking your questions at the end of the talk. Feel free to send them in using the question panel on your screen. If anyone is interested in downloading the slides from today, go to the reminder email you received this morning, and you will be able to find the link to the presentation. Immediately following today's session, you'll receive a very brief feedback form. We appreciate you completing this as it is critically important to help us provide you with great programing.

Also on the call for today will be Dr. Friedhelm Sandbrink. He's a neurologist, the VA National Program Director for Pain Management, and Director of Pain Management in the Department of Neurology at Washington D.C. VA Medical Center.

Also is Dr. Bob Kerns, the Director of the NIH-DoD-VA Pain Management Collaboratory Coordinating Center, and Professor at Yale School of Medicine. Dr. Sandbrink and Dr. Kerns will be on the call to take any questions related to policy at the end of our session. And now I'm going to turn this over to our presenters.

Dr. John Sellinger: Okay, Robin, can you hear me?

Dr. Robin Masheb: We can hear you.

Dr. John Sellinger: Great, thank you.

Dr. Robin Masheb: Thank you.

Dr. John Sellinger: Thank you, everybody, and welcome to today's call. This is John Sellinger. As Robin said, I'm a Clinical Health Psychologist here at VA Connecticut, and it's a real honor to be doing this presentation with two of my esteemed colleagues, Dr. Edmond and Dr. Edens. I also see with Dr. Bob Kerns on the call, Bob and I go way back, and I would be remiss if I didn't mention that a lot of what we're going to talk about today really is standing on the shoulders of giants. When I came to VA Connecticut, Bob had established much of what we're going to be talking about today, and Dr. Edmond and Dr. Edens and myself have taken the ball from Bob and, I think, continue to grow and expand. So I'm excited to talk about the work that we're doing and the education mission in interprofessional pain care.

Alright, my slides are not advancing. Oh, there we go. Alright, so just to start, as far as disclosures, none for myself or Dr. Edmond. Dr. Edens does have two disclosures for two companies that she's working with who are providing addiction treatment and consultation. Objectives for today, we're going to be focused on three main things. Looking at VA and legislative requirements related to interprofessional treatment of pain and opioid use disorder, as well as recent educational requirements from the ACGME. We're going to be describing two interprofessional pain clinics that we run here at VA Connecticut and how they tie into these various VA and legislative mandates. And we're going to hopefully, at the end of this call, you will all appreciate the urgent need to develop effective training programs focused on chronic pain and substance use.

This slide I think in some ways is preaching to the choir for folks on this call. We know back in 2011, the Institute of Medicine released a large report detailing the impact of chronic pain on folks living in our country. And we know the economic impact is measured in the billions, whether it's related to healthcare costs, lost productivity. And interestingly, the data presented in the IOM report did not include military and VA. But working in the VA, we know that chronic pain is a significant issue with as many as fifty percent of our male veterans and up to seventy-eight percent of our female veterans suffering with some form of chronic pain. So, we know economic and productivity impact is high. Ellen? Ellen, I think you're muted.

Dr. Ellen Edens: Sorry, John. Now can y'all hear me?

Dr. John Sellinger: Yep.

Dr. Ellen Edens: I'm having to unmute in two different places. So this is Ellen. You know from the previous slide that pain is a really big deal. It's affecting a lot of our

veterans. You've probably seen the slide before. It's now ten years old, but you can see that as of 2011, this particular study demonstrated that close to half of all medical schools received less than ten or fewer hours of curriculum dedicated to pain management. Next slide, John.

And granted, that was ten—can you forward the slide? Alright. That was ten years ago. This is a systematic review that came out three years ago, really looking at worldwide relevant studies on pain medicine education for medical students between 1987 and 2018, and they only found 14 published studies. And so a side note here is that we actually need more public scholarships in health profession education. That's number one. But you can see that as of 2018, the U.S.A. is still lagging behind other countries in pain education, and this is, of course, despite the fact that during this period of time the U.S. is uniquely in the middle of a prescription opioid crisis.

Or if you viewed it another way, perhaps the U.S. prescription opioid crisis was fueled because of the low amount of pain education. And also what the study found was there was a strong priority given to neurophysiology and pharmacology in all medical schools in all countries, really discounting the psychosocial and spiritual aspects of pain management. But on a somewhat brighter note, regulations from VA as well as congressional legislative regulations and ACGME requirements have begun to change that. I'll pass it back to you, John.

Dr. John Sellinger: Great, thanks. So what we're going to be focusing on today is over the development of pain and opioid use disorder treatment in the VA, I think in a lot of ways we were ahead of the curve, but we are going to take a little bit of a historical perspective and go through some of the VA and legislative initiatives that have really pushed the importance of integrated team-based primary—pain care, rather, and looking at the interface of pain care with the treatment of opioids. Specifically, we're going to talk briefly about the Stepped Care Model of Chronic Pain, 2013 opioid safety initiative, the 2016 CARE legislation, and more recently, 2017 Provision of Complementary and Integrative Health Requirements.

So for those of you, again, probably preaching to the choir here, but the VA Stepped Care Model of Pain is really focused on this idea that we should be providing the right level of treatment to patients at the right time, starting with step one in primary care, working up through secondary consultation and then ending in our tertiary interdisciplinary pain centers or our CARF-accredited pain rehab programs. And you could see even going back to 2009, the recognition that we needed to have team-based interdisciplinary care of chronic pain really at all levels. So the integration of mental health both at step one and at step two, as well as the incorporation of substance use disorders programs recognizing the crisis that we were in and the crisis that only continued to get worse from 2009.

The Opioid Safety Initiative, which launched in 2013, was a further recognition of this crisis that was developing and that we were recognizing that the use of opioids, particularly the use of chronic opioids, was putting a lot of our veterans at risk. And so the Opioid Safety Initiative was designed to provide tools to the field to continue to monitor and look at things like overall opioid prescribing, looking at co-prescribing with other sedating agents like benzodiazepines, whether we were completing toxicology screens in a timely way, having veteran sign consents for long-term opioid therapy. And again, the Opioid Safety Initiative much like the Stepped Care Model was really pulling for this interdisciplinary approach. This requirement that disciplines really needed to be working together to provide both effective and safe care.

In 2016, the CARE legislation really gave the pedal to the metal, if you will, in terms of really pushing the VA for full implementation of the Stepped Care Model as had been laid out in 2009. Also calling for the development of pain management teams at VA medical centers. So again, we see this continuous push towards team-based care. And so these pain management teams at each facility were required to have representatives from each of these areas listed. So we needed to have a medical provider with pain expertise, a behavioral medicine specialist, an addiction specialist, a rehab specialists, all working together as a team provide evaluation, follow-up as needed, but particularly looking at those patients who were at higher risk for patient who are at high risk due to opioid prescribing. So again, this push towards team-based care.

And I like to use this slide whenever I talk about chronic pain because I feel like in the absence of pain teams, in the absence of team-based care, this is what pain and opioid use disorder treatment, I think, and also recognition looks like for a lot of our patients is they see a lot of specialists. Everybody puts their hand and their expertise into the mix, but nobody quite pulls it together to recognize really what the problem is. And so a lot of these initiatives that have been laid out, the Stepped Care Model, the CARE legislation, the Opioid Safety Initiative is really designed to break this picture down and to have all of these individuals in the room working together putting their expertise together.

But the question has always been how to do that, and how do we educate people how to do that? Everybody's very well-trained to do what they do but working as a team and doing interdisciplinary work is a different skill set altogether. So we're going to talk about wo programs that we've developed here in VA Connecticut where we've tried to pull our teams together, not just in a functional way, meaning we have to pull a bunch of disciplines in the room to treat patients with chronic pain and opioid use disorder but also teaching those teams how to work together, how to take their expertise and share them in a synergistic way to produce the best outcome. So the first clinic that I'll be speaking about is our integrated pain clinic, then I'll be turning it over Dr. Edens and Dr. Edmond to talk about our opioid reassessment clinic.

So our integrated pain clinic, it's integrated in that what we do is we take a team of specialists and we put them in the primary care setting. And we do that by taking referrals from those primary care providers who are really struggling with patients who they feel like perhaps they've tried everything they know that they can do or they're not quite sure where to go next in terms of getting the veteran connected into the right specialist at step two, if you think about it in the terms of the Stepped Care Model. And so this team is really there designed to provide an interdisciplinary assessment using that biopsychosocial framework, really thinking about not just the pain but thinking about the person with the pain. And what are the collection of issues that that veteran brings to the table to make sure they were putting together a comprehensive care plan.

Now our IPC team is made up of a physiatry, a physical therapist, a health psychologist. We also have a nurse care manager, and the goal of this clinic is to help primary care and the veteran determine what are the best step two resources to utilize and to have our nurse really work to help the veteran navigate step two. And for those of you who have worked in the system, you've probably recognized that sometimes the navigation is the biggest problem.

So our integrated pain clinic functions like this. We like to think about it as step one and half in the Stepped Care Model where we bring our specialist into primary care one day a week. Patients are referred to us, and we then make determinations about who at step two doesn't make the most sense for that veteran to see, again providing that coordination of care. Providing a single point of contact for the veteran as they navigate different services of the step two level. But again, I want to highlight here that the integrated pain clinic, although it's described as a team—again, when we started this, it was a bunch of people who are experts in their different areas. But pulling them together into a room is not enough. It's really about thinking about how to make this team work together and providing education to each other about the specific expertise areas that each discipline brings to the table. And that's really what the integrated pain clinic is all about.

So the goals of our clinic is to simplify pain referral process for primary care. We want to increase early access to interdisciplinary consultation, so we want to avoid what we had historically looked at, which was veterans who had literally been through everything and nobody knew where to go next. This is to try and get veterans early access to self-management strategies, interdisciplinary approaches to chronic pain, deemphasizing our reliance on opioids as a soul treatment modality, and really push a multimodal treatment approach.

And most importantly, that last bullet is one of the main functions of our integrated pain clinic. And again, Bob Kerns is on the line. He previously

knew this as our comprehensive pain management center is really to provide education. Education of our health psychology predoctoral interns, and also our health psychology predoctoral residents. This is a major rotation for health psychology trainees. Now I'm going to turn it over to Sara to talk about our opioid reassessment clinic.

Dr. Sara Edmond: Thanks, John. So our opioid reassessment clinic is a little bit different than the integrated pain clinic, so the mission of the ORC is to provide consultation and limited followup to help primary care in the assessment, management, and treatment planning for patients with chronic pain who have indications for opioid assessment. So most of the patients referred to our clinic are exhibiting some problems with opioid safety, efficacy, or misuse. So our clinic, which I think probably fits best into the step two part of the VA Stepped Pain Care Model, is staffed by internal medicine, a physician who is trained in addiction and pain, an addiction psychiatrist, a clinical pharmacy specialist, a clinical health psychologist, an APRN, and a nurse care manager. And we also just added a peer specialist to our team.

All of the prescribing members of our team are able to prescribe buprenorphine/naloxone, so they have their X waivers. And our clinic runs one half day a week, and we do assessments but also structured oversight and management of pain treatment and medication management. And we also facilitate referrals to other pain management options. Can you advance the slide one for me? Thanks.

So this shows the typical flow of our clinic. So we most often take referrals directly from primary care but sometimes from other sources, including the integrated pain clinic. We have our nurse care manager educate the patients about the clinic and what to expect in meeting with us, and also she asks a few questions prior to our formal intake. Then before we meet the patient, you do a structured chart review. Then the intakes are co-led by clinical health psychology and another team member who's a prescriber, most often an addiction psychiatry or addiction medicine fellow.

And then we follow most of our patients for structured opioid prescribing and monitoring, and we also offer treatment with a clinical health psychologist such as CBT for chronic pain. And the nurse care manager helps get their pain care coordinated similarly to an IPC, so we help with things like referring to physical therapy or more intensive mental health care. And I'll talk a little bit later, but as you heard me mention, we have clinical health psychology fellows, addiction psychiatry, addiction medicine fellow, and so a lot of opportunities for training and education across disciplines.

Dr. John Sellinger: And here at VA Connecticut, we're quite fortunate as I think many of you are in terms of having an academic affiliate. Here at VA Connecticut, we've got numerous—and they're not all listed here on the slide. But we have affiliations with the Yale School of Medicine, the UConn School of

Pharmacy, the Yale School of Nursing. We also trained nurses from Sacred Heart University. We have accrediting affiliates of the American Psychological Association. So a large focus at our VA is on education and training. And so with that, we are in a fortunate position to really integrate teaching and training into the care there we're providing for veterans with chronic pain and opioid use disorder to hopefully start to address that education gap that Dr. Edens pointed out earlier.

So in our integrated pain clinic, our training mission is very much focused on being an interdisciplinary team providing interdisciplinary training. So I listed here, as I mentioned earlier, our clinical health psychology predoctoral interns have this is a major rotation, meaning that they spend 8 of their 12 months of training in the integrated pain clinic with us. We also have postdoctoral residents from our clinical health psychology program come in and have the opportunity to provided advanced skills in terms of providing education to the team, also providing clinical supervision, tiered supervision to our predoctoral interns.

We also have trainees from a number of different [garbled audio] rotate through our clinic. These include physical therapists, physical therapy students. We've had pain anesthesia fellows, addiction fellows, chiropractic residents, primary care residents, and we've also had our nurse practitioner residents rotate through the clinic. Again all, in a sense, trying to understand what does an interdisciplinary assessment for chronic pain look like? And to provide that education, they literally sit in with each of the disciplines and watch what the assessment looks like. They get to see what kinds of questions are being asked, where the areas of focus are, and then ultimately at the end of the clinic when we meet to discuss each patient, how all that information is brought together to develop a suggestion of a care plan moving forward for that veteran.

Our clinic has also gotten recognition within our VISN. We've had pain management teams from other facilities across VISN 1 come down and observe our clinic. And some of them have actually gone back and replicated similar models are at their own sites. So this really is, again, a clinic very much focused not only on the care veterans but on the training of, in essence, the next generation of pain care providers.

The focus is really in our training, is pushing everybody to think about patients through the lens of the gate control theory, thinking about the biopsychosocial approach to chronic pain. Not just the person's pain where the low back hurts or where the knee hurts her or the shoulder hurts but understanding the context in which that pain occurs, so understanding the whole person. I like to say that each of our team members, whether they're trainees or not, function as both teachers and learners. So our interns and our residents provide education to other members of the interdisciplinary team and are recipients of education from those various disciplines as they

themselves sit in and look at what does a physical therapy evaluation look like? What does a physiatry evaluation look like? Again, so that as they're engaging in their discipline-specific work with a veteran, they have a better sense of what the rest of the pain care field looks like.

And obviously we're focused on cross discipline training and showing appreciation for the perspective that all disciplines bring to the table. There's no one leader in the pack, that we all have a say, and that if we integrate that say, that we can produce the best plan for the veteran moving forward.

Dr. Sara Edmond: Okay. And as for the opioid reassessment clinic and our training mission, we are so lucky to have a lot of different trainees in the ORC here at VA Connecticut. So we have clinical health psychology residents, and they typically rotate for 6 to 12 months where they co-lead our intake assessment and provide treatment, such as CBT or ACT for chronic pain. And we're lucky to be able to really let fellows customize their experience and determine which competencies they want focus most closely on, so a lot of times they're focusing on the assessment of pain and common comorbidities, interventions, such as ACT or CBT for chronic pain. And also interprofessional collaboration. But there are also a lot of opportunities for interprofessional teaching and training here.

We also have addiction psychiatry fellows, addiction medicine fellows that come quite regularly. And then that's somewhat more of a random interval, at least with COVID, we've had nurse practitioner students and residents, pharmacy residents, physician assistant students, and medical students, and they all rotate for various lengths of time. So, in general, if a trainee can join us for only one or two weeks, we'll have them only observe. And if they can stay longer, we will have them co-lead new intakes and lead followup appointments. And we have a list of top ten training objectives that we've developed for medical learners that Dr. Edens will talk a little bit more about later. And so depending on the length of their rotation, we work with the trainees to pick a few of those objectives to focus on.

We also are able to invite clinicians from other parts of our hospital to come observe, such as palliative care, to get a sense of what we're doing so when they make referrals, they know what to expect. And because we've moved to a mostly virtual modeling for COVID, we've also been able to invite clinicians and other VA healthcare systems to come observe. And we're actually working on implantation of this model in a few other VA facilities across the country. So it's a COVID benefit.

So in the 2019-2020 academic year, I had a fellow, Dr. Amanda Gerke who did some really lovely quality improvement work that led to several educational enhancements in our ORC. And I really want to give her kudos for pulling off this project in the midst of COVID and finding ways to make the enhancements that she proposed work in a fully virtual clinic model. So

she gathered stakeholder input, and used a Plan-Do-Study-Act approach to implement actually quite a few changes to our clinic processes, and that included three educational initiatives I'm going to tell you just a little bit about. Learning bursts, using a develop mental approach to intakes, and MI or motivational interviewing coaching.

So learning bursts are something that we sometimes did informally before Dr. Gerke did this work. So a trainee might ask a question in our conference room, and someone with expertise would answer and then talk through how that topic applied to a particular patient in clinic. And so what Dr. Gerke did is she tried to formalize that process. So we worked together to develop a list of topics, some that we try to do really frequently so that every learner will hear that, such as motivational interviewing or how to describe gate control theory. And then some others that we do on an as-needed basis or when they seem really relevant, such as antiracism in clinical encounters, CBT for insomnia, working with special populations, how to start someone on buprenorphine using an overlapping approach.

And then what we do with all those topics as we develop the one-page handout or one or two slides. And any team member can lead this, but it's most often psychology. And the learning bursts are meant to be interactive and discussion based, so the person leading will just review a few bullet points about a concept and then ask everyone to talk about how that topic or skill could be used in working in that ORC. And we do these learning bursts every week during our morning team huddle before seeing patients, and so then ideally this leads to more sidebar conversations during clinic about how these topics apply to working with a specific patient and also opportunities to practice things you learn during the morning. So maybe you learned a new way of describing gate control theory, and with one of your patients later on, you're able to practice that. Next, John. Thanks.

So we also shifted our way of doing intakes to use a more developmental approach for medical learners so that they can learn how to do our intakes in clinic in a stepped model approach. Our intakes are fairly extensive. They cover pain history, substance use history, and mental health history. And depending on the level of training in the background of a medical learner, some of those topics might be things they've done many, many times, and some might be brand new. So typically we start with having them just observe, and then depending on where they are in their training, we might have them start at step one or start at step two. But slowly over time, we'll give them more and more responsibility in the intake that they co-lead with health psychology.

And what you can't see here is that the template is color-coded so that trainees know what part of the interview they're responsible for, and this has actually been extremely helpful with our virtual clinic because when you can't see or it's harder to see the person you're co-leading with, it's harder to

read nonverbal cues and know when to pass the baton. And so Dr. Gerke developed a really detailed interview intake guide, and it has sample language and suggestions for how to cover each topic. And it's not meant to be a script that strictly followed, but it does help particularly with newer learners who might have limited experience in certain parts of the assessment.

And finally, we've tried to introduce more and more MI coaching into the clinic, and this is nice because it enhances the educational experience for health psychology trainees. They get to practice listening for MI skills and practice giving feedback. And then it also enhances the experience for medical learners who tell us all the time that they really don't get a lot of live observation and feedback during their training. And because health psychology co-leads all new intakes, there's a built-in opportunity for any trainee that does a new intake to get feedback on their use of MI. And health psychology will also do shared medical appointments or co-visit during followups to provide support and do coaching.

Dr. John Sellinger: And in our integrated pain clinic—and in some ways this also applies to particularly are health psychology trainees who are working in the opioid reassessment clinic—we do always keep our eye on mandates from our accrediting body. And so both are internship and our postdoctoral residency program are APA-accredited. And within the accreditation under—or I should say under the accreditation umbrella for health psychology, the Council of Clinical Health Psychology Training Programs has put forth some expected competencies that psychologists who work in the field of health psychology would have. And not surprisingly, these include things like assessment and intervention, but more specifically looking at things like the biological, psychological, and social environmental factors related to assessment in the pathophysiology of disease and treatment.

Consultations, so providing intradisciplinary and interdisciplinary consultation within the healthcare setting. Supervision and training, so again being able to train people who can then train the next generation to continue to do this interprofessional work, as well as management and administration competencies. So how to keep an eye on the administrative aspects of running clinics like IPC and ORC. And those elements are many. And so what we do is we really expose our interns and our residents to all aspects of these competencies in terms of their direct engagement in assessment, their direct collaboration with other interdisciplinary partners.

Again, what COVID has really afforded us the opportunity to do is to do these assessments literally at the same time, so we are on a video call with a veteran providing assessment and intervention with the other members of the team right there on the line. So able to go back and forth during the evaluation process, again picking up on how does a physical therapist do their evaluation? How does a physiatrist do their evaluation? How can what I do as

a psychologist come to bear on what it is that they're doing? Or might I be able to offer them in terms of—and oftentimes they will seek this out from us, like how can I get at this information better for my patient?

And so we're able to provide that guidance on whether it's motivational interviewing or even just interviewing skills in general. So again, every discipline has something to bring to the table, and this clinic affords everybody to bring that to the table all at once, while the same time for us in psychology, really striving to meet the competencies that are expected of our trainees. Ellen.

Dr. Ellen Edens: Thanks, John. Yep. So in July 2019, the Accreditation Council for Graduate Medical Education, also know as ACGME, began requiring that all programs provide instruction and experience—I've underlined that in red—and experience in pain management, if applicable for specialty, including recognition of the signs of addiction. So as an addiction specialist myself, this is where I get really excited because here is a very clear recognition that we cannot teach pain management without also talking about mental health and addiction specifically. The requirement actually further directs residency and fellowship programs to develop evidence-based educational intervention. I didn't really highlight that here, but I guess I want to say it one more time that we're to be developing evidence-based educational interventions, which I think Michael is getting at in the chat, in order to effectively teach residents and fellows.

And the only way we're going to know if something's evidence-based is, of course, if we studied it. And so this is just a second side plot here that we need to be studying and publishing on our education interventions. But the requirements call for is, 1) we are to teach residents and fellows how to prevent addiction whenever possible, while effectively treating pain. 2) To recognize addiction in its earliest stages. 3) To function effectively in systems of care for effective pain relief and addiction. 4) To use nonpharmacologic means wherever possible. And I thought this last one was super interesting. 5) We are to be participating in clinical trials of new non-opioid pain relief that is customized to the needs of the clinical disorders of the populations in which our fellows and residents serve.

So I take that to mean that if you are an OB training program, you need to be thinking about effective non-opioid peripartum pain management or perioperative pain management for gynecologic surgeries. As an addiction specialist program, we need to be thinking about effective pain management in patients who have substance use disorders. So next slide.

So people with substance use disorders who have pain is a population of particular interest to me, and it's very prevalent. So to illustrate why this is important, according to 2020 CDC data, approximately twenty percent of US adults have chronic pain, and about 7.4 percent of US adults have an active

substance use disorder. That's according to the National Survey on Drug Use and Health. Large datasets, national datasets that use DSM-V have it as high as thirteen percent of U.S. adults. But it is somewhere between 20 and 30 million Americans have an active substance use disorder in any given year. And then when you look at rates of chronic pain in patients with substance use disorders, while the rates vary quite widely, they are nonetheless greater than in the general population. And also chronic pain is officiated with poorer substance use disorder outcomes, so we need to be studying this group. Next slide.

And unfortunately, most studies of chronic pain have excluded patients with substance use disorder, so we really have limited evidence about the unique challenges that these patients face and have limited information about the effective treatments within the population. Additionally, compounding the issue, is addiction as a medical specialty has historically been seen as the brain-based behavioral disorder that it actually is. And so many addiction training programs are run by psychiatry and psychology, which I think is terrific, but, unfortunately, pain education has been very limited in psychiatry and in psychology training programs, at least outside of health psychology. And I think that this really bidirectional gap in knowledge and training has led to a very fragmented system of care.

So when pain specialists are not trained in addiction assessment and management, what you find is that patients with substance use disorder are excluded. And when addiction specialists are not trained in pain management, they decline patients who present with a primary pain complaint. And I bet everybody on this call has found somebody who needed substance use specialty care has sent them there, just to have a substance use specialist say this is pain, and I don't do that. So this is a big issue. Next slide.

Hopefully our ACGME common requirements are going to address that treatment gap and educational gap. But in 2014, with addiction psychiatry residents as Sara mentioned, we have a lot of addiction fellows rotating through our clinic, and we have a very large addiction psychiatry fellowship program. We now train ten a year. And so in 2014, they were rotating through our clinic, and the gaps in knowledge about pain among psychiatrist is becoming really obvious. And we wondered if other fellowship programs are also struggling to address these knowledge gaps; and if so, what educational goals should be included in their training. And so what we did was we held a focus group with five geographically varied program directors to identify importance, look at barriers, any facilitators, and existing resources for pain education in addiction fellowship programs.

What we found was consensus that clinical training and curriculum was needed, and then we identified three things that I wanted to focus on within the barriers. Number one was really a lack of clearly defined goals. So what

is it that psychiatrists need to know, an addiction psychiatrist specifically? There were some attitudinal barriers, things like negative past experiences at that time when addiction fellows would go to a pain medicine clinic. It would be very interventional based. It wasn't necessarily applicable to what they needed to learn. And then there were also some resource barriers, just not enough faculty to be able to teach this. Alright, so next slide.

So after that, we then convened experts locally at Yale to look at that first barrier. What do we need to know? What are our top objectives for learning through the opiate reassessment clinic rotation? And from this, we developed consensus on ten objectives that we thought were relevant:

1) Perform a general pain assessment. 2) Be able to assess safety and efficacy of long-term opioid therapy. 3) To recommend possible treatment plans to veterans or patients. 4) To be able to collaborate with other disciplines. 5) To interpret urine drug tests. These are addiction fellows. Obviously, they know how to do a urine drug test, but really understanding all the different prescription opioids was somewhat new to our addiction fellows. So we spent time on that. 6) Be able to explain the difference between acute and chronic pain. 7) Distinguish between neuropathic and nociceptive pain. Many of our medications do target neuropathic pain as psychiatrists, so making sure that people understand we can treat pain. And a lot of our medications actually do overlap with that condition. 8) Be able to discuss the rationale with patients for non-opioid pain management. 9) To be able to discuss the rationale with patient for optimal mental health and substance use management. And last but not least, 10)—this is actually something that was added. We took out aberrant medication taking behaviors because we really have lumped that into safety and efficacy and now overseeing a switch from full to partial opioid agonist therapy. Partial agonist opioid therapy, sorry. So those are our top ten objectives. Next slide.

And over the last several years, this isn't the best data because we have a lot of free rotation data and less post rotation data. But you can see here that the trend indicates that we really are targeting these objectives and by and large meeting them. The ORC has really expanded enormously since those early days, and as Dr. Edmond's already talked about, we have many, many fellows and residents and students that are coming through. And so targeting these objectives for those individual groups is something that we have an eye on for now. Back to you Dr. Sellinger.

Dr. John Sellinger: Great. So I think, in summary, as we think through the clinics that we've just described to you, we want to encourage the field to really think about not so much being under these directives and we got to make this happen, but really just to look for opportunities. So we know that chronic pain and opioid use disorder co-occur at high rates, and we've got clinic and legislative mandates that are on us for how they want us to do this care but that this does provide for us clinical and training opportunities. And so it's important to look for

them, and if you can't find them, to create them, which is really in essence what we've done here at VA a Connecticut.

And this is important we feel because of the work that we're doing we feel is really helping to prepare the next generation of our workforce to meet the mission of the VA, to keep the Stepped Care Model for Chronic Pain alive and well, to keep our focus on multimodal treatments as we think through, again, the treatment of both chronic pain and opioid use disorder. We want to prepare a workforce for working on interprofessional teams. We're all highly skilled in our areas of training but working on a team is a different skill set. And it's important that we expose our trainees to opportunities to work on these teams and figure out how to make team-based care work. We want to continue to bridge the gap between treatments for chronic pain and opioid use disorder. And finally, we want to maintain a focus on the biopsychosocial approach.

So again, thinking holistically about our patients and not trying to create a one-size-fits-all, but instead to recognize that patients can have pain and opioid use disorder. It's not one or the other as Ellen as I were talking about as we were preparing for this presentation that there's this historical thought that this is just an opioid use disorder, there's not really pain here or vice versa. And so to really think that these things can co-occur and that every treatment plan needs to look different, and it needs to be informed by the biopsychosocial approach for that individual patient.

A couple of things we wanted to just bring up on this talk, so with the emergence of our management teams and even some of the earlier work that we have done here on team-based care in bringing teams together to address issues around chronic pain and opioid use disorder, we have found other opportunities even outside of our clinic to take the expertise that we've successfully pulled together in our clinics and shared it with our colleagues across the medical center.

And so one of the ways we've done this is through what we call our pain mini residency. And our pain mini residency was a program that ran for three years here at VA Connecticut, and what we did is we opened the door to all primary care providers at VA Connecticut to come to this three-day training that was, in essence, run by our pain management team. So we had representatives from rehab. We had pain interventionalists. We had health psychologists. We had addiction medicine represented. And this opened the door really for primary care providers to come in and not only access this team in terms of putting faces together with names but also to understand this biopsychosocial approach and to get a look at how we are going about it. And to give them strategies for how they can do it in their own work in the primary care setting.

So our topics in this three-day training covered everything from how to

manage pain in a pact, looking at complex pain conditions, analgesic pain meds and addiction, nonpharmacologic pain treatments, and specifically how to talk to patients about nonpharmacologic pain treatments, which oftentimes that's the biggest barrier, is providers are aware of all the things that are out there. They just don't know how to talk to patients about them. And if that conversation doesn't go the way we need it to, then oftentimes it makes that bridge to the treatment broken in some ways.

We did hands-on simulations for joint injections. We talked to them on how to do things like motivational interviewing and how to do goalsetting with patients, two things are really important when you think about the lived experience of patients with pain in terms of what is their quality of life and functional status look like. So we gave them tips and strategies on how to have those conversations with their patients and how to complete a biopsychosocial pain assessment.

Once we're able to get all of our primary care providers in VA Connecticut through this training program over the course of three years, we were able to open the door to other providers. So we had some of our rehab folks come through. We had physical therapist, occupational therapists, also participated in the pain min-residency. So again, an opportunity where we had developed something for the purposes of providing direct patient care but recognizing that once you get these team members together and working together, there's real synergy there. And that synergy can very easily be shared. And this was one opportunity that we were able to take advantage of that. Ellen.

Dr. Ellen Edens: So besides staff development, we really had the opportunity also to integrate some of this education into our medical school. In 2012, Yale, like many medical schools across the country, really went an overhaul of their curriculum, and we moved a lot of and expanded our pain education into the first year and second year, very much focused on case-based discussions. Yes, we still have a didactic, which by the way is now video recorded and that type of thing. Students can watch it before class, but then within class—and not it's all done on Zoom—we have our 90-minute practice session.

So in our first year, there's two classes focused on acute pain and chronic pain. It's really on taking a pain history. It's very basic from MS1. And then in the second year, we have more of advanced pain workshop where it's one person who comes in with acute abdominal pain that then a couple of years later has transitioned to chronic pain on long-term opioid therapies so our medical students can really think through that transition, how things could have been prevented, how do you talk to patients about the opioids that they're on, about the biopsychosocial formulation, et cetera. Next slide.

And then moving back to faculty development out of the pain mini-residency, it was so successful here that it gave us the idea that, again, recognizing that when you talk about pain, you really also need to be talking about addiction.

And frankly, vice versa. But that was so successful that we began thinking about an addition mini-residency and what would that look like. It was, again, based on the successes of Connecticut's pain mini-residency. So we convened an interprofessional committee in March of 2018. It was so exciting here, and this is a second plug for education as I've heard many staff who've been involved in this say that it really has helped to prevent burnout to be involved in something exciting like this, to be able to share their expertise with other staff members in our VA. And so it's had a lot of side positives in developing this.

We had our first pilot workshop in September 2018. We've made it, as much as possible, very interactive. We do focus a lot on stigma. We use motivational interviewing and provide coaching between day one and day two with some feedback about that. We have veteran panels. We have videos and that type of thing. We also have incorporated three simulations that we created using a patient in primary care that has chronic pain, has been prescribed opiates but also does ultimately have opioid use disorder. And so in the first simulation, our participants to a pain assessment, and they're able to diagnose opiate use disorder.

In the second one, they practice consenting and actually prescribing buprenorphine. And then the third, we see that same veteran back at one-week followup for medication management, relapse prevention, dose adjustment. That type of thing. It is an interprofessional simulation, so we do it as a group. We try and provide framing for those simulations and then each person takes a specific objective that they are going not practice and are tasked with during that simulation.

We switched to virtual in June of 2020 out of necessity, and then the other exciting thing with regard to this is we are working with the VA SimLEARN center down in Orlando in order to really make this much more interactive and to have—we've done our best to incorporate adult learning theory, but they're the experts, so they're really helping us. Next slide. I'm going to finish this in two minutes.

Next week is going to be out 12th training. We've trained over 200 people, but I'm only going to show some results from a training. The first one was a pilot. What I will say is that we have major take-home methods from these results that are high retention. I mean, this is a two-day training, so to have this many people come back for day two is pretty impressive, I think. The results I'm going to show you on the next slide are a survey of 122 people, and these are the questions we asked. How effective do you think you can be in helping people change their substance use behaviors? How much do you agree with, I'm prepared to screen, diagnose, discuss treatment, and provide interventions for alcohol use disorder? And the last one is for opiate use disorder. Next slide.

See if I can finish in time. So these are our results, and you can see I've separated out by in-person and virtual care. By and large, people who come in feel pretty confident about alcohol use disorder management, less so about this confidence that we can make a difference in helping people make those changes. And you can see some shifts then between pre and post and how confident people are in these four domains, it is statistically significant for time. We also looked at format. It's not statistically significant, so it doesn't seem to be different between in-person and virtual. And then we also looked at format by time, also not statistically significant. So last slide.

I'm finishing up. I think we just really—these are our main take-home messages. Pain education is being legislated and addiction education is being required by accreditation bodies, and so one thing when you're setting up your clinic, think about the educational mission from the very beginning. Make sure that you are including education on addiction when you're thinking about pain education. And then also consider the audience. So some people need more pain more than addition and some people need more content on addiction rather than pain.

And one thing that's been so fun from our clinic is just getting the interprofessional staff involved. The addition of a clinical pharmacist has really—I mean, the amount of questions that we can ask our clinical pharmacist. Having health psychology has been a gamechanger. We've had the fellows come in and postdocs come in and do QI work. The MI coaching from health psychologists. Having addition specialists has been super helpful, and it's just been great to have this team. And with that, I will end, how we train basically ends up how we practice, so don't forget education.

Dr. Robin Masheb: Thank you so much to our speakers. This was just incredibly inspirational to see how this has evolved over time because I've heard three of you speak over quite a few years. And to watch it become more systematically implemented and the focus on education and having things integrated, just kudos to all of you. It's really incredible. I know Sara had written that there is a paper that you're working on for the adaptations for virtual care, was just wondering if maybe you would share a few things from that, that maybe you learned or ideas that you had about how maybe this could be even more widely disseminated. It seems like the big limiting factor is the actual practicing of it, not the informational part of it. So I'm wondering how you were able to handle some of those challenges.

Dr. Sara Edmond: Sure. Thanks, Robin, for that question, via I think Rosanne maybe. We like everyone learned on the fly how to do this completely virtually. But it happened right as Dr. Gerke was doing her QI projects that I briefly described. And so we used what she learned from her stakeholder interviews in her QI project to think about, okay, here were the adaptations to clinic you were going to propose. What can we do instead, and how can we take the similar problems that we identified and preemptively solve them, even more

so with COVID? And I think a lot of what made virtual clinic work for us was formalizing things that used to be informal and also slowing down a little bit.

So the learning bursts were something that would just happen. We were all sitting in a conference room together in between patients, and someone would say, what you know about this topic? And someone would answer. Well, Zoom does not allow for casual sidebar conversations very much. So we formalize those learning bursts, and we really prioritize time during team meeting before anyone sees patients to make sure that we didn't sacrifice that part of our educational mission. It used to be when we had patients coming back in the room, if a health psychologist was in between patients and could observe and do MI coaching, we would just do it on the fly. Now that all of the appointments are virtual, we have to really schedule those things. So I think a lot of it is just thinking about what are the most important educational components of your clinic? And how can you formalize them and sort of structure clinic in a way that make sure that they happen rather than assuming they're going to happen organic?

Dr. Robin Masheb: That's great. Super interesting. I think a lot of our questions were answered. I wonder if Bob or Friedhelm have any thoughts about the implications of this with regard to policy and the VA nationally. It seems like this is such an incredible model that I assume all of you would like to replicate across the country, so I was curious about your thoughts.

Dr. Bob Kerns: I'll just respond, thanks for the opportunity to speak. Can you hear me okay?

Dr. Robin Masheb: Yes, we can.

Dr. Bob Kerns: So I can't let John's opening comments go without thanking him and thanking this group for their work and for referencing the longstanding traditions at formally West Haven VA Medical Center, not VA Connecticut Healthcare System and the West Haven campus. I really do think that this focus on education is of central importance, and I think we recognized that literally in 1981 when I worked with Dennis Turk. Maybe many of you know that I started this, my work in pain, in partnership with him. We from the very beginning described not only the pain program but everything we were doing as we built a health psychology program as an integrative clinical research and training program. It was just on us right from the beginning to have an education or training focus. And by the way, our work was always at least multidisciplinary if not interdisciplinary, and I think pain calls for that. So that's one thing that I really want to reinforce.

I think we all appreciate that there's a workforce development issue really across every one of our professions, medicine, nursing, psychology, rehabilitation, specialties, et cetera. There just aren't enough people with expertise in the area of pain assessment and pain management, so this focus

is really important. And I really like the way you provided some great examples of embedding newly embedded interdisciplinary, multimodal programs in primary care as a nice framework for thinking about building this training.

Of course, I think for many of us among all the presenters and probably many on the call, all have roles in your affiliate related to education. And I think I'm proud of what we've done here at Yale and VA Connecticut. I hope many others are thinking about what you could do to advocate within your affiliates in the medical school, nursing schools, pharmacy schools, other professional schools, to try to promote pain education. Take this as critically important in order to address these important public health crises. So thank you.

Dr. Robin Masheb: Yes, thank you. Go ahead.

Dr. Sandbrink: So I'll say just a few words. Thank you so much, first of all, and of course John, Ellen, and Sara for not just presenting the data but doing the work that you do. And, Bob, of course, Dr. Kerns for really having started this in many ways many years ago. But I think what we need to take from here is the educational need. We have to think about our trainees. And I really want to thank you for showing us to clearly the different trainees that we have in our clinical programs and how to bring them together, learn from each other. And then, of course, separately that we train the ones who are already in practice. The ones that we work with every day. Our colleagues. Ourselves. There'd be two educational missions that we have, we can many ways come together.

I certainly love [garbled audio] that how we train is how we practice. But I think training itself, educating trainees elevates a standard, academic rigor. I think it brings teams together. I find this is helpful not just for our trainees, but I think it helps us as providers and us as teams. And with that, I want to thank you for sharing this data, and we're really looking forward to learning more from [garbled audio] the additional great stuff that you will do with this.

Dr. Robin Masheb: Incredible. Thank you so much, again, to our presenters. Thank you to our audience for joining us. Today was the last session for spotlight on pain management for this academic year. We're looking forward to having everybody join us again in September. Our next seminar is going to be on Tuesday, September 7th. If anybody's interested in downloading the slides, just a reminder to go to your email that you received this morning. You can also find any copies of our previous sessions by searching on the HSR&D Cyber Seminar archive and using the pulldown menu to search on Spotlight on Pain Management. And just one more reminder to hold on another minute or two for the feedback form, and we'll be sending out registration information about 15th of August. And we hope everybody has a wonderful summer and that you're able to join us again in the fall.