

## TRANSCRIPT OF AUDIO FILE:

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#### **BEGIN TRANSCRIPT:**

MODERATOR: Good afternoon, everyone, and welcome to the SAMHSA-HRSA Center for Integrated Health Solutions' webcast: Screening, Treatment, and Prevention of Viral Hepatitis Within Behavioral Health Organizations. My name is Colleen O'Donnell. I'm your moderator for today's webinar.

As you may know, the SAMHSA-HRSA Center for Integrated Health Solutions promotes the development of integrated primary and behavioral health services to better address the needs of individuals with mental health and substance abuse conditions which are seen in specialty behavioral health care or primary care provider settings.

In addition to national webinars designed to help providers integrate care, the center is continually posting practical tools and resources to the CIHS website, providing direct phone consultation to providers and stakeholder groups and directly working with SAMHSA primary and behavioral health care integration grantees and HRSA-funded health centers. [0:01:00]

Before we get started, a couple of housekeeping items. To download the presentation products, please click the dropdown menu labeled Event Resources on the bottom left of your screen. Slides are also available on the CIHS website at [www.integration.samhsa.gov](http://www.integration.samhsa.gov) located under About Us webinars.

During today's presentation your slides will automatically synchronize with the audio, so you'll not need to flip any slides to follow along. You may submit questions to the speakers at any time during the presentation by typing a question into the Ask a Question box in the lower left portion of your player. Finally, if you need technical assistance, please click on the Question Mark button in the upper right corner of your player to see a list of frequently asked questions and to contact info for tech support if needed. [0:02:00]

Today's webinar is actually in two parts. This is a live presentation on the outreach education and psychosocial support activities from the clinical and public health perspectives on education, prevention, identification, and treatment. Available now as a recorded webinar is a comprehensive review of medications, including the new medications, cost, treatment issues and

protocols, the psychiatric and primary care provider perspectives on cost concerns, anticipated changes in the approaches to treatment, and the role of behavioral health.

Our objectives today are to create a shared frame of reference for the basics about viral hepatitis, including epidemiology, prevalence, and implications for patient care. Understand the impact of undetected, untreated infection among patients with mental health and substance use disorders, education, prevention, and identifying mental health substance use disorder patients as candidates for screening and supporting your participation in treatment. [0:03:13]

Right now, I'd like to turn this over to Dr. Elinore McCance-Katz, the Chief Medical Officer at the Substance Abuse and Mental Health Services Administration, Office of Policy, Planning, and Innovation, for some introductory remarks.

ELINORE McCANCE-KATZ, MD: Thanks very much, Colleen, and thank you for taking time out of your busy schedule to join us in important discussion of viral hepatitis. This is a topic of substantial importance to SAMHSA and to the behavioral health community. As will be discussed in this webinar series, those with behavioral health disorders have significant rates of viral hepatitis, and specifically hepatitis C, a virus spread mainly through parental transmission or contact with infected blood.

We know that injection drug users are at great risk for infection and have prevalence rates as high as 64%. But in addition, those misusing other drugs and alcohol and those with serious mental disorders also have higher rates of hepatitis C infection than does the population at large. It's estimated that the overall rate of hepatitis C infection in those with behavioral disorders approaches 20%. HCV is a chronic infection that can lead to severe liver disease including cirrhosis, hepatocellular carcinoma, and it's the leading cause of needs for liver transplant in the United States. [0:04:32]

Epidemiology screening and testing and treatments for hepatitis C virus will be discussed in these webinars, and the good news is that new simpler oral medications with less serious adverse reactions are being developed and approved by FDA at a rapid pace. While PEGylated interferon and ribavirin will continue to be used as treatments, there will be a growing use of oral medications with interferon, and increasingly, standalone medications, which, taken as directed, can eliminate the virus. [0:05:04]

At SAMHSA, we believe that those with behavioral health disorders must receive care for all of their physical and mental health needs. Given the higher prevalence of hepatitis C virus infection in this population, we at SAMHSA urge providers to learn about this infection, to screen and test for it, and to refer those with infection to treatment.

As you know, integrated health care has become an overarching theme in health care settings. For behavioral health, this will take many forms as our patients have many treatment and psychosocial needs that should be integrated into their care. But the integration of mental health, substance use disorders, and medical treatments, either by bringing medical care into behavioral health programs or by bringing behavioral health into primary care, are approaches that have shown success in improving outcomes. These models will make it easier for those with

behavioral health disorders to obtain treatment for hepatitis C virus and other forms of viral hepatitis.

SAMHSA will continue to encourage behavioral health providers to learn about diseases such as hepatitis, and specifically hepatitis C virus, and to ensure that at-risk patients receive appropriate prevention, counseling, testing, and treatment, and when needed, they will receive all these services in a single place; that would be the ultimate goal. [0:06:21]

I'll end by saying that my background is on psychiatry addiction medicine and infectious disease epidemiology. I see prevention and treatment interventions for infectious diseases that frequently affect those with behavioral health disorders such as hepatitis C virus and HIV as key components of behavioral health care. One of the first things I did after coming to SAMHSA was to write a Dear Colleague letter encouraging behavioral health providers to screen for and to test for hepatitis C as recommended by the U.S. Preventive Services Taskforce. This letter will continue to be sent yearly from SAMHSA; you'll probably get it in the next month or so.

This webinar series is another effort to make behavioral health providers aware of and knowledgeable about this issue so that our patients can get the care they need for these serious conditions. Thanks very much. [0:07:09]

MODERATOR: Thank you very much, Dr. McCance-Katz. Now I'd like to introduce our first presenter. Dr. Maggie Chartier is the National Public Health Clinical Psychologist for the Veterans Health Administration's HIV, Hepatitis, and Public Health Pathogens program in the Office of Public Health Clinical Public Health. She's also a staff psychologist at the San Francisco V.A. Medical Center. In 2013, she was awarded a James Besyner Early Career Award for distinguished contributions to V.A. psychology by the Association of V.A. Psychology Leaders. Dr. Chartier?

MAGGIE CHARTIER, MD: Thank you, Colleen, for that introduction, and thank you, Dr. McCance-Katz, for your remarks as we open this series. So some of what I'm going to share, I'm going to go into a little bit more detail about some of the highlights that Dr. McCance-Katz mentioned, and, you know, certainly am open to questions at the end if you want to ask any questions in the Q&A section. [0:08:12]

So I thought I would just start with some real basics on hepatitis, and this may be pretty basic for some of you. You may have a pretty good understanding of hepatitis, but just so that you kind of understand the complexity of hepatitis, and in particular, hepatitis C. So hepatitis basically means an inflammation of the liver, and it can be caused by a variety of different things, the most common of those, viral infection. And we're going to be focusing in specifically on hepatitis C, but other things like alcohol use can also cause inflammation of the liver.

There are vaccines that are available for hepatitis A and B, but not for hepatitis C. And as Dr. McCance-Katz said earlier, we do have more and better treatment to treat hepatitis C than we have ever had before. And so I'll talk a little bit about that, but mostly focusing in on some of the epidemiology and some of the basic risk factors for hepatitis C, which I think, as she also

mentioned, are incredibly common in the mental health and substance use populations that we work with. [0:09:07]

So hepatitis C is a blood-borne viral infection with a lot of modes of transmission and different genotypes, and I'll talk a little bit more about that in the next couple of slides. Most of the people who have hepatitis C actually have no symptoms or have fairly mild symptoms, so you can't actually tell by looking at someone or talking to them whether or not they're infected by hepatitis C, and often, people themselves have no idea if they are infected by hepatitis C unless they're tested for it.

So again, one of the things that I'll really emphasize here is the importance of screening. We have good treatments for - we have better treatments for hepatitis C that are available now and even better treatments coming down or that are on the horizon over the next couple of years, but we can't treat people unless we know they have hepatitis C, so we're really going to talk a little bit more about screening also and who's at most risk for hepatitis C. So screening can detect exposure to the virus, and then further screening and further testing can actually determine what the genotype is, which plays a role in determining the course of treatment. [0:10:09]

And the reason that I'm going to talk about this a little bit here, and I'm not going to go into a whole lot of detail but a little bit, is that if you're working with someone who is hepatitis C infected and they're a little bit unclear about why they're on one treatment versus another and their friend is on a different treatment and it's confusing to them, I think it makes sense for us is to have your health providers to understand the nuances in hepatitis C treatment, and that comes down oftentimes to a genotype.

So some - as Dr. McCance-Katz said, some current treatments still include interferon. And certainly to date most of the treatments included interferon which had many, many - so has many, many side effects, is difficult to tolerate, and is quite long in duration of treatment. So some of these new medications that are coming up will be shorter in duration, be much more effective, you know, be a fairly straightforward regimen with much fewer pills and much - a much easier treatment in general for people to take. [0:11:13]

So I just wanted to give you this snapshot of genotype distribution. So there are six different genotypes of hepatitis C, and within that there are different subtypes of genotypes, but I'm not going to go into that. But the snapshot here that I think is important to take away from this is that the genotypes that are most common in the United States are one, two, and three. And for the most part, most of the folks that we see have genotype one. And so again, as you learn a little bit more about hepatitis C, and it sounds like there's another presentation that focuses more in on the medications and things like that, the genotype is going to be important for you to understand in terms of why different patients are started on certain medications or certain combinations of medications and not others.

So this is kind of an old slide, and this is the prevalence of hepatitis C in selected populations. But I like this slide because it really highlights the high percentages of hepatitis C that exists in different populations, and a lot of populations that we come into contact with have behavioral health providers. So there's a high percentage among incarcerated folks, folks who use IV drugs,

who are drinking at problematic levels, who are homeless. Veterans have a very high rate of hepatitis C compared to the general population, folks living below the poverty line, and people with HIV. [0:12:33]

So one of the things that we're really going to talk about, and I wanted to put this right up front so that as you go through the rest of this presentation you can kind of have in the back of your mind who of the people that you're working with may be at risk for hepatitis C, and who, in that panel of patients that you have or clients that you work with you might want to ask them if they have been tested for hepatitis C, and if not, refer them for treatment.

So I'm going to just run through pretty quickly the CDC recommendations for hepatitis C screening. So probably the most - the biggest swath of people who you might want to consider testing or who you do want to consider testing or screening for hepatitis C are adults born between 1945 and 1965, so this is the birth cohort screening recommendation that you may have heard about in the news. I'll talk a little bit more about it later on in my presentation. But anyone who you're seeing who was born between 1945 and '65, regardless of any other risk factors, should be referred for hepatitis C screening. Certainly anyone who currently injects drugs or anyone who has an injection drug history, even if they've only had - or they tell you that they've only injected drugs once or twice and it was a long time ago, they should still be referred for testing or screening for hepatitis C. [0:13:47]

People who have certain medical conditions who are listed there and certain anyone with HIV should be screened for hepatitis C. About a third of patients with or patients living with HIV also are co-infected with hepatitis C. [0:14:01]

So continuing on with the CDC recommendation, anyone who is a recipient of a transplant or transfusion or organ transplant, including patients who were notified that they received blood from a donor who was later tested positive for hepatitis C, or anyone who received a blood transfusion, blood components, or organ transplant before 1992.

The other piece, and this is important for all of us who work in health care settings as well, are that we should, if we have a recognized exposure, also be tested for hepatitis C. And again, it's a blood-borne pathogen, so if there are any blood exposures that you come across or some of your patients or clients come across in the course of their work or their - potentially they have exposures in their environment in other ways, they should also be tested for hepatitis C, and any children born to women with hepatitis C.

So I will go onto the next slide, which is a polling question, and I think, Colleen, turn it back over to you to ask the question? [0:15:00]

MODERATOR: Thanks. Thanks, Dr. Chartier. Our first poll question is: Does your organization identify and ensure screening of patients who are at risk for hepatitis C or HPV infection? Your choices are: Yes, no, and not sure. I'll give folks a few moments to answer.

Great. It looks like about one-third of today's participants do the screening, about 30% are not doing the screening, and 22% are not sure. Thanks, Dr. Chartier. You can continue.

MAGGIE CHARTIER, MD: Okay, thank you, Colleen. So we're going to go on and talk. I'm just going to go on and talk a little bit about the epidemiology of hepatitis C to give you a sense of the scale of this disease, which is really quite significant. [0:16:14]

So every year globally, three or four million people are infected with hepatitis C, and between 130 to 150 million people are chronically infected, and, as was mentioned previously, are at risk of developing liver disease, cirrhosis, end-stage liver disease, and hepatitis C in particular is the largest reason for the need for transplant. And of course, that's a challenging - it's challenging for a lot of our behavioral health and mental health and substance abuse patients to actually be considered sometimes for transplant. So it's helpful as a treatment for some people, but it's actually just not available for a variety of reasons for a lot of our patients.

Between 350 to 500,000 people die every year from a hep C-related liver disease and antiviral therapy, particularly these new therapies that are on the horizon. We can successfully treat most hepatitis C and certainly reduce the risk of advanced liver disease. In the U.S., about - over 3.2 million patients are chronically infected with hepatitis C, and about two-thirds of those patients will go on to develop chronic hepatitis C infection. [0:17:24]

And I'm not going to talk too much about the V.A. here because this isn't a V.A. audience, but I will mention just a couple of things about veterans, because a lot of veterans actually do not receive their care in V.A., and you're going to be seeing them in some of your community health settings and behavioral health settings. But the prevalence of hepatitis C - so this slide is basically showing the prevalence of hepatitis C in the V.A. compared to the general population. You can see from this slide it's about 1.6%, in the blue bar there is the general U.S. population, and if you look at the purple bar, about 5.4% of veterans have hepatitis C, so it's much higher in a veteran population than it is in a general population. [0:18:01]

And I said I was going to talk a little bit more about the birth cohort. This is a paper that was published in JAMA last year looking at veterans with hepatitis C. And what this paper shows is that for veterans who are born between 1945 and 1965 there's a much higher prevalence of hepatitis C within that birth cohort than there is in the general veteran population, and this maps onto community populations as well; hence, the CDC recommendation for birth cohort screening. And what we see here is that this maps onto the baby-boomer cohort, it also maps onto the Vietnam era cohort, and there are a few reasons for why that population was at risk, at particular risk. But one of the things I just want to really emphasize here is really any patient that you have who's born between 1945 and 1965 should be tested for hepatitis C, and there are a lot of federal initiatives to try to increase testing among this birth cohort. [0:18:58]

So just a little bit of information about the natural history of hepatitis C, and this is why, you know, I think it is a little bit of a tricky disease. It's not as straightforward as, you know, a disease, let's say, like HIV; either you have it or you don't have it, and then the course is a little bit more clear, let's say. But for hepatitis C, a certain percentage of patients, probably about a quarter of the patients who have hepatitis C, will clear the infection. Their bodies will clear the infection on their own. And, you know, we don't really have a good way of telling who's going to clear the infection and who is not going to clear the infection. So about 75% of those patients

will go on to develop chronic hepatitis C. A certain percentage of those patients, about 90%, won't have a huge amount of damage over time done to their liver in the absence of other risk factors, risk factors for disease progression, which I'll talk about in a minute. And then a certain percentage of those patients will go on to develop cirrhosis and hepatocellular carcinoma, end-stage liver disease, and have a more profound problem with their liver due to their hepatitis C. [0:20:00]

So if we go to the next slide here, we can look at some of the factors that actually can impact the progression of hepatitis C in patients, and some of them we can't do anything about. So, you know, there are these non-modifiable risk factors such as, you know, age, how long we've had the infection, their race and ethnicity, their gender, and things like that. But there are a lot of factors in this green box here, these potentially modifiable factors, that we as mental health providers and as behavioral health providers can actually really help our patients and our clients work on so that we can actually - so to promote their liver health and slow down the progression of hepatitis C.

So at the top of the list is alcohol consumption, and I'm going to talk about alcohol a little bit more through this, throughout this presentation. A high percentage of patients with hepatitis C drink, which has a profound impact on the liver and on the progression of cirrhosis. So if you have any patients that you're working with who are drinking, certainly, you know, we would of course address that, but that's certainly something that we need to address with our patients. [0:21:05]

If patients are co-infected with hepatitis B or HIV infection, those are other things. If we can get patients connected to care and treatment for those infections, that can help with hep-C - with disease progression. If patients are overweight, insulin resistance, or have too much iron in their system, we can kind of help with some of our behavioral health interventions to, you know, promote weight loss and things like that. People who are smoking tobacco or cannabis or on immunosuppressant therapy post-transplant, those are also folks who are at greater risk for progression to cirrhosis.

So this next slide here I'm really going to focus on alcohol use, because I think this is one of - you kind of get the most bang for your buck in getting people to stop drinking or to cut down on their drinking. So if you look at this slide, which is a slide that looks at lifetime daily alcohol intake in grams per day for people with hepatitis C and people without hepatitis C... So if you look at this first section in the hepatitis C negative group you can see that drinking and - like the orange and red bars are drinking a fairly substantial amount of alcohol per day, and you can see that that definitely impacts the liver and their risk of cirrhosis. Then if you look at the hepatitis C patient population, you can see that that dramatically impacts the cirrhosis risk for the liver. So people are really putting themselves at very high risk for cirrhosis if they're drinking, and certainly if they're drinking at higher levels. Some of the moderate levels, you know, if we can get people to cut down on their drinking, that can certainly be helpful in terms of slowing down disease progression. [0:22:41]

So as was mentioned in the opening remarks - oops, hang on. This is just a slide about V.A. and just to say that some of the data that I'm going to be presenting now is from the V.A., and the

V.A. is actually the largest healthcare provider for HIV and hepatitis C patients in the country. We provide care for over 174,000 veterans with hepatitis C. And we have pretty good data, so we can actually think about and look at our hepatitis C patients. [0:23:07]

And I've selected a couple of data points that I think would be of particular interest to this group, and this is a slide that really emphasizes... So if you look at the blue bar here, this is that 1.6% of the U.S. population that has hepatitis C, and then this 5.4% of veterans who have hepatitis C. And this is, again, the veteran population, but I think it also maps onto some of the issues that are in some of the populations that you all work with in your community health providers. In particular, I want to emphasize this red bar here, homeless veterans. So 44% of veterans who are homeless, at least in this study, have hepatitis C. That's almost half of the people who we work with who are homeless who have hepatitis C. So in particular, if you think about the folks who are really going to be key for you to be approaching about hepatitis C treatment and working with to try to get them in to - or to get them screened for hepatitis C and get them treated, if you look at folks who are born in the birth cohort between 1945 and 1965 and people who are homeless and who have alcohol use and mental health disorders, like those are going to be very high prevalent populations. [0:24:18]

So this is a slide that shows - and again, this is a veteran population - that shows the prevalence of mental health and substance use disorders among veterans for it, and it shows HIV and hepatitis C, but I'll focus just on hepatitis C which are the red bars here. So almost 60% of veterans with hepatitis C have had a diagnosis of depression, almost 30% have had a diagnosis of PTSD, over 70% have had a diagnosis of substance use disorders, and about 55% have had a diagnosis of alcohol use disorders. So you can see the prevalence of psychiatric and substance use disorders in these populations are very, very high.

And the next slide is actually looking at mental health and substance use disorders in hep-C populations compared to the general population, and you can see across the board that the prevalence of mental health and substance use disorders are much higher among people with hepatitis C than people without hepatitis C in the general population. [0:25:15]

So why is this important? And I'm not going to spend a whole lot of time talking about interferon, because in the next, you know, year or two I think it's not going to be so much of the picture of treatment. But part of what has happened over the course of time, let's just say, in terms of treating hepatitis C is that interferon is really intolerable for a lot of patients with mental health and substance use disorders. If you can imagine having the flu for about a year, that's what a lot of people describe it like, and that's the folks who don't have a lot of side effects that are neuropsychiatric in nature, but just some of the physical side effects.

In addition, a lot of people would develop depression, would develop sort of irritability or become much more irritable, a lot of anxiety, and other issues. Some people experienced considerable pain, fatigue, and other things on this treatment, and it was something that they had to take every day for six months to a year, again depending on their genotype and other comorbidities. [0:26:13]

So a lot of folks - and these are studies that are V.A. studies. The next slide I have are non-V.A. studies. But what these studies show is that the main reason that people were deferred for treatment was really for ongoing substance use and psychiatric disorders, and in part these treatment rates are low because the treatments weren't quite as effective. And I think a lot of providers were waiting for these new and better medications that wouldn't be so toxic and so difficult for people to take.

And the next slide shows - this is decisions not to treat in their community sample. And you can see that alcohol and substance use or alcohol and depression are really at the top of the list, and in the middle there is medical comorbidities, so there are some medical comorbidities that would make it challenging to treat folks as well. [0:27:00]

But really what we're looking at here is that alcohol - patients with mental health and substance abuse disorders have had a more difficult time getting access to mental health treatment. And what I see now that's happening over the - or that will be happening over the next few years is that as these treatments become much more tolerable and more accessible and hopefully the costs come down a bit, we're going to be able to treat a lot of patients who previously have not been good candidates for treatment for a variety of different reasons.

So treating hepatitis C patients who have mental health and substance use disorders; so, you know, patients with these comorbidities who are - you know, sort of what I had just said - who are homeless or marginally housed or have other instability factors, you know, typically in the past, if they've had, you know, interactions with the law or a lot of anger issues that would be potentially another interest or another challenge for them to get access to treatment. [0:28:00]

You know, but what they've found, and I'm going to present some data in the next couple of slides from a review paper that was published a couple of years ago, that people with mental health and substance use disorders, and even some of these other instability factors like homelessness and other things, really have been able to sustain or to achieve and sustain virologic response, or an SVR, and that's essentially a cure for hepatitis C. And what they found is that those rates are actually similar to the rates among patients without mental health and substance use comorbidities when those patients are engaged in behavioral health and their mental health and substance use disorders or issues are actually being addressed.

So, you know, as was mentioned in the opening remarks, it really is I think a call to action for integrated care for both from the hepatitis C treatment side and also from the mental health and behavioral health side of the health care system. Really, if we bring these together, we can provide the most stabilizing care for this patient population that has a very high psychiatric need. [0:29:00]

So to go now to talk a little bit about some of the evidence-based reasons for treating hepatitis C patients who, you know, traditionally have not been considered particularly good candidates for treatment. So this review paper was published in 2012, so this is before some of the new medications that were actually approved by the FDA, and now we actually have interferon-sparing regimens that are currently being used for a lot of patients who are on hepatitis C treatment.

So I want to just emphasize that these are evidence-based reasons for treating hepatitis C patients with interferon, which was this very long, toxic, difficult-to-take medication that had a lot of neuropsychiatric side effects. So with interferon onboard, these results are what this review paper has reported on; that in general, there's a much higher prevalence for mental health and substance use disorders in hepatitis C than in the general population, so I had sort of mentioned that previously. And then a large proportion of patients with hepatitis C are deferred for antiviral therapy because of those issues. So those are - that's sort of what we're starting with right now when we think about treating hepatitis C patients. [0:30:08]

But despite those challenges, this group can be safely treated and effectively treated in the context of multidisciplinary teams and behavioral health support, and that can look like a lot of different things, and I know we're going to talk a little bit more about that. The second speaker is going to talk a little bit more about that in the second half of the presentation, and that the mental health and substance use patients can achieve the similar SVR rates to patients without these comorbidities. And there was actually one paper that was done in V.A. which was very interesting; I didn't put it in here. But one of the things that they found is that the mental health and substance use patients in their treatment study actually did better than the patients that did not have mental health and substance use disorders, and they weren't quite sure what accounted for that. But one theory was, you know, that they were actually getting more care and support as they were going through the treatment process. And again, this is a fairly onerous treatment process, which isn't necessarily going to be the case moving forward with hep-C treatment, but, you know, providing this kind of support can really help sustain people as they go through their treatment process. [0:31:07]

So one out of every 30 baby-boomers is infected with hepatitis C, and over the next 20 to 30 years there really is this major liver disease epidemic that's on the horizon if we don't treat hepatitis C. So in that natural history slide, that pyramid that I presented earlier, you know, one of the - there are a lot of people who have hepatitis C who have had it for a long time. And if you think about these baby-boomers, a lot of them were infected with hepatitis C 30, 40 years ago. And so they've had this, the virus in their system for a long time, and it over time has started to take a toll, particularly if you have some of these other challenges to the liver onboard with that.

So if we don't do anything and the treatment rates continue the way they are, which we're very hopeful that they will not, we really are looking at an epidemic of liver disease on the horizon for these patients.

So if the majority of patients with hepatitis C cannot access these new antiviral medications, the effectiveness of these new therapies will be pretty minimal. So we won't actually see the impact that we could see if we don't start to treat the patients who would need to be treated who have these mental health and substance use comorbidities. [0:32:18]

Some patients who were previously poor hep-C treatment candidates will - and this again, we don't necessarily know this. You know, we're sort of in the middle of these new medications. We're starting to use these new medications and more medications coming onboard. But, you know, one of the things that, you know, our hope is, and certainly my hope is in presenting this

to you all, is that those patients who were considered poor treatment candidates - so these are, you know, our patients, our mental health and substance use patients - will likely face the same challenges in terms of becoming suitable treatment candidates. And in part, I think this comes up because the medications are very expensive. There are issues of adherence that have come up. [0:32:57]

So I still think there's a strong role for mental health in both helping to get patients kind of ready for treatment, and also helping to advocate for our patients to get treatment despite some of these - you know, concerning comorbidities for providers. And it also makes them - you know, challenging patients for liver transplant as well.

So the prevention of this disease is actually incredibly important and, you know, as the numbers - you know, if you kind of look at some of those numbers from that previous slide, they talked about the prevalence, and also just the prevalence in the V.A., for example. We have hundreds of thousands of patients, millions of patients in the United States with hepatitis C, and not all of them that need to be treated right away, of course. But we do have a lot of patients who need to be treated and need to be screened for hepatitis C so that they can be referred for treatment. [0:33:50]

So one other issue that I think is important about this is stigma, and I'm not going to spend a lot of time talking about this, but individuals can experience significant stigma related to hepatitis C. And certainly if you're talking about a patient who is co-infected with HIV and potentially has a history of IV drug use there's a lot - or in other serious mental illness - there's a lot of stigma that can go on with our patients, and all of you are probably very familiar with that working in behavioral health and in substance use. [0:34:19]

And so part of what - you know, screening, when we talk to our patients about risk factors and refer them for screening and get them effectively treated for hepatitis C, you know, there's a potential to help mitigate some of those stigmatizing factors.

So this was also mentioned in the opening comments, the rapidly changing face of hep-C treatment. Interferon-free regimens are on the horizon. Hopefully within the next year or two those will be approved by the FDA and will be available in health care settings, and this is going to dramatically - I mean it already has - dramatically changed hep-C treatment for a lot of patients. But, you know, there's a huge reduction in pill burden, in side effects, and in the duration of treatment, which just makes it a much easier treatment to take and a much more efficacious treatment for a lot of patients. [0:35:08]

And so, you know, in terms of our role as mental health providers, you know, certainly if we're already in integrated care settings or care settings where, you know, we've been involved in hepatitis C treatment, oftentimes mental health providers are pulled in to do pre-treatment evaluations to, you know, really assess is this person someone who can go on interferon? That's kind of been traditionally a role that mental health has played in hep-C treatment.

And now, while that's still important to have an access point for mental health, it really starts to look a little bit more general, like we can actually start to treat people who have mental health

and substance use disorders while they're going through treatment for hepatitis C. And we don't necessarily have to kind of hold back necessarily on what we would want to do with people in order to treat their mental health and substance use issues.

There is a focus on adherence with these new medications, in part, because the medications are so expensive. And, you know, just in general, in terms of some of our patients who have some challenges with, you know, adhering to other treatment regimens, that's one role that mental health and behavioral health providers can certainly play as we care for patients who are going through hepatitis C treatment. [0:36:24]

All right, so in summary, you know, I really want to emphasize that screening of people for hepatitis C is critical. And, you know, if your facility actually doesn't have a screening policy, the CDC's screening guidelines I think are pretty clear, and you can kind of have a sense of who the patients are and who you're working with. You may fall into some of those risk categories, and it's really simple just to ask people if they've been tested for hepatitis C in the past, and if not, if they'd be interested in a hepatitis C referral. And I know Rebecca, in our next presentation, is going to talk a little bit more about that process.

So the majority of people in the United States with hepatitis C have not yet been treated. So, you know, another question for the folks that you work with, you know, if they have been diagnosed with hepatitis C, is have they gone through treatment. And a lot of people who have gone through treatment unfortunately have either relapsed, the virus has actually come back, or they've been re-infected with hepatitis C. So even if someone has previously received treatment, they may still have hepatitis C for a variety of different reasons. [0:37:24]

So one of the major reasons that are for the ineligibility for hep-C treatment has been mental health and substance use disorders in the past, which is, you know, for the most part, the patients that we work with. And these new and more efficacious treatments are available and more in the pipeline, making it more critical than ever that we screen and prepare people for treatment.

There are a lot of evidence-based reasons for providing hep-C treatment to patients with mental health and substance use disorders, and I think the real, you know, take-home point there is that there isn't anything unique about mental health and substance use. Patients that prevent them from achieving SVR, you know, compared to a non-psychiatric population, the things that are important to look at are, you know, active and ongoing substance use; that people can actually adhere to their medications and can show up for medical appointments. Like those then become some of the issues. But just having a mental health and substance use disorder diagnosis or other challenges, if you can think creatively about how to help people be adherent to those medications and to their medical appointments, then we can treat them for hepatitis C for the most part, barring any other, you know, comorbidities or other things. [0:38:31]

So consequences of excluding the population from treatment is that there is a higher incidence of liver disease, and our patients are already challenged on a lot of levels. And this is important for us I think as a society and as, you know, people working in health care systems to kind of think about in terms of treatment. And again, not all those three million people who have hepatitis C in the United States will need treatment right away; it's a very slow progressing disease. So for

some of those patients who may not be ready for treatment and who, you know, may - or medically their medical providers have indicated that there - you know, there isn't significant liver damage and they don't necessarily need to be treated right now, we can work with them to work on these modifiable risk factors that will help slow down the progression of their hepatitis C; in particular, alcohol use, obesity, and treating other viral infections like hepatitis B and HIV. [0:39:22]

So behavioral health treatment providers, I think, will play a much more active role in screening, coordination/collaboration/integration of care for HIV or hep-C infected individuals with psychiatric disorders. And I really am a strong advocate for that, because I think we play an incredibly important role in the holistic health care of these patients.

And I will stop there, and we'll go to a second poll question and then onto the second part of our presentation. Thank you so much for your time.

MODERATOR: Thank you, Dr. Chartier. Our second poll question is: Does your organization have policies and procedures that implement education and prevention for viral hepatitis infection for all mental health substance use disorder treatment patients? And again, the options are yes, no, and not sure. [0:40:21]

So about half of our respondents, almost half, do have these policies and procedures for implementing education and prevention, about 26%, one-quarter, say that they do not have these policies and procedures, and 30% of the attendees are not sure if they have these policies and procedures or not.

We do have some questions in our chat box for you, Dr. Chartier. The first one is: Are there approved questions that you should add to patient history forms to help identify who might be at risk?

MAGGIE CHARTIER, MD: That's a great question. In terms of approved questions, I'll have to defer to, you know, folks at SAMHSA or your organizations for, you know, what that looks like in terms of approved questions. But I certainly think if you take a look at the CDC recommendations you could derive some questions from that and that might be important. I know here we have our electronic health record and we have, you know, sort of clinical reminders and other mechanisms that prompt us when someone has one of these risk factors. And the V.A. risk factors are a little bit more extensive than the CDC recommendations, but I think you could - from a behavioral health perspective, without doing labs or anything like that, I think you could really take those recommendations and, you know, just ask people some of those questions. Certainly, looking at their age would be one thing, and some of their other risk factors, injection drug use. [0:41:54]

So some of those questions I think would probably already be on some of your standard intake forms and you could derive, you know, if someone is at risk from some of those factors. But adding a question, have you ever been diagnosed with hepatitis C, have you ever been tested for hepatitis C, I think those would be great questions to add, but again, deferring to your local policies and procedures for that. [0:42:16]

ELINORE McCANCE-KATZ, MD: Yeah, this is Dr. McCance-Katz, and I'll just say that SAMHSA does not have questions that we have approved, if you will, to look directly at this issue. However, I agree with what Dr. Chartier was saying. And also, given the U.S. Preventive Services Task Force recommendation of one test for individuals in the 1945 to 1965 birth cohort, all of them should get a test if you have a patient who has a history of transfusions prior to the mid-eighties, before they were able to test for hepatitis C, so prior transfusion, injection drug use, history of other substance use disorders, history as was said of being previously diagnosed. Any of these kinds of questions would be indicators of a need to go ahead and test a person. [0:43:23]

And for people who are within the '45 to '65 birth cohort and have, in your view, risk factors for hepatitis C, we'd want to do regular screening thereafter, and the same thing for people, of course, that are outside of that birth cohort but who may be at risk for hepatitis C infection.

MODERATOR: Okay. Thanks very much, Dr. McCance-Katz, for that information. And what I'd like to... There are some questions here about billing codes and financing the treatment for hepatitis C. The companion webinar to this one on treatment protocols, the new medications, and the associated cost, there's a pretty thorough breakdown of comparing the cost for treatment, HPV therapy with PEG interferon and ribavirin over time, and then with using the new medications. [0:44:24]

There are a couple of things to understand, too, about the change in environment for this. The first one is that the United States Prevention Services Task Force has made the recommendation for HIV screening; they've made it a Grade D. So this means that in Medicaid expansion states the screening covers - first of all, it will cover more patients in Medicaid expansion states, so it will cover more screenings. The Medicaid expansion states are required to cover all of the A and B grade services without cost sharing that are set by the United States Prevention Services Task Force, and screening for at-risk and baby-boomers is covered in Medicaid expansion plans. The non-expansion states, medically necessary screening for high-risk groups, is usually covered, and folks can elect to cover as a routine screening; this varies by state. Then they also elect to receive a 1% increase in federal match to cover costs. [0:45:39]

Okay, so what I'd like to recommend is that we have links to the recording for this webinar, and also to the recording for the new medications, treatment protocols, and costs associated with treatment. I would suggest that if you would like more information about the payment systems for this and how the country intends to manage this within a limited health budget, then I think that probably the best place to start would be with one of those - would be with that particular recording. [0:46:20]

So another question has come up: When you're working with folks who are seriously mentally ill, if the symptoms for chronic hepatitis infection are mild, does it really make sense to screen and then treat a patient who's already, you know, struggling with at least a serious mental illness? If not serious mental illness, then other chronic health disorders?

MAGGIE CHARTIER, MD: I think that's a really great question and it's a complicated question, and I think this is where the collaboration between mental health or behavioral health

and medicine is really going to be important. So I think we - until that person is screened, you know, we don't know that they have hepatitis C. So if we do know that they have hepatitis C and that we do know that they have mild disease, you know, it could be that the medical provider, in collaboration with the mental health provider, would say, you know, let's wait until they stabilize. [0:47:15]

Having said that, you know, I think sometimes getting those folks in the doors to be screened and to have adequate medical follow-up is sometimes a challenge, so working with them to kind of get them in the door I think is important. As behavioral health providers, we don't get to decide who gets on hep-C treatment; that's really for the medical providers to decide. But I think our recommendations and the care that we're able to provide is important. There are a few studies of treating hepatitis C and with folks who have serious mental illness. And again, this is on interferon, right, where interferon is, you know, something that would be, you know, potentially a tricky medication to put someone with serious mental illness on because of the neuropsychiatric side effects. And what they found is that treatment rates were - you know, again, they were able to achieve SVR, and the treatment rates were similar as long as folks, you know, had their - you know, had their schizophrenia or bipolar or whatever the disease was under control, you know, and treated and were engaged in treatment. [0:48:18]

Having said that, these new treatments are actually going to be much more tolerable and don't have the neuropsychiatric side effects, so you wouldn't anticipate that someone with a serious mental illness would necessarily have an adverse reaction to just being on that treatment, as long as they were able to adhere to that treatment. And I know adherence to psychiatric medications in the seriously mentally ill is also a challenge and a target of treatment for a lot of the work that we do in those populations.

And so, you know, I think if someone is able to be adherent to other medications and has shown that, there shouldn't be any reason why, if they need treatment for their hepatitis C, that they should be able to - they should be deferred for treatment at this point. But again, I think the key part of that question would be their stage of liver disease. They may not necessarily need treatment for another few years in the absence of other risk factors. But again, that's not necessarily our decision as mental health providers or behavioral health providers to make. [0:49:14]

MODERATOR: Thank you very much, Dr. Chartier; I appreciate your comments on that. Our schedule demands that we move forward now, so hopefully we'll have time for some of these chat box questions that are coming in at the end and we'll be able to get into some discussion. Right now, I'd like to introduce Rebecca Goldberg. Rebecca has been the nursing coordinator for the hepatitis clinic at the Ruth M. Rothstein CORE Center in Chicago, Illinois for the past 11 years. She brings 21 years of experience to this role, working with those living with HIV/AIDS, and is certified in HIV/AIDS nursing. Rebecca?

REBECCA GOLDBERG: Good afternoon, everyone. It's a pleasure to be here and share some of the experiences that we've had, some of what we've learned taking care of patients, and treating them with medications for hepatitis C. We're part of a larger Cook County Health and Hospitals System. Our clinic specifically addresses infectious diseases, primarily HIV. So about

27% of our patients are co-infected with HIV and hepatitis C, and, you know, when they're co-infected, their chances for progression to cirrhosis and end-stage liver disease are much more of a concern, as Dr. Chartier described earlier. Also, they tend to progress more quickly, so advocating and getting patients on the medications, if they're appropriate candidates, is really, really so important. [0:50:46]

Okay, so we'll entertain questions at the end. Let me just proceed. Okay, so of course, establishing the need for treatment - whoops, there we go. Let's start with the first slide: The initial screening and on getting patients appointments to the clinic. So typically they either have a referral if they're fortunate enough to have their own primary care provider; of course, that's much easier. The primary care provider is already managing everything else. [0:51:16]

What we often see though are patients walking in. I entertain probably five, six patients a week that walk in the door because they've heard that we're giving out treatment for hepatitis C. These are the patients that I'm most concerned about; of course, they're much more involved. These are patients that have used the emergency room as access for their primary care all of this time, so they're not - their comorbidities or other health issues, are not well managed.

Sometimes, you know, they've said that they've heard that they were diagnosed with hepatitis C years ago and they're coming in finally because they're ready for follow-up. Again, as Maggie said earlier, up to 25% of the patients that initially are infected with hepatitis C spontaneously clear, so we need to do further evaluation and make sure that they are still carrying the virus. So assuming that they have a primary care provider, that they would bring in that documentation. Basically really we're looking for a hepatitis C viral RNA that shows presence of the virus. [0:52:29]

But as I said, you know, the biggest problem for us here, and as I suspect for many of our audience members, is that people are having difficulty with access to primary care. Fortunately, with the Affordable Care Act, that is, you know, really getting much better. Typically what I look for, as I'm sure our listeners are doing, is looking for the shortest path to get patients engaged in care. So, you know, what I do is refer them to a walk-in clinic that's part of our county system. The first day that they - when they walk into this clinic, I tell them to come in before 7 a.m., because the doors open at 7 a.m., and after 200 patients are checked in they close it for the day. [0:53:13]

So, you know, trying to get them ready and engaged, you know, with what we're all about, I tell them to bring their lunch and to be patient, but that they will walk out with an appointment with a primary care provider that they will have a link to in the future. Instead of going to the emergency room, they can connect with this, you know, patient-centered medical home for their care.

So, you know, for a lot of our patients here at Cook County and Chicago, this is a new way of being. It requires a lot of teaching and reinforcement on the part of me as a nurse, as well as any of the other members of the health care team.

So for the last bullet point, of course, you know, when we get them into the clinic, at their first visit we are going to have a pre-clinic meeting where we go over the patients that are going to be in the clinic that day and talk about what their specific needs are, how much we know about them, and what they need.

And really, so this next slide gives a little more detail on what we're looking for. We're very fortunate to be the only medical facility right now in Illinois that has a FibroScan. This is a new device that's just been released for use within the last year. And the device - the procedure stages the degree of damage to the liver. Maybe you've heard in the past about liver biopsies for staging liver disease; you know, the preparation was very involved. It requires lab work be done, you know, within a week before. The patient had to abstain from certain medications for ten days prior. They had to have someone accompany them to take them home afterwards. So many times it was problematic just getting the biopsy done, and it is invasive as well and it carries the risk of injury. [0:55:15]

So now we have the FibroScan, which is a real game-changer. It's a quick procedure. It's not an ultrasound, but it reminds me of one. It's painless. It measures a shear wave and stiffness of the liver, and that translates to the degree of damage that the person has, if any.

So of course, this is really important to be able to stage the level of damage. You know, as Maggie said earlier, these new treatments that are out are very expensive, and everyone does not need to be treated at this time. For some of our patients, if they're a stage one or a two or even a three, we can afford to wait, even by the end of the year. More medications will be coming out that are just as highly effective as what we have right now or even more so. As Maggie said, the time frame for how long the patients will need to take them will be even shorter, and hopefully they will be less expensive so more patients can have access. [0:56:18]

So, you know, we're really - we're lucky to have the FibroScan, and ideally, at the first appointment, that's when we're finding out that information. And from that point we can say to the patient if you're a stage one or a two, come back in six months, you know, we'll follow you, you know, but you can wait safely that length of time.

Another benefit of either what - using the biopsy in the past, a liver biopsy and now the FibroScan, is that when you have useful information like this and you have a client who is still actively drinking and using, you can say to them, hey, you have significant damage, you know, and this is what this means, this is how you're progressing. So it can be used also to help patients in terms of making better decisions about their substance use. [0:57:09]

Also during this assessment we're going to establish any other needs. Behavioral health is often pulled in. You know, at the CORE Center where I work, 30 to 40% of our patients have active mental health diagnoses, and so we really need a lot of support from behavioral health. A number of our patients, of course, have other issues. The patients are getting older. We need to pull in cardiology and other specialties also.

The last bullet point Maggie has talked about already, and I really - I think is the common theme throughout my presentation is about adherence and how important that is, how central that is, not only to treatment for hepatitis C, but again, as Maggie pointed out, you know, managing mental health, you know, with psychotropics or managing HIV with HIV therapy that is still effective now. [0:58:11]

Okay, so assessing for adherence is just really, really important. Really what we're looking for here are red flags. So if we go down this list, you know, does this client make it to all appointments? Of course, that will be an indicator of how, you know, ready they are for treatment and how likely they are to adhere. If they're co-infected, it's really telling to see if the HIV is undetectable. How well are they managing their HIV meds, or any other problems that they're having, such as diabetes? You know, how well are they managing that?

A fourth bullet point; really, I've had so much personal experience with this: Is the client consistently reachable by telephone, and will the patient contact us if she or he is having treatment issues? You know, I can't tell you how frightening it's been in the past with patients that have been on PEGylated interferon and fall off the map and we can't reach them. Again, you know, treatments are getting much better, but currently we still are using interferon as part of the treatment plan right now. [0:59:22]

Will patients attend teaching session prior to treatment and periodic lab draws? This is actually a deal-breaker here at the CORE Center. If they won't attend the teaching session, obviously, you know, we're not going to start them on treatment. And as I understand it, you know, there are more and more requirements in order for patients to be approved and continued on therapy with it being so expensive, and one of them is documentation that they've had. They've attended a teaching session prior to starting.

Okay, so I suspect that what we see in the clinic is what you see so often with your patients. They present with other health challenges, psychosocial issues. Maslow's hierarchy I always still think of today in terms of our patients. You know, so many of our patients have basic physiological, safety issues, security needs that are not met, and you know, they come in with that; that's what they bring to the table. So of course, we have that as a big concern, you know, when we come to talking about treatment and adherence issues. [1:00:30]

Also, you know, we've got other issues compounding this dealing with this: Chemical dependency, mental health issues, domestic violence, history of incarceration, homelessness. Frequently it's all of the above there. So again, we've got patients that have additional issues to deal with. But again, I'm echoing what Maggie said earlier, these are not deal-breakers, you know. We treat patients successfully with these issues, we're able to do that, but they need the additional support of the team really, and they need to be watched closely. [1:01:12]

The last bullet point talks about how, historically, people have had poor access to a primary care provider; okay, we know that. We know that patients for generations in our area have used the emergency room to access their health care needs, and that's basically all that they've used.

Okay, so let's go on to the next slide. Obviously behavioral health care, it's so important. When there is an opportunity to intervene with prevention, education, and treatment, so much more is possible. And really what we use here so often - and we know that, historically, peer support is something that was initiated with the substance use support, right? We know that it works well.

So we have three different ways that our peers support our patient; one is just the peer group. They are here at the CORE Center. They're HIV and hepatitis co-infected. They receive some additional training, and really what they do is guide the patient, notify them of appointments. They stay with them during the first appointment and follow them through all the evaluations of the assessment process that needs to be done at the first visit. On a regular basis, they provide additional support whenever those have been identified. [1:02:42]

Patient navigators are really the link from the hospital with our outpatient clinic. Again, that was another area where, you know, it was discovered in the past that if we didn't have a strong connection there we would lose patients before they would get to us in our clinic, and the patient navigators prevent that from happening. [1:03:00]

We also have patient educators that are present in every clinic. They provide all kinds of education. They talk a lot about adherence, and they talk about patients picking up other sexually transmittable infections and how to have safer sex. They talk about diabetes. There's a whole range of issues that they talk about, and of course they support mental health and substance abuse treatment as well.

Okay, so how do we work together? That's the question, okay? So first screening, of course, is to encourage screening is necessary for the appropriate referral to find out who needs that kind of support. Communication is also very important, and this is something that we really - you know, it can be difficult at times, especially when we're talking about outside agencies, but it really is essential to the success. [1:04:01]

So establishing lines of communication; you know, the release of information so we can get information transmitted between facilities. We have a communication template letter that we use here, and it's just a very generic letter that says your patient is being considered for treatment, you know, in the past it was, you know, with interferon and ribavirin, and asking them to, you know, identify further if they feel they're an appropriate candidates. There are other letters that we use also to communicate back and forth to keep it open.

The third bullet point here, colocated services are ideal. Psychiatric mental health primary care, including hepatitis. We're very lucky at the CORE Center, where we have all of these services within one building. And on our first floor we have a screening walk-in clinic where often patients are diagnosed with hepatitis C as well as other STIs. [1:05:00]

So it is also, you know, as I said earlier, critical that we communicate with the outside - the offsite providers. And as I said, we have a letter so that we get clearance from outside psychiatrists that are not within our facility to make sure that everyone knows what's going on.

Okay, so common challenges; again, there are so many. Our substance staff conducts screening for addiction when the patient comes in to be seen, you know, at the first visit. So we're screening them right away. We know that insurance companies currently are saying that patients need to be abstinent from drugs and alcohol for six months prior to starting treatment. The latest requirements for funding are that patients are even doing drug drops, and alcohol, to ensure that they are free before we can start them on treatment, and this is a newer development. Okay, so of course, you know, if the patient's mental health symptoms are stable, they're going to do better with treatment naturally, so this is paramount. [1:06:15]

Okay, so other issues that can get in the way of these challenges; of course, if they have other chronic illnesses, we already mentioned how important it is that mental illness be stabilized as well. There are other screenings that are required prior to starting treatment. If the patient is 50 or greater, we need to do a cardiac workup. A stress test is done. Now, this is using the current treatment regimens that we have right now, you know, including PEGylated interferon and ribavirin, because of the cardiac risks related to those drugs. We also do an ophthalmology screening, thyroid test. And, you know, because of the interferon, again, psychiatric clearance is mandatory. [1:07:03]

All right, so other challenges; naturally, if a patient has only episodic care, they're not going to do as well, so they need to be engaged in care. I have consistent primary care that's a requirement before they can be treated. You know, we're lucky we work closely with case management to try as best we can to thwart the other problems that get in the way. Transportation; I can tell you we used to have more funding with bus cards for transportation than we do now, but we still, you know, offer that. Housing; you know, patients often have to get on lists for stable housing, but even intermittent housing is going to benefit the patient.

So now we're talking about the patient-centered medical home clinics that patients need to be able to access; that, again, would be a huge stabilizing source for our patients. Historically at our facility, case management for mono-infected patients, patients that only are infected with hepatitis C, has been difficult at best because their funding is really for patients that have HIV.

Because of the Affordable Care Act though, we are in a better position now to support with the case management support, so now more of those issues will be addressed. [1:08:34]

Okay, so other challenges; of course, the patients don't show up for appointments we're going to have - If they don't show up and engage in care, how can we take care of them? We have staff on a regular basis that do outreach calls, give reminder calls to patients prior to appointments. If they've missed them, we call them, we reschedule, and this has been a huge benefit and it definitely has increased greatly the show-up rate in our clinic. We also have an outreach at the CORE Center where when patients are not engaged in care for more than a year we have staff that go out and try to reengage them either in care with us or with some other facility. [1:09:18]

Okay, so, you know, we talked about the importance here of housing being stable, transportation. It's important to communicate to the patients about what is expected. Let them know, you know, when they come in, that they are expected to come in for their appointments. And then if they want to get into treatment, we're looking at what their return rate is to the clinic as a strong

indicator on how invested they are in treatment. So also, of course, building more network in the community is so important. Very important to be able to reach out and go back and forth with other facilities and exchange resources. [1:10:09]

All right, so as far as counseling is concerned, really this is everyone's responsibility and this really applies not only to treatment for hepatitis C but as well as for any other HIV or mental health or any other issues; you know, handling medication, taking the doses. You know, again, we get back to adherence is really the thing for me in this talk. If the patient is homeless, I talk to them about putting the medications in their shoes so that they remember to take them in the morning before they put their shoes on. If it's someone who is living in a home and they are able to be open with the people they live with about their HIV or their hepatitis C and they can leave the medications out, I tell them to put them by their toothbrush or some activity that they do on a regular basis to also cue them, you know, to take their medication. Pill boxes are great to use to help with adherence. Alarms and phone apps; you know, we try to use multiple ways to remind people not to miss any doses. [1:11:23]

I think Maggie touched on, you know, with the new medications, with adherence, it really is critical, even though our patients - you know, most of our patients are only taking the medication regimen for a 12-week period now. Studies show that if they miss more than one or two doses, that those are the treatment failures. Really, there is no wiggle room with these new medications for hepatitis C in terms of, you know, if you want the outcome to clear the virus, you have to get every single dose in.

And because these medications are so expensive, I tell my patients make sure that you have a dose on you. If they should get hit by a car or for some reason end up in the emergency room, chances are slim that that hospital is going to have those medications stocked in their pharmacy so they need to keep them on them. But I really impress on them that taking every dose is critical. [1:12:19]

You know, controlled medication delivery also, as I said, is an issue for any patient on any medication, to make sure that they get - before they run out of medications, they're contacting their pharmacy, you know, to see about the next refill and make sure that their benefits are still in place.

You know, with alcohol intake, you know, that is a big deal for patients that are on hepatitis C treatment as well as patients with hepatitis. I had a hepatologist once tell me that alcohol is to hepatitis what kerosene is to a fire. And when I tell my patients that, you know, they tend to, you know, really see that. Of course, we're talking about reduction first, so just getting patients to cut down initially. But once again, in order to be considered for treatment, they need to be abstinent of alcohol and drugs for six months. [1:13:15]

Tylenol is a big problem, you know, with the liver, and a lot of our patients don't know it. The recommendation is not to take more than 4,000 milligrams or four grams in a 24-hour period; otherwise, you can end up with liver failure. Patients are often not aware that their cold medicine also has Tylenol in it, so does their Percocet and some of their other pain medications, so it's an important issue to talk about.

You know, of course, if our patients are aware of the side effects related to any of these medications and they know how to deal with the side effects, they will be empowered. And that is really my main job also, you know, as a nurse here at the CORE Center, to empower patients to make the best decisions possible, and that happens through all of us working together to educate them. [1:14:11]

So, you know, with the labs, you know, it's important while our patients are on treatment that they agree to come in periodically for labs. This is getting a little looser with the newer drugs that we have. Earlier on with ribavirin and interferon, the risk of anemia is so great that we would have our patients come in at first every two weeks and then every four weeks for labs.

And once again, like that patient that I can't reach on the phone, if they don't come in and get their labs, then we don't know what's going on internally. You know, we don't want them to end up in the E.R. because they're so short of breath and they're so anemic, you know, that they are risking cardiac concerns. So really, they have to commit to taking - coming in for their lab visits on a regular basis. [1:15:00]

Okay, so any contact that any of us have, of course, with the patient is an important opportunity where we can talk about adherence, again, to hepatitis C treatment or any of the other treatment modalities that the patient has engaged in.

There's also an opportunity to talk about recovery, you know, in terms of mental illness and substance abuse. We use - we talk to case managers a lot about this, and our focus here really has been in screening for hepatitis C.

Okay, so what gives the best bang for the buck? If someone - if we have patients who are already engaged in primary care and in behavioral health care, we know that those guys are coming in, they're doing what they're supposed to be doing, and they're going to be good candidates. Again also, if they've already engaged in treatments for other comorbidities, for other medical issues, we know also that if they're housed as I said earlier, even if it's temporary shelter, they're going to do better than those that don't have that support. [1:16:12]

In summary, you know, the best outcomes here are when our patients are stable with their mental health and substance use issues. Really, primary care provider relationship is much more possible, you know, this year with the Affordable Care Act, and that is just really basic to everything, so getting our patients cared for. We need to address any of the medical comorbidities and any other social issues that we have the resources for.

Okay, thank you so much. Here's our third poll question.

MODERATOR: Thank you, Rebecca. I'll go ahead and read that.

REBECCA GOLDBERG: Great.

MODERATOR: Does your organization vaccinate for hepatitis A and hepatitis B among those patients found to be at risk? Again, the choices are yes, no, or not sure. [1:17:08]

Okay. About half of the providers on the line don't do these vaccinations, about almost 30% do, and about 20% are not sure, so thanks, folks, for that information.

I'd like to remind everyone that you can submit questions at any time by typing the question into the Ask a Question box in the lower left portion of your player. And here's the first question that I'd like to direct to Rebecca. Rebecca, how does the CORE Center address relapse during the course of treatment, especially relapse on alcohol? [1:18:00]

REBECCA GOLDBERG: During the course of treatment we would stop treatment -

MODERATOR: Stop treatment?

REBECCA GOLDBERG: You know what? If the patient wasn't taking their medication, we would have to, especially with the new medications that we're using now. As I said earlier, they're just so sensitive to making sure that every dose is in. The first inclination that - we would really do a viral load right at first, you know, to ascertain that the patient hasn't missed doses of medication, but at any time when that's happened we have no option but to stop.

MODERATOR: All right, thank you.

The next question is: How would the medication administered for hep-C affect an individual with a substance abuse disorder history who's currently enrolled in a treatment program? So we'll say, just speaking to the new standard of treatment, what kind of an impact does that have on somebody with a substance use disorder history? I know that's - there's a lot of different types of substance use disorder history, so we'll just - we'll say any kind of alcohol, cocaine, heroin; those are the, I think, three most common. [1:19:16]

REBECCA GOLDBERG: Yeah. So you know, as I mentioned earlier, this history does not preclude them from starting treatment at all. But we do need - and the standards really for obtaining - you know, in order to get the funding for the medication is that clients are drug and alcohol-free for six months prior.

MAGGIE CHARTIER, MD: Can I actually jump in there when you're done, Rebecca? This is Maggie.

REBECCA GOLDBERG: Sure, sure. We're experiencing here more concerns. You know, if there are more limitations or extra humps to jump over before we can get patients into treatment. And as I said, now they're actually even asking for drug and alcohol drops. It's getting more and more tight, because the drugs are so expensive, the new treatment is. Maggie, go ahead. [1:20:06]

MODERATOR: Go ahead, Dr. Chartier.

MAGGIE CHARTIER, MD: Okay, thanks. This question actually comes up a lot, and again, I'll just speak for my experience in the V.A., so I can't speak to any of the SAMHSA providers or policies. But there's actually no evidence base for the six-month abstinence rule. You know, some facilities in the V.A., for example, have local policies that have an abstinence requirement for hepatitis C treatment, but it's actually not - in the literature, it's not actually indicated. What we do know is that people who are drinking very heavily have more challenges with adherence. And we do know that people who drink more heavily have more challenges to their liver and more risk for cirrhosis.

But, you know, people who are drinking kind of at moderate levels or light levels or have a beer a couple times a week or even once a day, there's no indication that that would actually negatively impact treatment adherence necessarily. And there is some - you know, there's sort of some compelling evidence to suggest that they actually would benefit from treatment because it would help to address hepatitis C, which, as you were saying, is being exacerbated by their drinking. [1:21:12]

So, you know, I think - again, I'm just speaking for my experience in V.A., and that may not be applicable to some of the environments that you all are working in. But certainly with these new medications, you know, the abstinence rules I think - I think we could all benefit from taking a look at why those are in place and if they are actually evidence-based or necessary anymore. So that would be my response to that question. There was another question about abstinence rules down on the list as well.

REBECCA GOLDBERG: You know, I fully appreciate that, Dr. Chartier. I think you're absolutely right. My concern, you know, again is in terms of securing the funding, you know, and I just...

MAGGIE CHARTIER, MD: Yeah.

REBECCA GOLDBERG: Yeah. We have to be aware...

MAGGIE CHARTIER, MD: But in terms of a clinical decision, I mean I think funding is one thing, and we definitely, you know, are concerned about patients who would have adherence issues, and that is definitely a concern. And I think people who drink at sort of problematic and high levels, you know, there is good evidence that suggests that they - I mean for hepatitis C as well as for other, you know, diseases that need fairly regular and consistent treatment - that they are challenged by adherence. But aside from that, I think a lot of the patients, a lot of patients who are actively drinking, can achieve SVR and can stay adherent to their medications. [1:22:29]

And actually there's some interesting research on injection drug users as well. You know, they're pretty used to drug dosing and withdraw effects and things like that. So if people are kind of engaged in some kind of - I don't know there's actually paper on them. There are actually some case studies on treating folks who have like injection drug use issues or whatever.

But certainly if folks have a history of that, or one of the questions was if there was a relapse for a day or something like that, I mean again, the person who makes the decision about the hep-C

treatment is really going to be the liver provider, not the mental health provider. But to my mind, I think if someone is engaged in care for substance use and they do have a relapse, you know, and they don't, you know, go off the rails and stop taking their medication for a couple weeks, you know, I think in that case, you know, it would be fine to keep treating them. But I also think it's really hard to predict relapse in patients, and I would think these new medications, at least from what we've seen, don't necessarily have the same side effect protocol profile, so they wouldn't necessarily exacerbate these underlying triggers as much as interferon has in the past.

Anyway, those are just my opinions to add to the mix. [1:23:41]

MODERATOR: Thanks. This is an interesting question. We've talked a little bit about how folks who are engaged in opioid replacement therapy may be good candidates for treatment. And the question is: Can patients who are otherwise stable and drug-free receive treatment while on suboxone or Subutex therapy, Buprenorphine?

REBECCA GOLDBERG: Absolutely. Yes, yes, we do it all the time, methadone and suboxone. We currently treat patients that are still taking those medications. They're great stable -

MODERATOR: Thank you.

REBECCA GOLDBERG: Yeah. [1:24:16]

MODERATOR: I'm sorry, what was that?

REBECCA GOLDBERG: They're great stabilizers, you know, and the patients tend to do well.

MODERATOR: Okay, thank you. And then when the patient has a serious mental health illness that's in remission or they're being treated for these - being successfully treated for psychiatric symptoms, how closely do you need to work with the behavioral health provider, especially since some of the medications cause adverse psychiatric reactions?

REBECCA GOLDBERG: Absolutely very closely. As I mentioned earlier, we have forms of communication to facilitate letters, templates to facilitate communication back and forth. We're in constant communication with the mental health provider, you know, making sure that... [1:25:09]

And we also - when the patients come in we'll fill out the CESDs, you know, as a basic indicator to see if there's any changes happening. But yes, communication with the mental health provider is very important during this time, especially if they're on interferon as well.

ELINORE McCANCE-KATZ, MD: Yeah. Hey, this is Dr. McCance. Can I ask a quick question, going back to the question about the buprenorphine treatment of people that are receiving treatment for hepatitis C? Are you speaking about PEGylated interferon, are you talking about direct-acting antivirals, or what exactly are you talking about when you say that there's no interaction?

REBECCA GOLDBERG: Oh, I didn't say that there's no interaction, I said that... Maybe I misunderstood the question. I was saying that we were able to successfully treat patients that were on those medications. [1:26:07]

ELINORE McCANCE-KATZ, MD: So all of them? You're talking about the direct-acting antivirals as well?

REBECCA GOLDBERG: Yes.

ELINORE McCANCE-KATZ, MD: So the reason I ask the question is because the drugs are known to be inhibitors of cytochrome p450 3a4. And I just wondered whether or not you see any patients that have any evidence of, say, increased sedation or any cognition issues? Anything that might indicate that they were experiencing higher opioid levels?

REBECCA GOLDBERG: You know what? I really defer to you, Dr. McCance, because I'm a nurse and I'm thinking clearly now that the patients that I'm referring to were the interferon ribavirin-based with the telaprevir but...

ELINORE McCANCE-KATZ, MD: Okay.

REBECCA GOLDBERG: Yeah, but not on this. The latest is suboxone.

ELINORE McCANCE-KATZ, MD: Oh, okay. I was just very interested to hear what you said. I don't know that the studies have been done which... Because while FDA requires new anti-retrovirals to be tested with at least methadone, it's not the same for viral hepatitis, so I was just wondering about your clinical experience. Thanks. [1:27:22]

MODERATOR: Thank you. I wanted to mention that in the comments earlier about payments for screening, private insurers and Medicare are going to be required to do this. But I want to emphasize that Medicaid reimbursement varies from state to state, and that it's not an expectation that mental health providers would get a lot of questions about the provision and services at the provider location, behavioral health provider location. What we're really talking about for most providers is a very strong collaborative interactive relationship with a primary care provider to support that patient through the course of treatment. [1:28:15]

And one last question, and this is that if a biopsy of the liver is done, is it always checked for signs of viral hepatitis, or is this something that we need to be diagnosed? Could be visually diagnosed?

REBECCA GOLDBERG: Could it be visually? I'm not sure I understand the question. We have done liver biopsies in the past for fatty liver disease for immune hepatitis, you know, not just hepatitis C, and now we're using the FibroScan to diagnose liver damage for the same reason. I am not sure -

MODERATOR: From the FibroScan.

REBECCA GOLDBERG: Yes.

MODERATOR: I think that answers it. That's the visual that would support a diagnosis, correct?

REBECCA GOLDBERG: Yeah, yes. It would tell us how much (crosstalk) there was.

MODERATOR: Okay. All right, great.

REBECCA GOLDBERG: Oh, so you're saying if someone is cirrhotic, does that mean that they have hepatitis because of the FibroScan? Because that wouldn't... [1:29:20]

MODERATOR: Ah, no. Well, I'm actually just reading the question. I think this person is concerned that - they may have had a biopsy done and they're wondering if it was - if they were automatically checked for hepatitis at that time.

REBECCA GOLDBERG: I would expect that they were checked for hepatitis before the biopsy was done, yes.

MODERATOR: Okay. Okay.

REBECCA GOLDBERG: You can still do the biopsy for other reasons though; that's what I'm saying. A hepatitis C diagnosis is not the only reason to do a biopsy. Just seeing any inflammation and trying to figure out how much was there as a result; that would be a reason to do the biopsy. They could also examine the histology of the cells to figure out if it's autoimmune hepatitis; you know, find out other causes for the inflammation. [1:30:12]

MODERATOR: Okay. Well, thank you very much. That's all the time we have for today. Once again, a recording and transcription of this webinar will be available on the Center for Integrated Health Solutions' website. Once you exit the webinar, you'll be asked to complete a short survey. Please be sure to offer your feedback on today's webinar. Your input is important to us and informs the development of future CIHS webinars.

Once again, I would like to extend a thank you to our presenters and to Dr. McCance-Katz for joining us on today's webinar, and thank you all for joining our webinar. Please state tuned for more CIHS webinars in the near future. Have a good afternoon. [1:31:02]

**END TRANSCRIPT**