



Indian Health Service

# Division of Diabetes Treatment and Prevention

## Helping People Be Successful with Tobacco Free Living – Part 1

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Ann Bullock:

And so I am very honored to have these excellent -- Kari Johnson, Rowdy Atkinson and Megan Woehr doing the bulk of the heavy lifting here on this topic both today, and on our part two on February 27th.

I just want to give a quick update on a couple of issues to get thing started, and the first is, I'm going to talk with just one slide just to remind everybody about the Million Hearts Initiative. This is certainly a related issue for us at Indian Health Service and across the country. Showing you just a little bit of data. I can't have a talk without some data, so I'll show you a little bit about smoking cessation interventions, both in GPRA and in our diabetes audit data. Then finally, I want to remind everyone about a key context for smoking for a lot of patients, not for all patients but for a significant number of them. Smoking is a coping strategy; it appears to deal with something very important and seemingly unrelated, but adverse childhood experiences. We'll talk briefly about that.

So the Million Hearts Initiative, many of you are familiar with it, sometimes called the Million Hearts Campaign. It is a Health and Human Services initiative which is co-led by our colleagues at CDC and at CMS. Many HHS agencies involved, including our agency, and also their private partners, the American Heart Association, the YMCA, and others; so lots of support in the private and public sectors.

The goal of the Million Hearts Initiative is to prevent one million heart attacks and strokes in the United States by 2017, and one of the key ways they want to do this is through what they call the "ABCS", which stands for appropriate Aspirin therapy for those who it's indicated, this is for not for all adults, of course, but for those with known CVD or at very high risk for it. Appropriate Blood pressure control, Cholesterol management, and Smoking cessation; and I have asterisked blood pressure control and smoking cessation because these are the two aspects of the "ABCS" that IHS reports to the Million Hearts Initiative. So we have particular requests to look at these measures and make special efforts because they help our patients and also help with this campaign.

So this is data from IHS GPRA. We all report to GPRA, those of us who are at federal sites and tribes - - who wish to contribute and many do, to GPRA. And this is looking at not the number or percent of smokers, this is the percent of tobacco using patients in our system who are offered, and have it documented that they were offered tobacco cessation intervention. So, you can see, about 12% of tobacco-using patients were offered that in 2006, and it has been a nice steady increase up to 2012 where it was a little over 35%. So as we are increasing our screening for tobacco use, and also it's helping us be aware of offering that intervention so that we can help our patients to stop using tobacco in ways that are dangerous to their health.

For our diabetes audit -- so GPRA is for all adult patients and of course our diabetes audit focuses only on patients in our system who have diabetes. Through 2013, Audit 2013, there were over 105,000 charts of people with diabetes audited. So this is looking at a lot of patients in our system. So the green line does look at tobacco use and you can see that it's fairly steady, a little bit of an increase.



Whether that's a true increase or just a reflection of more and more charts being audited, it's hard to say, but about a quarter of our patients with diabetes are documented users of tobacco. And the encouraging part here is our cessation counseling is the dark blue line and you can see that it was kind of going up a little bit sort of like the smoking line is, but then suddenly in 2011 up to 2012 and into 2013, a nice jump up to where a little over a half of our patients who were documented tobacco users are getting cessation counseling. So this has become something we are all aware of and we can see that it's being reflected in our audit data. So this is wonderful.

So, I want to just talk just for a couple of minutes about a context for smoking because it's very easy to get judgmental towards people who smoke or who dip tobacco. Here in the South where I'm at, there are a lot of people who use oral tobacco as well as smokers, and it's easy to be judgmental and to think, "Well, gosh that's a sort a dumb thing to do. Why would anyone do that? You have to have been hiding under a rock for the last 30 or 40 years to not know that using tobacco is bad for you."

So looking at this whole issue, it's critical to realize that there is a larger context, and this is a nice quotation from fellow North Carolinian actually, Redford Williams in JAMA a few years ago, saying that "growing up in such conditions could teach the child with parents with lower social economic status or poverty that the world is a hostile, depressing and alienating place, and the child could also learn that smoking, consumption of larger amounts of alcohol and food help reduce the resulting distress." Meaning that smoking, drinking and food are things that people do to help cope with difficult circumstances, and they use them because they work to help them feel better.

We know that from the Adverse Childhood Experiences (ACE) study and those of you on here, many of you may have heard me talk about this before, maybe you have seen this exact slide, but it's always amazing the many contexts in which adverse childhood experiences come to play a role, and smoking is one of them once again.

So, just a quick reminder that the ACE Study was done among the HMO enrollees with Kaiser in California. It was a co-study done between CDC and Kaiser, and over 17,000 HMO enrollees participated in this, which was not a small study, it was huge. And instead of asking whether people had a difficult childhood, they ask simply whether any of eight categories of adverse childhood experience had occurred to them before the age of 18. And those eight categories are listed there: physical, emotional, or sexual abuse, growing up with a substance abusing, mentally ill or incarcerated family member, ever seeing your mother beaten, and having your parents separate or divorce during that time. So, you had an ACE score, so to speak, not by the number of episodes, but by the number of categories of adverse experience that occurred to you. So if you had experienced physical, emotional and sexual abuse, but none of the others, that would be an ACE score of three, and so on.

So in this HMO population, almost two-thirds of these participants said yes to at least one of those, which was shocking at the time to the people doing the study because no one had ever asked those kinds of questions before in such a study. And then someone got the bright idea, Mary Koss, our colleague, to do a similar study among seven tribes in the Southwest and asked those tribal members similar questions to the ACE study, and 86% said yes to at least one of those things. So, we know that in our situation and you can see the Native and non-Native numbers there or some of those key ACE experiences, they're very high for both. The non-Native numbers are from the Kaiser study and the Native numbers are from the study in the Southwest, and that American Journal of Preventive Medicine citation is a study on the Native population. Tremendous high numbers for all of these kinds of experiences and four or more categories of ACE that's here at the bottom and you can see that 6% of the Kaiser group said yes to having had at least four of those types of experiences, whereas a third of ours did.

So from the Kaiser study, we know that if you have an ACE score of at least four, four or more, you're four to twelve times more likely to be dealing with alcoholism, drug abuse, depression, and suicide

attempts as an adult. You're also two to four times more likely to smoke, to have gotten pregnant as a teenager and so on. Huge risk factors, including a risk for being severely obese. In fact, it's what they call a strong graded or straight line relationship at all levels of adverse experience. Meaning that having an ACE score of seven is worse than ACE score of six, is worse than five and so on. But there is risk even with an ACE score of one versus having none of these.

So, there is something very powerful about these adverse childhood experiences, including increasing the risk for smoking. We know from many other studies since the ACE study that indeed the same pattern has been found in prospective cross-sectional and other types of studies besides just retrospective studies like ACE.

So this is just an example of one other study. This is looking at across 10 countries of different cultural and socioeconomic status. Adults in these countries who experience at least three childhood adversities, more or less equivalent to what is on the ACE study that the risk for having diabetes is almost two-thirds greater and more than twice for having heart disease. In fact, the risk of having at least three childhood adversity experiences is a risk similar to the association between cholesterol and heart disease, and almost as strong as it is for smoking and heart disease.

So this is a very powerful influence on people's health and on their coping strategies, including smoking.

So this is a slide from Valerie Edwards who was one of the ACE study authors, and it's a little hard to see, I'm sorry it's a little small perhaps if you're looking at it on the small screen. But what this is showing is that as you go up in ACE score from zero to one to two to four or more, that the risks on the left of initiating smoking at younger ages and on the right for being a smoker at the time that you answered the questions as an adult goes up in stair steps right on up with the number of your ACE score.

So as these study papers talking about ACE say, that current smokers than who consciously or unconsciously use nicotine as a pharmacological tool to alleviate the long term emotional and psychobiological wounds of adverse childhood experiences may need special assistance to help them quit. Such assistance includes recognition of the use of nicotine to modulate problems with affect or emotion, treatment of the residua of these adverse experiences and the use of nicotine or antidepressant therapy. I dare say that a few of our smoking cessation programs have taken this advice to heart to realize that there is a much larger, broader, deeper context for smoking and other things we like to think of us being health risk behaviors.

So if indeed, many of the health risk behaviors we like to shake our fingers at our patients and lecture them about -- maybe a lot of them are actually stress relievers, and so I just want to leave you with this last thought that maybe telling our patient to stop them without trying to help them heal or at least address the underlying stress and trauma issues and/or at least identifying other coping strategies to replace the one you're trying to get them to quit, will only increase their stress further and make it even more likely that they will return to that coping strategy, smoking or whatever it is, when difficult things happen for them in the future. Maybe this is part of why we don't always have the success we'd like to see in the long term, anyway, with conventional behavior change programs, whether it's getting people to quit smoking or to make changes in their diet and exercise patterns and so on.

So I just wanted to start off the webinar with this realization and reminder to us all that smoking is definitely a coping strategy, it just has some nasty side effects that create risk for disease as we know. So with that, I will say thank you again for joining us and I will turn this over to my excellent colleagues to talk more about these different issues with tobacco.

Thanks very much.

Kari Johnson:

Okay. This is Kari Johnson. I am a registered nurse working at the Pine Ridge Indian Reservation in Pine Ridge, South Dakota. I had years ago completed the Mayo Clinic Nicotine Dependency Seminar, and most recently about five years ago the Tobacco Treatment Specialist Training with the University of Arizona. In my nursing practice, I do tobacco cessation in the home and I was a member of the Tobacco Task Force when it was up and running a few years ago. But that's enough about me.

I'm going to talk a little bit about traditional tobacco, just with my PowerPoint slide here. Elders teach that tobacco is the first plant the Creator gave to Native people. It is strictly used for spiritual, cultural and ceremonial use, and this type of tobacco was grown or traded for spiritual and/or medicinal use. And the third point there, when tobacco is smoked in a traditional pipe it's usually inhaled in the mouth only and released into the air. The smoke is meant to carry the prayers to the Creator. It is not to be ingested, and often tobacco is mixed with other herbs and sometimes the things that are smoked do not contain actual tobacco at all.

Commercial tobacco is manufactured tobacco. It is sold by corporations for profit and it's used for recreation and habitual use. We know that it comes in the form of cigarettes, pipe tobacco, roll your own cigarettes, cigars, chewing tobacco, snuff, and of course all our national brands of tobacco that we see advertised on TV.

My next slide is just a comparison slide of traditional versus commercial tobacco. As you can see, traditional tobacco, elders have used to tell traditional stories. Tobacco has sacred properties and it is very powerful to the Native people. It contains the power to heal if used properly and also contains the power to harm if it is used improperly. Commercial tobacco, as I said before, is cigarettes and cigars, chewing tobacco, pipe tobacco, it contains nicotine which is the addictive substance that is added to tobacco and it creates a health hazard to our Native people.

There is no known risk of cancer or other health effects associated with traditional, sacred or ceremonial use of tobacco.

On the next slide, I'm talking about the levels of intervention. The U.S. Public Health Service Clinical Practice Guideline, "Treating Tobacco Use and Dependence" in 2008 defines minimal, brief and intensive interventions in tobacco dependence treatment. Minimal intervention, it lasts less than three minutes. Information is provided through educational materials. There's usually no significant personal interaction. So this will be your health fair setting or where you're seeing masses of people that just pass through. You might have only a couple seconds with them, actually. The advantage of this is you can get a lot of people the information, and it doesn't cost very much, it's inexpensive.

The brief intervention is a low intensity counseling session that last between three and ten minutes and it uses the Five A Model; and I'm just going to be briefly go through this. We'll touch base with this a little bit more intensively in the next few slides. But you need to ask if they use commercial tobacco every time you see them and you would document this in the health factor, in the EHR. Advise them to quit using commercial tobacco, using the education codes as documenting. Assess their willingness to make a quit attempt and how we would do that is ask them to if they're ready to quit within the next 30 days. If they say yes, you're going to assist them in making that quit attempt by setting a quit date, identifying some support people, some problem solving resources, self-help materials and maybe a possible referral to intensive services. And you are going to arrange for follow up contact, that might be a phone call, it might be a visit, for me a home visit. And then, also, just discuss briefly pharmacotherapy and depending on the different service units throughout IHS, some places have nicotine patches and gum. Here in South Dakota, we have to refer them to the Quitline from the state to get Chantix, which is a medication to help them quit.

And then the intensive intervention, which consists of four or more visits, with a total contact time greater than 40 minutes. It has been scientifically proven that it's more effective than the brief intervention. You have multiple providers providing help for this patient and they're certified in some type of tobacco treatment module. Different coping skills are used; motivational interviewing, problem solving, social support, coping skills, and then you really delve into the pharmacotherapy, talking to them about using nicotine patches, gum, different oral medications that can be used. And this can be done either in-house if a program were referred out to local programs or quitlines. The counseling sessions can be individual, group, or telephone, and we recommend intensive interventions including established programs such as the American Lung Association's Freedom From Smoking. And there are some Native specific programs available, the Second Wind developed by the Muscogee (Creek) Nation Tobacco and Prevention Control Program.

Rowdy Atkinson:

So my name is Rowdy Atkinson, I'm going to be presenting on the Five A Network and then kind of an example from Whiteriver Service Unit. To introduce myself, I graduated from Idaho State University as a pharmacist in 2004 and I have worked as an officer in the Indian Health Service for over nine years, and seven of those have been spent at the Whiteriver Service Unit in Arizona. I am a pharmacist case manager for the Healthy Heart project since 2011 and also an instructor for the University of Arizona's Basic Tobacco Intervention Program. I've helped to certify over a hundred healthcare professionals in basic tobacco intervention.

This slide right here on the intensity of intervention. Kari introduced this nicely. As you see, the level of intervention as it increases and that intensity increases, so does the quit rates, more successful as more time is spent. So here is again an outline of the Five A Model. This can be used in not only tobacco but also for screening with drugs and alcohol and other abuse situations. There is also a fifth A, and we've already highlighted the Five As, there's a fifth A not on here which is "anticipate."

We see a lot of young individuals and those can be sometimes as young ten or even younger, that are kind of testing the waters in this tobacco and drug. So anticipate early use, that way we also screen for those young kids as well to make sure that they have education as well as that they're asked about these situations.

The idea of the Five A Model is to treat the Ask like a vital sign. So just like you would measure blood pressure at every single visit, you would also ask about tobacco use at every visit. We encourage you to keep it simple. So I highlighted three important questions: "Do you smoke or chew tobacco? Have you ever used commercial tobacco? Are you exposed to someone else's smoke at home or at work?" And that's part of the Ask. Again, every opportunity, if you can train your staff, whether it's pharmacy, whether it's medical, nursing. If we're asking, we are going to be able find out. If we don't we ask, we don't know.

The second step in this Five A Model is "Advise," and it's important that you're personalizing that advice. If you're talking to a lady who is pregnant that is coming in, a sample would be, "Did you know that quitting tobacco is the best thing you could do for your baby's health?" So it becomes more personal. If they are struggling with a respiratory infection, "Did you know that quitting tobacco is the best thing you can do for that cold?"

The third step is "Assess." Assess their readiness to change. As you can see, this is a behavioral change model and at any point, people can change in this model. So if they are in the quit stage, they can relapse, they can go into the staying quit. They can even go down on the termination stage, but at any point they can relapse. Again, this is why it is so important to ask at every visit because if you are not assessing at each visit, then you're not going to know if they have relapsed. So, assessing again,

people that are ready to make a quit date especially within the next 30 days usually have the highest success in quitting.

So I'm going to share the experience from Whiteriver Service Unit, much like Dr. Bullock had highlighted, in 2010 our documentation of tobacco counseling on those that were actually using tobacco. The counseling part of it was pretty low, whether that's the fact that we weren't documenting it or whether we were just asking and maybe we said something, but we just didn't document. Either way it doesn't happen if it's not documented.

So in 2010 our counseling rates were 11%, much similar to the rest of the country as Dr. Bullock had highlighted. At that time the GPRA goal was greater than 30% and so our -- Dr. Clark, one of our physicians here saw this as a problem and collaborated with pharmacy, Healthy Heart, to improve these intervention rates. So here is kind of what we did over a couple of year period, 39 members of the medical team were certified as basic tobacco intervention specialists. These include nurses, health techs, a couple of providers, as well as pharmacists that were certified. Also, we utilized a health tech template and so this is actually now available as a national template and our health techs use it right in their screening template, right next to blood pressure is also tobacco screening. So they're actually doing a lot of the asking and assessing and then the provider can see if they are ready to quit and carry it from there.

Also, pharmacy started a cessation clinic and we have an open enrollment. So even if somebody hears about our clinic and they come to the pharmacy, we can help them and then we will work on getting a referral in the background, but we will not deny them access just because we don't have a referral yet. We will work on that in the background. And the last thing we did was education, and that was given to the community through -- we did a town hall meeting, and then we do radio shows every other week at Healthy Heart over at the KNNB radio and we did some shows on tobacco intervention and highlighted the importance of quitting tobacco as well as the resources available in our community.

So, many of you out there are on the electronic health record, and I apologize if you're not, but this is some snapshots of our electronic health record. If you haven't clicked on full screen, make sure you do so, otherwise these numbers are going to be -- it's going to be hard to read. So as you see, this is the health tech template and you can look just right under the vitals, right where the arrow is pointing, you can see that tobacco use screening is right in this health tech template. When they click on the health tech template, you can see that there are two main assessments and that's tobacco use as well as tobacco exposure.

Then the next thing, when you click on "tobacco use assessment" that will pull up for different health factors. So when GPRA looks at the tobacco status, health factors are going to be accounted for. If you haven't added these health factors, then it's not going to show up in your GPRA numbers as well. So the first arrow there shows that this patient was a current or former smoker and then they also never use smokeless tobacco. So every option is available and I happened to click on this one. Under that I was able to clarify how often they smoke. Patient currently smokes every day. Then as you see, there's the education, that the health tech will provide them education. They'll ask, assess and advise them to quit. If they're willing to quit in the next 30 days, their provider will get that message as well and so they will be offered a referral to our pharmacy clinic to receive additional help. As you see right there under the referral part, clicking that will take it straight to the pharmacy template for the referral. There's the template right there for the pharmacy referral. So the health tech, it's a real simple and we'll fill that out and the provider will then sign off on it when they see the patient.

This is just to show you in EHR, these are automatically populated, and so the education is populated, the health factors are populated, and so you've satisfied GPRA, but more importantly we're asking at every visit and doing something about the tobacco, challenging them to quit.

So from the Whiteriver Service Unit, you can see on the top there the percent of tobacco users. This is kind of similar to what Dr. Bullock had highlighted. There was an increase in tobacco and I think that's more because we were documenting and asking more and it's actually started to go down now. And then the other thing I'll highlight here, just for the sake of time is the percent of users, the second column there, percent of users counseled. We were at 11% and this was amongst our diabetic population. I think our general population was around seven and we are now, when I just ran the numbers, 92% which is pretty significant. Not only are we asking, but we're also seeing some of the tobacco rates going back down.

This was a wonderful experience. We've learned a few lessons. You must ask. You must document. Having a cessation clinic for referrals improves success and it lightens the load of our already busy primary care providers. Then certifying frontline healthcare personnel is key to improving intervention rates and GPRA numbers.

Megan Wohr:

Good afternoon everyone! This is Megan Wohr; I'm the Chief of Pharmacy over here at the Phoenix Indian Medical Center. But in my previous life from 2005 until 2011, I was the Tobacco Control Task Force Coordinator where we worked to develop assistance change model for tobacco control, which included the basic tobacco intervention skill certification that Rowdy was referring to earlier, and that was through the IHS Division of Epidemiology and Disease Prevention.

Looking back at what Rowdy has been talking about as well as Kari and Dr. Bullock, the reality is that tobacco interventions are adaptable to the surrounding environments or the healthcare systems that we're all used to working in and our patients are being treated in.

When we're addressing commercial tobacco abuse, we should be implementing strategies that will foster a positive change, thus providing tools for the patient and the provider to allow them to succeed. When you're looking at the big picture, we want to do just as Rowdy was saying, screen everyone for tobacco use. Look at the tools that you are using. Nowadays it's more EHR than paper driven, but looking at how they're set up, looking at the way that's most easily set up, looking at who should be documenting; is it best at triage, is the system designed where it should be asked by the provider, one of the other nurses, should it be done by a pharmacy when they are receiving their medications. How is your system designed that you are going to be able to capture as many patient as you can, to get the statistics that you need?

We also want to be able to educate providers. We want to help providers understand why this is so important. Most of the time providers do, but a lot of times we get that blanket response of, "Well, they know that they should quit. They know that it's not good for them." There is more to that just as Dr. Bullock was stating earlier, that we really need to make sure that we are addressing and getting down to the depth and peeling off the layers to see why these patients have started in the first place and why they can't quit.

The other thing is to make sure that we're giving these patients the resources that they need; what can we offer, what cessation services can we offer within our facility, what else do we know that's nearby that we'll be able to utilize, do our patients like on one on one counseling, do our patients like group counseling, what is going to be the most effective for our patient population? And when we can, cover the cost of the cessation services or the medication. Most often, the facilities will have at least one or two products that we'll be able to utilize as far as medications are concerned from the pharmacy perspective. We tend to find it a little bit more difficult when it comes to the cessation services themselves. Sometimes maybe your behavioral health department can get involved, or here at the Phoenix Indian Medical Center, our health educators are very much involved in this cessation class process.

Then also look at your policies. Most of us now, all the IHS quite obviously are tobacco free campuses. But where else? What are we doing to either enable our patients to still be able to have access to areas to smoke or what are we doing for our employees? How are we educating all of our employees on the cessation services that are out there, what they can use to help them be successful if they are smokers themselves, or share with the patients?

Go back, this way, for one second. So, I'm going to skip two slides over, and if you pull this in the full screen also, this will give you some of the resources that might be of use to you all. This is something that was developed with the University of Arizona Healthcare Partnership in conjunction with the IHS Tobacco Control Task Force. If you go on to the website, which the link is in the middle of the sheet, you'll be able to click on any one of those resources and be able to download them. Some of them are able to be ordered through [nativeamericanprograms.org](http://nativeamericanprograms.org), which is the Spirit of EAGLES Mayo Clinic Clearinghouse for our materials. But otherwise, these are housed specifically on the University of Arizona Healthcare Partnership website. You are more than welcome to email me if you are having a hard time with the link, I can share more. But these are all materials that have to do with, for the patient. There's also some that are provider resources and then also some books like our field book which is on there. It's kind of our cookbook for looking at the process of how you would implement a tobacco control, or tobacco treatment program within your facility, or what other resources might be available to your use.

Then just as a follow up, this is a two-part presentation as we discussed before. The next one is actually on the 27th, I apologize, not the 25th. But part two is going to get more in-depth into the intensive intervention side. We are going to look at the medications that are used to treat tobacco dependence, the techniques for the interventions and the counseling to help people be successful in quitting. Understanding that it's not always a one attempt thing for the patients to quit, it often takes our patients at least six attempts to be successful at quitting. How to help those patients stay quit, and then also look at other tobacco issues that may be out there, more specifically the chewing tobacco is one -- a lot of our patient in population you will see utilize that as well. And then our new one that keeps coming to the surface these days is the electronic cigarettes. So those are all the things that we'll be addressing in the February 27th presentation.