

Transcript

PHARMACY INTEROPERABILITY AND EMERGING THERAPEUTIC TASK FORCE 2023 MEETING

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VIRTUAL



Speakers

Name	Organization	Role
Hans Buitendijk	Oracle Health	Co-Chair
Shelly Spiro	Pharmacy Health Information Technology Collaborative	Co-Chair
Pooja Babbrah	Point-of-Care Partners	Member
Chris Blackley	Prescriptive	Member
Shila Blend	North Dakota Health Information Network	Member
David Butler	Curatro, LLC	Member
Steven Eichner	Texas Department of State Health Services	Member
Rajesh Godavarthi	MCG Health, part of the Hearst Health network	Member
Adi V. Gundlapalli	Centers for Disease Control and Prevention	Member
Jim Jirjis	HCA Healthcare	Member
Summerpal Kahlon	Rocket Health Care	Member
Steven Lane	Health Gorilla	Member
Meg Marshall	Department of Veterans Health Affairs	Member
Anna McCollister	Individual	Member
Deven McGraw	Invitae Corporation	Member
Ketan Mehta	Micro Merchant Systems	Member
Justin Neal	Noble Health Services	Member
Eliel Oliveira	Dell Medical School, University of Texas at Austin	Member
Naresh Sundar Rajan	CyncHealth	Member
Scott Robertson	Bear Health Tech Consulting	Member
Alexis Snyder	Individual	Member
Fillipe Southerland	Yardi Systems, Inc.	Member
Christian Tadrus	Community Pharmacy Owner	Member
Sheryl Turney	Elevance Health	Member
Afton Wagner	Walgreens	Member
Michael Berry	Office of the National Coordinator for Health Information Technology	Designated Federal Officer
Tricia Lee Rolle	Office of the National Coordinator for Health Information Technology	ONC Program Lead



Name	Organization	Role
Kim Boyd	Boyd Consulting Group, LLC	Presenter
Stephen Mullinex	NCPDP	Presenter
Richard Sage	NCPDP	Presenter
Josh Howland	RedSail Technologies	Presenter

Call to Order/Roll Call (00:00:00)

Michael Berry

Good morning, everyone, and welcome to the Pharmacy Interoperability and Emerging Therapeutics Task Force. I am Mike Berry with ONC, and we are always glad when you can join us. I would also like to welcome our guest presenters, of which there are many today, and thank them for their participation. This Task Force meeting is open to the public, and your comments are welcome in Zoom chat throughout the meeting or during the public comment period that is held around 11:50 Eastern Time this morning. I would like to begin rollcall of our Task Force members, so when I call your name, please let us know if you are here, and I will begin with our cochairs. Hans Buitendijk?

Hans Buitendijk

Good morning.

Michael Berry

Shelly Spiro?

Shelly Spiro

Good morning, everyone.

Michael Berry

Pooja Babbrah?

Pooja Babbrah

Good morning.

Michael Berry

Chris Blackley?

Chris Blackley

Good morning, everybody.

Michael Berry

Shila Blend is not able to join us today. David Butler? Steve Eichner?

Steven Eichner

Good morning from the great state of Texas.



**Michael Berry**

Raj Godavarthi? Adi Gundlapalli?

Adi V. Gundlapalli

Good morning.

Michael Berry

“Gundlapalli.” I always say your name wrong, Adi.

Adi V. Gundlapalli

Thank you.

Michael Berry

I will get it right one of these days, after the two and a half years I have been here. Jim Jirjis? Summer Kahlon and Steven Lane are not able to join us today. Meg Marshall?

Meg Marshall

Good morning.

Michael Berry

Anna McCollister? Deven McGraw is also not able to join us. Ketan Mehta?

Ketan Mehta

Good morning.

Michael Berry

Justin Neal?

Justin Neal

Good morning.

Michael Berry

Eliel Oliveira? Naresh Sundar Rajan?

Naresh Sundar Rajan

Good morning.

Michael Berry

Scott Robertson?

Scott Robertson

Good morning.

Michael Berry



Alexis Snyder?

Alexis Snyder

Good morning.

Michael Berry

Fil Southerland? Christian Tadrus?

Christian Tadrus

Hello to all.

Michael Berry

Sheryl Turney? Afton Wagner?

Afton Wagner

Good morning.

Michael Berry

Good morning and thank you, everyone. Now, please join me in welcoming Hans and Shelly for their opening remarks.

Shelly Spiro

Hans, you can go first, and then I will do the charges and get us going.

Opening Remarks and Introduction of Task 2 – Identify Opportunities and Recommendations to Improve Interoperability Between Pharmacy Constituents for Pharmacy-Based Clinical Services and Care Coordination (00:02:25)

Hans Buitendijk

Sounds good. Good morning, everybody. Welcome to this next meeting. Today, we are going to shift to the second task that Shelly is going to introduce in a moment. I am looking forward to that discussion and the presenters that we have today. Also, welcome to those on the call from the public. If you are new on the call, you will see that there is the opportunity to chat, and you are welcome to do that. There is always a lively debate going on in the chat. We capture that and hold onto it as well, but if there are any additional comments, wait until the public comment so you can then further emphasize or highlight your perspective. So, I am looking forward to the overviews and subsequent discussion today. Welcome.

Shelly Spiro

Thank you, Hans. So, we just finished Topic 1, which was our public health emergency use authorization and prescribing authorities. We are now moving to Topic 2, identifying opportunities and recommendations to improve interoperability between pharmacy constituents, prescribers, pharmacists, pharmacy benefit managers, dispensers, payers, intermediaries, prescription drug monitoring programs, public health agencies, HIEs, third-party services, providers, consumers, etc., in all four pharmacy-based clinical services and care coordination. So, this is what we are moving to next, which is more talking about the clinical services that pharmacists provide and how standards work within that.





We have four presenters today. We have Kim Boyd, President of Boyd Consulting Group. We also have Steve Mullinex, who is the Senior Vice President of Public Policy and Industry Relationships with NCPDP, the National Council for Prescription Drug Programs, and we have Rick Sage, who is the Executive Vice President of Innovation and Standards Development from NCPDP, and Josh Howland. Dr. Howland is the Senior Vice President of Clinical Strategy and Product with RedSail Technologies. With that, after we go through the presentations, we will have a discussion, and then we will go to public comment, and if any time is remaining, we will look at our spreadsheet. So, welcome, everyone, and I think we can progress the slides. I think we went over this slide also, so you can see where we are at on our particular topic. Can you stop there?

I will also just put the subcategories under our Topic 2 just to let everybody know how ONC can help facilitate adoption and use to support data exchange for pharmacy-based clinical services, which priority pharmacy-based clinical use cases ONC should focus on for short-term and long-term, what technology gaps exist for pharmacy to participate in value-based care, and what ONC can do to address drug inventory transparencies for prescribers and consumers. I am going to remind all the Task Force members that our goal is to create recommendations. We will be working on those recommendations over these next four calls.

Just as a reminder, we will not be meeting next week, but we will be meeting the following week, so be prepared to add your recommendations to the spreadsheet. We are capturing the information that is in the chat, and that is really important because then that does help us. We will talk later about the spreadsheet and some of the tracking that we are doing in terms of assuring that those recommendations for your discussions are prompted to you, so you will be getting emails. If you have had some ideas that we want recommendations, especially in public health, we will be finishing up our public health recommendations over the next couple of weeks as we move to Topic 2. We can progress to the next slide. So, as I said before, welcome. I believe Kim is up first, so let's go to the slides and the presentation. Kim, I hope you are on.

Task 2 Guest Presentations (00:07:23)

Kim Boyd

I am on, Shelly. Thank you. So, good morning, Task Force members. I want to thank you for this opportunity today. I am excited to discuss the topic of standards for clinical messaging and interoperability between pharmacists and other healthcare providers. As this Task Force is well aware, interoperability in healthcare is vital for effective communication and coordination of care. NCPDP standards can play a crucial role in facilitating exchange of patient clinical care information between pharmacies, pharmacists, and other healthcare providers. Next, please.

So, before we explore the opportunities to improve pharmacy interoperability, let's first address the hindrances we face in challenging and achieving seamless data exchange between pharmacists and other healthcare providers. The first thing I want to point out is pharmacy interoperability faces hindrances due to varying systems and technologies, with pharmacists and healthcare providers using different EHRs and HIT solutions. There is also inconsistent data standardization in coding systems, which create challenges in accurately interpreting and exchanging information between pharmacies and primary care systems.





There are also varying workflows and system configurations, which pose integration challenges, which impede the smooth exchange of information. Capturing patient consent, which has been mentioned with this Task Force before, for data sharing for pharmacies and pharmacists is crucial, but there is also added complexity to achieving the seamless capture and information exchange of patient consent, so to improve pharmacy interoperability, we need to address these challenges and work toward standardized data formats and streamlined workflows for efficient data exchange. Next, please.

So, despite the challenges, NCPDP standards do offer promising solutions for pharmacy interoperability. The NCPDP Telecommunications Standard facilitates the exchange of clinical messages between pharmacists and providers, with 62% of the data elements needed for pharmacist-involved, value-based arrangements being present. The NCPDP Script standard also enables electronic prescription transmission, and that standard contains 42% of the identified clinical data elements needed for clinical data exchange relative to value of care. The NCPDP HL7 eCare Plan supports care plan exchanges between healthcare providers, including pharmacists, with 67% of the necessary clinical data elements present in the eCare Plan. NCPDP's Strategic Planning Committee and the VBA Subcommittee are conducting a second gap analysis to further evaluate closing data gaps and enhancing interoperability. Next, please.

This graphic, which was created by NCPDP's VBA Subcommittee, which can be reviewed in depth by the Task Force at a later date, is an overview of the workflow model for the Pharmacist eCare Plan and in support of pharmacists involved in value-based arrangements. The workflow for the eCare Plan begins with the pharmacist communicating to a primary care provider a comprehensive summary of patient-specific care recommendations. Next, please.

Regarding the Telecommunication and Script Standards, which I mentioned earlier as standards that can support the sharing of clinical information, the following is a simplified workflow for the Task Force to review in greater depth at your convenience. Next, please. There are opportunities that lie ahead for improving interoperability of pharmacy-based clinical services, such as standardization with messaging formats, promoting the adoption of pharmacy EHRs, workflow integration with other EHRs, and data quality improvements to ensure seamless care coordination and reliable information exchange between pharmacists and other stakeholders. Next, please.

The ONC does play a crucial role in advancing interoperability in pharmacy-based clinical services, and here are some ways that ONC can contribute to that advancement: Providing guidance, education, and resources on clinical messaging integration, continuing to foster collaboration among all stakeholders, ensuring everyone's needs are considered, actively engaging in future standards development at NCPDP, establishing and enforcing data exchange standards to ensure seamless communication between pharmacy EHRs and provider EHRs, offer incentives and funding to encourage adoption of fluid data exchange in pharmacy EHRs specifically, and advance additional policies and provide education to increase awareness and adoption of interoperable systems. Next, please.

In conclusion, bridging the gaps in data and systems and harnessing the potential of NCPDP standards for clinical messaging between pharmacists and other healthcare providers is crucial for enhancing patient care and coordination. Through proactive measures to address challenges, seizing those opportunities, and leveraging the guidance and support of the ONC, we can pave the way for a more interconnected and





efficient healthcare system. Collectively, we all possess the ability to create a connective and collaborative healthcare system where pharmacists and providers seamlessly exchange information and enable informed decision making in ultimately delivering superior care to patients. I want to thank you for your time and attention. I know I only had about five minutes. I know this was quick, so I am open to any questions you may have.

Shelly Spiro

I think we are going to hold all questions until after all the presentations, so, thank you, Kim, and we will go on to our next presentation from Steve and Rick.

Stephen Mullinex

Thanks, Shelly, Tricia Lee, and Hans for the opportunity to present NCPDP's perspective regarding standards development interoperability in a very rapidly changing healthcare environment. As you mentioned, Rick and I will try to cover at least three things in the next five minutes. We want to highlight several of NCPDP's strategic initiatives currently embedded in our three-year strategic plan, and those actually drive our operational efforts within the organization, and then identify the rationale for enhanced standards development and maintaining interoperability as we accommodate this movement toward pharmacists providing clinical services. Lastly, Rick will come in, and he will talk more specifically about the what and the how NCPDP is currently addressing this transition, both today and in what our plans are for the future. So, I am going to get right into it. Next slide, please.

Our strategic initiatives: Again, the central purpose within NCPDP is to standardize the exchange of healthcare information to improve outcomes, and in doing that, we have made at least three commitments to the healthcare industry, and one is interoperability, one is health equity, and then there is a commitment to public health as well. And then, in addition to that, and primarily through the NCPDP Foundation, we have made a strong commitment to looking at patient safety, access to care, and the role and value of the pharmacist in both of those. Next slide, please.

As NCPDP works to fulfill its strategic plan and accommodate this transition that I mentioned toward more pharmacists providing clinical services, we are mindful of the important factors, some of which are mentioned on this slide, and to distill it down, we really are looking at keeping the advantages of existing standards, maximizing interoperability via APIs and through enhanced collaboration with our friends in the SDO environment, and we already, as you know, have good examples of having done that, and lastly, we are attempting to minimize any sort of marketplace disruption during this transition process, trying to minimize any rip-and-replace if at all possible. Lastly, we are very mindful of the need to reduce provider burden, so we are asking ourselves the questions constantly of if we are making the process better, faster, or cheaper along the way. With that, I am going to kick it over to Rick, and he is going to share some of the specific actions that have already been initiated at NCPDP for the current needs as we see them, and also as we prepare for the future. Rick, do you want to take it?

Richard Sage

Thanks, Steve, and thank you all for allowing us a few minutes this morning to tell you more about what is going on within the standards development and interoperability within pharmacy and healthcare. As Kim and Steve both mentioned, the opportunities and movement that is being made right now to allow pharmacies to participate in non-dispensing opportunities and how we can develop the standards to support





these types of opportunities and encourage the interface into all of healthcare are so important to us. I will be talking about standards development. I will also be mentioning the interoperability work that we are doing, as well as looking at and focusing on the technology that allows all these functions to work, utilizing APIs and other technology that is important in the healthcare environment.

NCPDP newly formed Workgroup 20, which we are calling Coordination of Care and Innovation, which creates a place for the focus of industry interoperability in pharmacy-based clinical services and care coordination. This workgroup is targeting stakeholders throughout the healthcare industry for collaboration on systems improvement throughout the exchange of standardized clinical data. NCPDP believes that with this workgroup focused on clinical and collaboration, instead of specific financial standards, we will be able to advance the development and the use of healthcare technology capabilities throughout the industry. Sorry, could you advance the slide one? I apologize for that.

This talks about the areas in which our initiatives are focused for our new workgroup called Coordination of Care and Innovation, looking at things like value-based care, social determinants of health, precision medicine, and health equity, a lot of the things that Kim and Steven both mentioned as well, in collaboration with NCPDP standards and other organizations and standards that are available to move our healthcare forward. Next slide.

NCPDP is committed to staying focused on the current initiatives throughout the healthcare industry. This graphic, which you can take a look at and ask further questions about at a later time, highlights the areas within NCPDP that supports the initiatives, as well as a crosswalk in pollination with those with HL7. In June of 2021, HL7 coauthored a whitepaper with NCPDP focused on the standardization standardized medication profile. As well, we are currently exploring other areas where NCPDP can fill gaps to utilize data for better healthcare. We need ONC's support for NCPDP and all healthcare standard organizations to support the exchange of this clinical data. Next slide.

Shelly Spiro

Just as a reminder, you need to wrap it up quickly.

Richard Sage

Okay. NCPDP is looking to modernize their ability to support APIs, so NCPDP has put together a member-sourced API solution which is available to members as a member-driven API to support the industry standards, including our script, a real-time prescription benefits standard, specialized standard, as well as the future with our telecom standards, and as we migrate to JSON. So, there is a lot of information on here. I will stop now and open for any questions, but as you can see through the presentations this morning, NCPDP continues to look at how we can move towards clinical and support the interoperability throughout healthcare.

Shelly Spiro

Great. I think we are going to hold all questions. If you have questions, please put them in the chat, and we can continue on with our next presentation. Thank you, Rick and Steve.

Richard Sage

Thank you.



**Shelly Spiro**

Josh?

Josh Howland

All right. The beauty of going last is I get to tell everybody that I agree explicitly with everything that is already being said, and I get to end with something that is slightly controversial. So, I focused a little bit on what messaging looks like today, and one of the things that is really important to remember is we can do things back and forth between pharmacy and patient and hospital and patient. It is functional, but it is proprietary. Everybody went out and built their own system, my company included. We all did it, and partly because of that, it is fragmented and does not communicate well with others. NCPDP does a great job with prescriber-to-pharmacy saying how you are going to send a prescription from a prescriber to a pharmacy, but beyond that, it is basically the Wild West. And then, we did direct messaging, but it was not widely implemented, and everybody consumes it a little bit differently, so those create a bunch of weird little problems in the system. Next slide.

So, where we want to be able to go and where patients want is a near-real-time asynchronous communication between a provider or groups of providers. We have all been thinking about this as a one-to-one communication method, but it is not. It is a one-to-many. So, in methodology that looks and feels similar, everybody can use email, Slack, Teams, or whatever it looks like. Those are beautiful implementations of asynchronous communication transfers. You can send video messages, you can send text messages, and you can send documents. All of it works. There is a clear way that this is a winner. Everybody does it, and everybody is familiar with it. We should be able to share medical records and content through channels similar to that, but we need a couple of things in place, and I am not the first person to think about it.

These two things have been universally brought up and almost always shut down. A universal patient identifier is the single thing that ties all that together. I need to be able to know that the person at this hospital is the same person in this public health registry that is also at my pharmacy. Having a universal patient identifier that is not a probabilistic match where everybody is trying to piece things together... I think we need to push for a universal patient identifier that is government-sponsored and not used for other things, like a Social Security number. The Medicare Beneficiary ID got close, but it is only for Medicare patients. We need something like that to identify all the players in the system, and direct secure messaging has to be universally implemented and consumed. You have to do it. It is the same reason the internet works. Every single player uses TCP/IP protocol. If you do not want to use that, you do not use the internet.

We need something very similar to tie all of these really good standards we have together, like the Script standard and the D.O standard, soon to be F4, and then tell people exactly how they are going to use it. You get those two things into place, and being able to share information across the entire ecosystem almost becomes trivial. And then, the last part about that is if you tie those two together, the identifier and the message, think about how easy it would be for a prescriber to send a prescription over to a pharmacy and be able to say, "All right, I have this order, I have this standard, and now I have an ID. I am going to start a conversation with that doctor about why they are taking it. Let's get that PA done quickly." Then, you could link it to a lab and query those lab results based off of that patient. It creates this really, really quick web of exchange, and all of that is possible through those two things, which we have not yet. Next.





So, basically, I put that together graphically with how it might look. You can see information flowing if all of that is tied together with an ID through some sort of common interface. I tried to make ours as generic as possible so it is not branded in any way, but...

Shelly Spiro

Josh, you have one minute left.

Josh Howland

No problem. I will do it in 20 seconds. The whole point of this is just to say passing that information through with a common identifier into a method or an interface that people recognize and can use creates this web where you can pass all of those different types of standardized payloads instantly through the system. That is my soapbox. Thank you for your time.

Task 2 Discussion (00:26:34)

Shelly Spiro

Okay, so, let's go to our discussion. I think it is important that we have all of our presenters basically talking about the same topic. So, raise your hands. I see that Hans's is up first. Please continue to put your comments in the chat. That is both for our Task Force members and also for the public. So, please keep the chat going, and Hans, you have the first question.

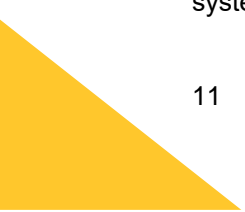
Hans Buitendijk

Thank you, and thank you, everybody, for the updates and the perspectives that have been raised. I have a couple of questions, but I will start with one because our last speaker, Josh Howland, introduced a controversial topic. I am wondering whether my question is going to become controversial in a way there. I hear a strong emphasis on a national unique patient identifier. I do not think anybody would argue with that, but how do we do that in a way where we always know we can get a complete record? Definitely, that is not controversial in that regard or any other regard in that sense, but you are emphasizing asynchronous communication using direct, and we hear a lot in the industry about FHIR, RESTful APIs, and other things.

In that context, when we talk standards, I am curious about which area we should report. Should we spend more time on some of the RESTful APIs, should we spend more time on messaging, should we do both, or otherwise? How are you looking at that to complement the variety of ways in which we need to communicate? Is it one or the other, or is it a combination of the above, and if so, what do you think that combination is to have that ongoing conversation between providers, pharmacists, patients, etc.? What are your thoughts on that on where we need to focus.

Josh Howland

That is a lot. I think the answer is both. You need those RESTful APIs to be able to pull information from systems in a way that makes sense to those systems. JSON is a great example. If a system does not understand a specific thing, it will skip over it, but pull the things it needs. Historically, you would have had to create these custom bespoke data feeds. That is not functional, but being able to say, "I can identify that Josh Howland is the same person in multiple systems," and then being able to get in touch with that provider using a direct address, a message does not have to be words between two humans. A message can be a system reaching out and saying, "I am reaching out to this direct ID. I need this group of information. Pull





this JSON API.” If you do not do both, you just have these partial effects across the system. So, the answer is definitively both.

Hans Buitendijk

Thank you.

Shelly Spiro

Pooja?

Pooja Babbrah

Good morning, everyone. Thanks for your great presentations. So, I have two topics. One is the UPI, and I think Christian actually put something in the chat. I would love to hear from the NCPDP folks a little bit more about the UPI, but before we do that, Kim, in the chat, you had talked about ADT notifications, and I am also curious about that. I think that is a topic that is coming up at the new workgroup that was mentioned from NCPDP. That has been something that I have been thinking about in terms of whether it makes sense from a care coordination standpoint. We send ADT notifications when a patient is getting discharged from the hospital to providers. Is there a potential to be able to send ADT notifications to pharmacists? I would love to hear thoughts on that, primarily just in that care coordination. I just do not know enough, and I thought it was part of the direct messaging, and maybe it is separate, but I am curious about that as well, and then, I would love to hear about the UPI.

Kim Boyd

Pooja, I think there was a question to me about ADTs, right?

Pooja Babbrah

Sorry, I went back on mute. Yes, correct.

Kim Boyd

So, you are correct, and Rick mentioned earlier the new Coordination of Care and Innovation Working Group that is forming at NCPDP to look at how we can accelerate use cases focused on transitions of care, and Pooja, I think you even brought that up as one of the members of NCPDP. I think it will be an exceptional process in which to get these patient discharge and transitions of care to pharmacists. I think it is something that is desperately needed so pharmacists can engage as part of the whole care team to ensure that patients successfully transition and you can reduce readmissions to hospitals and reduce acute situations with the patient. I think getting that information to the pharmacist will be critical, and I support that. I think the new working group will focus on that, and I think we will find that we will see great success in that.

There are already entities in healthcare today who are doing some of that, but it is a pretty significant technical and contracting lift and a BAA process in which to get it, but once you have it in hand, you are able to assimilate analysis around success for pharmacists to reduce those hospital admissions and to reduce those acute phases of care that cost healthcare a lot and also are not a positive for patients, so I think it is something we definitely need to focus on. The universal patient identifier is something that NCPDP has been focused on for several years through their strategic planning efforts and have already basically assimilated a UPI for everyone at this juncture. To Josh’s point, if I do not know that I have the right patient in hand, then how am I going to make the right clinical care and how am I going to get the right record? We





are fragmented, and I think it is very critical for us to think about in healthcare how we can identify patients through a UPI.

Shelly Spiro

Thank you, Kim. I guess I am up next. I have a few questions. I want to make a comment about UPI, and for the Task Force members, I think we can pull some recommendations that have been across the board at ONC to add to it, but we do know that pharmacy struggles with integration with others, so UPI is very sensitive to our particular practice. My question is to Rick and Steve. What are some of the targets that NCPDP is doing in relationship to harmonizing with the HL7 standards?

Richard Sage

Thanks, Shelly. This is Rick. I will just speak to the graphic that I put on there of the work that is being done with HL7 on looking at how things start with the eCare Plan, being able to pass information back and forth, and then working with each of our standards to say what is included in the information that is available through the NCPDP standards and HL7 standards and how we show the movement of and the transfer of information back and forth between those. We also are working closely with HL7 on coordinating through the projects that HL7 is working on to be able to ensure that the work and the information covered under the pharmacy benefits programs can match up as closely as possible to the information that is being created and passed on HL7 as well.

We both see tremendous work ahead of us to continue the effort, but we also see the path to success on these programs that we have identified on standards on both sides, HL7 and NCPDP, on creating the interoperability between the two. We also enjoy members, such as many that are on this call here today, that are sitting on both sides and helping to pass information on what is happening within the creation and support of those standards, both through HL7 as well as NCPDP. Steve, do you have something to add as well?

Stephen Mullinex

I think you covered that very well. From our perspective, it is just the interest. We have had more interaction with the folks at HL7 in the last year than we have probably had in the last 10, so we are constantly making an effort to reach out to the organization. We have stated publicly many, many times that we believe that it is less about pride of authorship of ongoing standards than it is about making sure that those standards work to their maximum benefit, so that is sort of the theme behind all of our efforts. If you do not mind, Shelly, I will also just mention that I appreciate the softball about UPI. Obviously, many of you know that we have been working on that for a very long time, and it has been quite a journey for us. We are utilizing a non-forward-facing enumerator that is provided via Experian Health, but the more important issue is that it became so obvious to us when we were working in the opioid space, COVID vaccines and testing, etc., it became increasingly apparent to us that we needed to make sure the pharmacists had the right John Smith in order to make those good clinical decisions, so that is what has led us down that path.

I do not want to speak for Experian, but in the systems that they were looking at, there were incompletes and duplications in the percentage range of between 8% and 18%, and in our minds, that is an accident waiting to happen. Of course, you know that we are not a lobbying organization at NCPDP, but we do go on the hill doing something we call "advocacy," and for those of you who have been really close to this, you recognize that we have one Senate office who is pretty staunchly against this whole UPI. I think we are





going to have to call it something else, but we believe that each year, we are getting a little closer to making that a reality. Thank you for that softball.

Shelly Spiro

Thank you. I have one other question for my colleagues who are lined up, but I did want to ask a question of Josh Howland, since we do have him with us. Josh, one of the projects that you helped work on is the Pharmacist Electronic Care Plan, and one of the large users is your customers for the Pharmacist Electronic Care Plan. Can you give us an update on how well it has been adopted, how well it has been received by the pharmacists who are actually using that, and some of the frustrations that they might have in exchanging with our physician partners, hospitals, or other providers?

Josh Howland

Yes. In terms of inside the independent community pharmacy, it has been well adopted. I think we are over 1 million care plans submitted quarterly now. It is respectable. The single biggest problem is that a lot of the payers and the other people who want to receive the care plan do not want to receive all of the care plan, and that is the whole point of what SMART on FHIR should be. The downside is we have seen a fairly slow adoption rate of people being able to send and receive through SMART on FHIR, so the reality right now is that it is a cool product with a lot of rich information that is really not being used to its full effect outside of pharmacy-to-pharmacy, or specifically pharmacy-to-CPSN. Right now, CPSN is basically ingesting the FHIR care plan and creating reporting out of that to go to other payers or public health places. So, we are not quite there yet.

Shelly Spiro

So, Josh, as a follow-up on that, the care plan is a C-CDA version and also a FHIR version. Which do you see as the majority of adoption with your customers and those you exchange with? Are they more interested in C-CDA, or are they ready to go with FHIR? Can you talk about that type of adoption level?

Josh Howland

Yes. So, most of the pharmacy software groups went with the FHIR implementation, and most of the EHRs in the country had not moved to FHIR yet. I think that boat is clearly tipping. All of the big guys have now gotten FHIR implementation, so I think that barrier is going to come down quickly, but there is still some practicality missing from it. I just saw Kim post in the chat that it is not necessarily fluid, and I think that is right. There needs to be a more fluid way to transfer information back to the people who need it in smaller components, and that once you see the proliferation of SMART on FHIR APIs, that is what you get. "I dispensed this; here is the lab. I did this; here is what I recommended." And then, if you want the whole care plan, you can say, "I want to ingest it." That part has not been done yet, and that is only available if you do that on SMART on FHIR API implementation.

Shelly Spiro

Thank you. Okay, we will go to Scott.

Scott Robertson

Yes. On the UPI discussion, I think it was Steve that mentioned an ongoing concern by some legislators. There still is concern in the patient privacy world that these identifiers can end up facilitating the inappropriate exchange of information and define people in their conditions, and I am not asking anybody





about a solution for that, but it is a point that needs to be kept in mind while we are doing this. Anything we can do to address concerns about privacy is something we need to keep in mind. I had another one, but we have been talking about UPI so much that I think I lost it, so it must not have been terribly important.

Shelly Spiro

Well, if you think about it...

Scott Robertson

I will raise my hand again, yes.

Shelly Spiro

Okay. Hans?

Hans Buitendijk

Thank you. I want to go to an earlier question that I put in the chat that had a little bit of discussion back and forth. There is a lot of activity going on defining the standards with NCPDP and HL7 collaborations and the relationship with X-12, so there is a lot going on, and there is also awareness, I think, among many on this call that developing standards takes time, so it is not something that can be done overnight and then it is there. But, in that area, there are still areas where we would say we are trying to accelerate, like the HL7 accelerated programs, trying to advance something faster than would otherwise be able to be done.

Are there any particular areas that jump out, whether that is already on the list, that really would be the key from a pharmacy perspective to require a bigger focus than we currently have, that there is potential for collaboration, or are there areas where we are not yet collaborating that are really in need of collaboration, but we just have not found a way to get people at the table yet? In both categories, I am curious to hear from any of the presenters which ones jump out there that we should focus on more than perhaps others. It is not that others are not important, but which ones are jumping out where we need to do more?

Richard Sage

This is Rick. I will jump in first, and then anyone else can join if they want to. We have some specific programs that, again, keep leaning to use our ability to use the eCare Plan on jumpstarting some of the things that the individual standards and interoperability continue to support, but some of the projects that are most important right now that are active in flight are our value-based care and working with our physician partners to allow pharmacists to participate in these VBA programs, more specifically, through our precision medicine and the ability for pharmacogenomics to be coordinated through and recognizing the value for the pharmacy of the information that can flow into that, and our programs within things like our digital therapeutics.

With all of the clinical-based programs that we are looking at, how do we accelerate, as you mentioned, Hans, the opportunities that are there today, while recognizing that standards development to support wholeheartedly under the revisions to or creations of standards are going to take some time as far as what needs to be done? We continue to look at the gaps in the information flow and what we can do to accelerate or utilize existing tools and services to be able to support those.

Hans Buitendijk





As a follow-up question on that, if I am looking at some of the examples used, there are many big areas there, but I am also noticing that if we, for example, talk about care plan and we have prescription-focused transactions already, there are also a number of questions coming in the chat and prior discussions about how it would be great if the pharmacists had access to some lab results, or the other way around, where the pharmacist has some results that should go back.

They are not natively or naturally part of prescription transactions, and a care plan might not be the best way to dialog around that as well, yet there are standards around that. FHIR has some more, V.2 has some more, and C-CDA has some of those, so it looks like there are opportunities where we already have some standards to advance the communication, but it is not happening, so I am curious particularly about those ones, where we actually do have standards, but getting to the point of exchanging them is hard, between pharmacists and providers in particular, but perhaps also with patients. Do you see any opportunities there? What is it that would help us advance that so we can close those gaps as well while we are working on some of the big goals along the way too?

Richard Sage

Similar to what is happening on the accelerators on the HL7 side, by having opportunities where players are going to step up to the table with specific examples and concepts that can move us forward by looking at what we have in place today and how we can move those forward, on the NCPDP side, we have a foundation that we put together that can help support the driving of the adoption of programs that players that are interested in showing the value and proving the ability to utilize the standards and the process in place to interface are important. I think a lot of it has to do with making sure that we do have people that can step up to the plate and want to participate specifically on moving it forward, and not just conceptually.

Hans Buitendijk

Thank you.

Shelly Spiro

Ike?

Steven Eichner

Thank you. I am not sure how to frame this question. One of the challenges that may be out there is looking at when medication information or related information is not coded into a medication list by a physician or other care provider, and another space in that is looking at how drugs that are in clinical trials may not fit into catalog numbers or are not showing up, and I think that creates some challenges as we are looking at contraindicated lists or medical conflicts. Is that really an issue that needs to get addressed? Do we need to do something in that space to make it easier for pharmacists to be able to reconcile potential conflicts because there things that are often not in the medication lists in a patient's file, but are still maybe of interest to pharmacists?

Shelly Spiro

Well, if nobody wants to answer that, maybe I can help, Ike, in answering your question. We have a couple of task groups within both NCPDP and also a subgroup out of the HL7 EHR Workgroup under the provider burden that is working on the medication list, and also on the NCPDP side, working on the standardized medication profile, which will also incorporate medication lists. This will help reconciliation at the point of





contact with the patient, both on engaging the patient in medication reconciliation, but also in helping the pharmacist do medication reconciliations through the pharmacist's patient care process, and those are all things that pharmacists do.

What we have is the difficulty in obtaining all the information that is needed within our systems. Today, most of the medication information is based off of the dispensing claim, and there are a lot of anomalies that are within that. I do not want to take away from our presenters, but there is a lot of work that is being done. It is a very tough topic to get through. The HL7 Pharmacy Workgroup has guidance on medication lists and how to use the FHIR resources for medications. For medication lists and the exchange of medication lists, there is a lot of work that still needs to be done in that arena.

Steven Eichner

Right, that was my thought. I knew that there was some work going on in that space, but I am thinking of looking at taking advantage of the opportunity to provide some additional feedback to ONC and other organizations that this really is something that does require continued and ongoing focus because we are really talking about patient safety issues in a very, very real world, and as we are looking at potentially expanding the opportunity to get more information, that is fantastic, but it also needs to be reliable, accurate, timely, and complete for it to really be useful and not put patients' health at risk.

Shelly Spiro

I totally agree. One of the things that we have identified in some of this effort as we are looking into the medication lists is that there are different types of medication lists. You have your active list, you have a reconciled list, you have your discontinued medication list, which is also very important, including the reasons that a medication is discontinued, and recently, we just identified another type of list, a private list that needs patient consent to share that would follow the CFR 42 Part 2 rules. So, we have identified that there are different types of lists that need to be exchanged, not just the list that we think the patient is taking, but we need to understand a true, reconciled medication list that is not just about prescriptions being dispensed, but over-the-counter, supplements, and other types of consumption by patients, and these are all very important if we are going to have a comprehensive medication management process take place.

Steven Eichner

Yes, so I think somewhere in our recommendations, we need to not necessarily get entirely in the weeds, but make sure that we are reminding folks that this is an outstanding issue that needs attention.

Shelly Spiro

Thank you. Pooja?

Pooja Babbrah

I want to go back to what I put in the chat about the chattiness of this, and Josh, thank you for commenting on that. It just made me realize that one of the recommendations... We met as a small group last week to talk about the capturing of race and ethnicity, and one of the things that we talked about was whether we should consider making a recommendation around bidirectional certification of some of the e-prescribing standards. I am thinking of Script standard, RxChange, and RxFill. We know that EHRs have had to put that in. Is there an opportunity for us to think about that certification on the pharmacy side? Because that will get to some of the chattiness. We know that those standards of transaction exist, but how do we make





sure that they are being utilized and incorporated? So, that is just something for the group to be thinking about, and if any of the panelists or presenters have some thoughts on that as well, I would love to hear them.

Richard Sage

Pooja, it is Rick. I would agree that a lot of our standards that were developed on the Script side recently were originally developed on passing information to the pharmacy, and as we continue to evolve and the clinical opportunities in pharmacy continue to evolve, the ability to pass information in the opposite direction becomes more important, and we have begun looking already at some of the messaging standards and asking if they can be initiated by either party in passing the information, and how does the standard change accordingly? I think that is a great opportunity to be able to utilize an existing standard to implement the passing of information in different directions, including expanding upon the ability to include other parties that are important to the clinical decisions and, at some point, also looking at how the patient gets informed and makes informed decisions along the way as well. So, I think utilizing our existing standards and just looking at the path they take today may change and should change as we are looking forward to how each of the participants play a role in the exchange of clinical information moving forward.

Shelly Spiro

Thank you, Rick. Afton?

Afton Wagner

Thanks, Shelly. Just listening to the discussion, I wanted to take a step back and level set on the expectations or realities of pharmacies today, as we want to have seamless partner data exchange, but we are still very, very early in this process, and bidirectional exchange is still done manually in some cases, and we are still trying to figure out how to obtain data and get it on the prem, but next steps are even getting in the cloud, and how to do some of that has not even really been thought of yet. So, we want to get to the space where we are using our standards to be able to get there, but I just wanted to level set the reality of how things are being done now, and it is something we want to do, but we are still in the baby step mode, so anything small or actionable would be really helpful in getting us to where we need to be.

Shelly Spiro

Thank you, Afton. Scott?

Scott Robertson

Building on Afton, just as there had to be support for smaller providers in implementing and having required EHRs and patient management, you have to think about that in terms of all the participants. There are the smaller pharmacies, and there are the bigger pharmacies, and there are the bigger pharmacy system vendors and smaller system vendors, and that goes for any endpoint you want to talk about. There is a range of people, so, especially if it is going to be a requirement, how can this be a viable thing for that full range of participants? It is a forever problem, but one that we just need to acknowledge.

Shelly Spiro

Thank you, Scott. Afton?

Afton Wagner





Just to follow up on that, Scott, I appreciate that comment, and we have dozens of partners that we want to be able to exchange data with, but something as simple as trying to figure out how to even... SFPT problems, data exchange, decrypting on the fly, and small things like that are little, minute details that do not enable programs to partner with us because we do not have a single capability, and looking forward to that and looking at how different organizations want to consume their information, what they need, what they use to encrypt files, or gather information is really important, so we need to think about what our partners are doing as well and how we can all work together.

Shelly Spiro

Thank you, Afton. I guess this is to Rick and Steve. We know that the workflow for the long-term post-acute care setting, especially when we're dealing with the Script standard and the exchange of that information, is unusual, to say the least. It is what we call a three-way communication instead of this bidirectional or even one-way type of communication in the Script standard, and one of the things that they did to solve that problem was to utilize what we call a copy of this to be shared with the physician and the facility or home healthcare agency that is taking care of those patients, so that could help with the medication reconciliation process also. So, I want to know how NCPDP utilizes looking at some of these anomalies that take place in some of the specialty areas, like specialty pharmacy, long-term post-acute care, or some of the exchanges that are not the normal community pharmacy type.

Stephen Mullinex

Rick can probably give you a better perspective from the standards development perspective, but I think what I would say in general is something that Hans brought up earlier, and that is that we cannot boil the ocean tomorrow, so, as you know, Shelly, because you have been in it for many years, we do really well with use cases and addressing those use cases, and it seems to me that the challenge with all of this is determining which of those should be prioritized, and then we go about creating our taskgroups or, in some cases, workgroups to address those specific issues. I think that is how we will be moving forward because we have done it in the past as an organization, and we have been pretty good at it. So, that is the way, but if you are asking the question of how long-term post-acute care fits in that priority, you will have to tell me.

Shelly Spiro

I do not want to tell you on that, but Rick, did you have anything to add?

Richard Sage

I would just tag what I said earlier as well, and it is exactly what Steve was just mentioning. By building those use cases and having the specific opportunities of implementing a challenge, that creates our taskgroups, our work that needs to be done, the opportunities of putting together potential changes in the standards, but it also addresses some of the things we just talked about on Script, looking at how we do in the passing of information back and forth. Sometimes it is just looking at it from a different angle, but we need the participants that are interested in joining in a taskgroup, getting involved, and coming forward with a use case that is a challenge that they have, and seeing if there is something that could be done today within the existing standards or if there is something that we need to address to be able to support moving forward.

Shelly Spiro





Thank you. Let's go to the HL7 side on this. Being involved in HL7, I know that they do not look at the standards the same way that they do within NCPDP, especially when it comes to some of these specialty areas, like pediatrics, long-term care, and rehab, so you do not have a separate workgroup, it is just integrated into the entire HL7 process, so I think they use a similar use case type of aspect or profile aspect, such as dealing with pharmacy, too, although we do have a pharmacy workgroup at HL7. I do not know if there are any Task Force members that want to address that or if the NCPDP or any other presenters want to address that difference. Scott?

Scott Robertson

So, I have been involved in both HL7 and NCPDP for some time, and historically, HL7 has been a bit more academic, but especially with FHIR, they are academically rigorous, but use cases have become more important. You cannot just say you want this piece of information. There needs to be a scenario around what it is, why you are moving it around, and what the intent is so that it can fit into everything else. HL7 is broken up into various areas of interest, such as the workgroups, pharmacy, and patient empowerment, but there is also EHRs and security in general, so it is a matter of coordinating between those groups.

NCPDP historically has been much more use-case-oriented because they were more business-oriented initially, and that has served it very well because you do not have as many standards developed that then are not really used because they only get developed when somebody says there is something that needs to be developed. HL7 has come closer to that, and I think that has benefited HL7 a great deal. I think we even need to force people more often to think in use cases. It is like, "There is a problem; this needs to be fixed." Well, explain to us what the problem is and how it is impacting everything. If we can keep that kind of focus, even when we are doing our work now, that will be beneficial.

Shelly Spiro

Thank you, Scott. Kim, you gave a great presentation, especially on this new group that is dealing with value-based care. I know that you are looking at moving forward with this new workgroup, Group 20, for identifying the gaps. Which gaps are probably the most important that we identify? We know that data is extremely important, and we need to be able to exchange the data, especially with pharmacies, as we move into value-based care.

Kim Boyd

I think it is between pharmacies and pharmacists, but also with the other primary care providers, so if you think about the transition to value-based arrangements and value-based care in coordination of care with pharmacists, being able to not only capture the relevant, mostly clinically related information, Shelly... It is mostly clinically related information, and Hans brought this up earlier, with labs as an example. Our standards do have placemarks in them to capture and conduct lab-related information or other clinically related services, but we do not have this fluid way to just get it over, and eCare Plan can do that, but what is not coming back is what action was taken by the primary care provider.

If you think about a value-based arrangement, it is this collaboration, so there has to be this fluid data exchange, but more specifically in real time. I do not think you can take action on something that you do not have real-time access to. So, we do not know quite yet what we do not know. We are in the process of asking what elements we are missing from a clinical perspective and how important they are to what you all have been talking about today, which is particular use cases. What particular use cases or pilots need





to be focused on, because they are the most advantageous for patient care and coordination? So, that is what we are digging into next, so we should know in September what that really looks like and can report back to the Task Force on what we are finding.

Shelly Spiro

Thank you, Kim. Pooja?

Pooja Babbrah

Sorry, I lost my mute button for a minute. So, I want to go back to what Scott was talking about, this HL7 and NCPDP coordination, and I know there was that slide that Rick showed that was showing this is one of the strategic initiatives to show cross-pollination, but I think this whole discussion of use cases is getting me thinking that there are situations such as specialty medications, which I will use as an example, that is a great example where some specialty medications are covered under the pharmacy benefit, and some are covered under the medical benefit. For those that are covered on the pharmacy side, we have all these standards in place where you can prescribe, you can do the prior authorization, and you can do that all the way from end to end and get that dispensed. If a specialty medication is covered under a medical benefit, you fall into this completely different workflow that was very manual, though Da Vinci implementation guides are coming out for prior authorizations and things like that, but it is such a separate workflow. I know several people have been working on different implementation guides and work between NCPDP and HL7, and one thing that we have been trying to do is make sure that our standards are working together.

So, for example, there was created a specialty implementation guide that essentially allows a provider to submit an enrollment form to a specialty pharmacy by using FHIR to pull clinical data elements and pass that along. In the whole discussion of use cases and pharmacy interoperability, I feel we need to be looking at those use cases and saying, "Where is there overlap, and how do we get these standards to work together?" I do not know if there is enough, and I am trying to think of a recommendation for ONC. Maybe part of it is just bringing some of these forward, whether it is through education or other things, where we are saying that in some of these cases where there are these areas where we need clinical and pharmacy data to work together, these are things that have been done, and how do we bring that forward? So, I just think it is important for us to note, especially as we move forward with our recommendations. How do we get pharmacy and clinical data speaking together? Anyway, those are just some thoughts for going forward.

Shelly Spiro

Thank you. Hans?

Hans Buitendijk

I want to pick up on what Pooja was talking about, what ONC can do and what some of the potential recommendations are in light of our Task A. I think one of the things there that we think about in this conversation is that there are a number of areas that are being addressed where industry is making advances and certain things can only go so fast, so they might go fast enough that they are as fast as you can go, and therefore, there is not as much need for ONC, perhaps, to provide an assist to help move forward, but there might be other areas where there are, and in the past, we have seen that in a couple different ways on how ONC can help the industry advance where it is helpful to collectively work together on it. There are plenty of areas where that is not necessary, where things can be done, but there are areas where we have to do it consistently across the board.





So, you look at accelerators that ONC has particularly been part of in that context within HL7, like the FAST accelerator, which started as an ONC initiative, to see how networking can be advanced, and do it at scale, or the current collaboration between ONC and CDC with Helios to address a variety of public health use cases. That is for the Task Force to ponder. Among the discussions we have had today, are there activities that, if we let them go at the pace they are and the focus they have, are not making the progress as fast or as focused as they need to? Is that somewhere ONC can be asked to help by way of LEAP, accelerator, or participation by other means to help accelerate it? I think that is one of the challenging parts. Which ones of these rise to the top in that context? So far, I am hearing a lot of good work that is all progressing at a good pace. I am also having a hard time finding out in which niche we are missing something, so I am curious if others have opinions about what that might be.

Shelly Spiro

Does any one of our presenters want to comment on that?

Kim Boyd

This is Kim. I think Christian noted very effectively in the chat about the profession of pharmacists, and the pharmacist having access to the patient chart. They are a consented party to the care, and I do not think that is fluidly happening, but if we could prioritize those pieces of the chart that are most applicable, I think that would be a good use of the Task Force's time, to look at what the key priority areas are for pharmacists obtaining patient chart detail. Is it immunizations, labs, ADTs, or transfers from different facility types? I think that would be a good use of the time because it is incumbent upon the pharmacist to have that information to be a holistic part of the care team and help coordinate homecare.

Richard Sage

I would just tag onto where I think Pooja was going a few minutes ago. The more consistency in workflow and understanding between where a particular benefit is falling and how that drops off when it is understood that it does not follow the common path of medical or pharmacy and then passes back and forth, and I think there is a tremendous opportunity for us to find ways of creating a more common workflow and information sharing back and forth that allows that common workflow to continue, or at least more disclosure of where the information sits and the type of benefit that it is that would allow either the medical side or specifically what we are talking about here, the pharmacy side, of understanding how to get the information or how to submit information when it is necessary.

Shelly Spiro

Thank you, Rick. I am going to take the last five minutes to drive a conversation. I would like to hear from our panelists. This is one of our charges. In helping us form our recommendations, how can ONC help facilitate adoption and use of standards to support data exchange for pharmacy-based clinical services? I would like to start with Josh first.

Josh Howland

HL7 is a great standard, but there is kind of a joke in the developer community that once you have seen one HL7 implementation, you have seen one HL7 implementation. The standard gets nonstandardized. People slide things into different areas. I think what we need for now is not a firm recommendation, but a





firm “This is how you are going to do it.” Somebody has to tell the children how to do it, and unfortunately, sometimes, I am in that group of children. I need to be told what to do.

Shelly Spiro

Thanks, Josh. Kim?

Kim Boyd

I will tag team on Josh, and I think I put this in Slide 8. There needs to be some specificity around the criteria, around the standards, and potentially even around certification of systems and how they are going to interoperate. Tell these systems, the pharmacy EHRs... There is not really even a term for pharmacy EHR. You have pharmacy management systems. But, if we are going to establish this ecosystem where there is data fluidity happening between the different provider types, then we are going to have to set up a roadmap in which to tell those systems how to interoperate, meaning certification and standards data exchange implementation guides that are easy to comprehend and follow along between the different type of provider types, including pharmacy. So, I think certification in standards is going to be a key piece to making sure we can interoperate.

Shelly Spiro

Thank you, Kim. Steve?

Stephen Mullinex

One of the things that we have been watching is grant proposals at the federal level and encouraging interoperability among the various SDOs, and so, we have been interested in making sure that, frankly, at least the three relevant SDOs that are all attempting to work together create some level of equity in terms of grant funding opportunities.

Shelly Spiro

Rick, I will give you the final say on this topic.

Richard Sage

I kind of bring it all together. I think what you just talked about on workflow and this interoperability between to have ONC help us to sponsor the ability to drive the benefits on both sides of the fence, but more specifically how pharmacy can and should interact more specifically and more consistently on the standards that are in place today, and how you implement between, and allow pharmacists to be able to access things like charts, be able to pass along information that is important from a pharmacy perspective to medical, but more importantly, making sure that whether it is a medical benefit or a pharmacy benefit, if it is a clinical opportunity to move forward, the pharmacist, whether it is a small independent or a large group, has significant resources and we have a more consistent implementation and support from the industry, more specifically from ONC, to just be able to tell us how we play the game, to Josh's initial point, and make sure everyone is playing it consistently.

Shelly Spiro

Thank you. We have one minute left, and I just want to bring up a topic before we go into public comment, especially to our panelists, and I know some of our panelists have to leave, but we know that there is such a problem with drug shortages right now and the communication of drug shortages between care providers,





and I just wanted to get your thoughts on what you think we might be able to do to help with that transparency on the availability of certain medications, both for the patient and for the prescriber and pharmacy. Does anyone want to take 30 seconds?

Stephen Mullinex

Shelly, you are absolutely right. That is one of those things that keep us up at night because at any given time, there are somewhere between 250 and 400 drugs, many of them very important, lifesaving medications, that are in short supply. I think ultimately, we have something that we have been looking at called the facilitator model, and you know that we have been discussing that and working through that with regard to the opioid crisis, as well as the COVID vaccines, testing, and treatment aspects. As a matter of fact, there is a multistate pilot on the COVID side going on right now related to bidirectional lab information available to pharmacists. So, driven to its fullest extent, we think it could actually help provide that early warning sign in terms of when drugs are in short supply.

Shelly Spiro

I am going to hold your thought there. If we do not have any public comment, we will come back to this, but it is a topic we will be discussing later. Mike, go ahead for public comment. I apologize that we are about one minute late on that.

Public Comment (01:20:54)

Michael Berry

No problem at all. We are going to open up our meeting for verbal public comments. If you are on Zoom and would like to make a comment, please use the hand raise function located on the Zoom toolbar at the bottom of your screen. If you happen to be on the phone only, press *9 to raise your hand, and once called upon, press *6 to mute and unmute your line. Let's pause for a moment to see if any members of the public raise their hand. I am not seeing any hands raised, so I will turn it back to you, Shelly.

Shelly Spiro

Steve, let's finish your discussion on this and the NCPDP facilitator model on helping with that communication on drug shortages and other inventory issues.

Stephen Mullinex

Well, all I was saying was that the model itself was created in a way to ultimately accommodate any and all prescribed medications, so if you move that to its fullest potential over time, you not only create the opportunity for things like post-marketing surveillance, but also utilization, and we think that there is some level of opportunity there as we talk about drug shortages specifically.

Shelly Spiro

What I am talking about, Steve and others on the panel, is more on a clinical standpoint. We need to be able to come up with different recommendations for substitutes for the drugs that are in shortage. We are facing this right now. We need that pharmacist-other provider communication in relationship to this, and also communication with the patient. This is a clinical issue, not just a drug inventory shortage issue, because we do not have that bidirectional exchange, including with the Script standard, for changing or making a recommendation for a change in a prescription because there is a drug shortage issue. This is





one of the good reasons for moving the ChangeRx to not be optional. So, I would like to take it from the clinical standpoint, not necessarily from the standpoint of the drug shortage itself.

Stephen Mullinex

It is obviously a very important issue, and as you rightly point out, the pharmacists would be in the perfect position not only to understand the concern about the drug shortage, but also to be able to provide therapeutic alternatives, and thus the need for bidirectional communication.

Shelly Spiro

Thank you. Pooja?

Pooja Babbrah

Shelly, I think you bring up a really good point about the patient, and it looks like Rick put the information in the chat. We now have this potential flowing between pharmacies and between providers and pharmacies, but what about the patient and some kind of information to them? I was also reminded of that as we were going through USCDI. "What about the patient? What about the patient?" So, we need to make sure we keep that in mind in our recommendations through all of this.

Shelly Spiro

Christian?

Christian Tadrus

Thank you, Shelly. I just wanted to echo the clinical needs for these bidirectional communications with EHR systems. We fight these routinely in our day-to-day operations. Everything can clarify, but we can also make recommendations. Lack of adoption by EHR systems of certain transactions that could facilitate that communication around event product availability and/or therapeutic interchanges is really part of the encumbrance that we face. They are available, but they are not routinely adopted, so to me, that would be an area where we might think about making some recommendations as part of the certification processes of EHRs.

Shelly Spiro

Thank you. Do we have somebody else? We dropped it, sorry. Is there somebody else who wanted to make a comment on this topic, especially from the panel?

Richard Sage

This is Rick. I would just make the comment that information going to the patient is critical. I kind of referenced it earlier on. I believe that we could utilize the resources that we have in the industry to help us understand patient involvement, the prescription coming from the prescriber through to the dispenser, but including information going to the patient about that prescription that is coming, if there is a shortage or unavailability of product, some options, or at least informing them so that they have the ability to have a conversation, either with the prescriber or with the pharmacy, on alternatives, also giving them more patient selection, understanding about price of prescription, and affordability. There are a lot of things for which we can start creating a better ecosystem where traditionally, our technology healthcare has let the patient sit on the side and wait for the information to come to them instead of actually involving them in the process, which, for all of us as patients, it is important to be more involved in our own healthcare.



**Shelly Spiro**

Thank you, Rick. Alexis?

Alexis Snyder

Just to echo some of what Rick was just saying, from the patient and caregiver perspective, that care coordination piece can also get lost, so I do not think that patients are always necessarily waiting on the sidelines for information. We are always waiting for information, but when we are waiting to fill a prescription and not getting the information we need about a shortage, a change of dose, or a prior authorization request, etc., we are active in that process because we are stuck in the middle, and we are quite burdened with the task of resolving these issues on our own because systems are not interoperable and speaking with each other, and when you leave the patient out of it, we also cannot help facilitate it.

So, I guess I am trying to say it is both ends. We need the information so that we can then help facilitate it, but we should not be burdened from beginning to end on trying to facilitate that process, and I will just give you a quick user case. Monthly, I have a prescription that, because of shortages, is never available in the dose that I need it in, so every single month, I have to reach out because the pharmacy has not told me, the prescriber is unaware, and I need to reach out and say, "Hey, how come this is not filled yet?", and then I find out that dose is not available.

Nobody behind the scenes has coordinated with my physician to find out where it is available, if it is not available, how we are going to change the dose, or which dose, so I am totally for the pharmacist being engaged in the process of helping make those decisions for the provider and with the provider to decide which dose is best, but the patient also needs to be in a shared decision-making process about what they want to do. Do they want to reduce or increase the dose? Do they want to switch to a different drug? But, I will tell you with this particular use case as well, sometimes that also involves getting another prior authorization or getting an override from the insurance, so all of this is, again, a push for keeping patients in the middle, but also not burdening them with having to fix a broken system and get help with the care coordination.

Shelly Spiro

Very well said, Alexis. Thank you so much. That was perfect. I really appreciate it. Well, we are almost at the top of the hour. I am going to turn it to Hans to give his last comments, and then we will close this down.

Task Force Work Planning (01:29:13)**Hans Buitendijk**

Good, thank you. So, not next week, but in two weeks, we will go on to the second part of Task 2, but as you get updates on the homework assignments, there are a couple of tabs to keep in mind. One is the very last one, with tracking of follow-ups, where the names of various Task Force members have been put on the topic on which they were going to draft some recommendations, so have a look at those. If your name is not there, we will be following up in the next couple weeks to get updates. Also, there is the Task 2 recommendation tab, where you can start to and continue to fill in thoughts and suggestions working towards recommendations. We will be working offline to see whether that may need to be adjusted in format, but until that happens, please continue to add your comments and thoughts as well there. So, thank you





for today. Really great updates, discussion, and thoughts, and I am looking forward to the follow-up on how we are going to translate those into recommendations. Thank you.

Shelly Spiro

Thank you, everyone, and for the Task Force members, please review the spreadsheet. You will have two weeks to make your recommendations for public comments, and we will be doing the follow-up, as Hans has said. Please continue to participate in updating in the spreadsheet. Thank you, everyone, and have a nice day.

Adjourn (01:30:52)

