

Dr. Anthony Fauci

[Music]

Moderator: Welcome to Conversations on Health Care with Mark Masselli and Margaret Flinter, a show where we speak to the top thought leaders in health innovation, health policy, care delivery, global health, and the great minds who are shaping the healthcare of the future.

This week, Mark and Margaret speak with Dr. Anthony Fauci, Chief Medical Advisor to the Biden Administration's COVID team and Director of the National Institute for Allergy and Infectious Diseases at the NIH. Dr. Fauci, talks of the remarkable science behind the mRNA vaccines, efforts by the U.S. and G7 to distribute a billion vaccines around the world and the threat of the Delta Variant, causing surges in the UK, Germany and the U.S.

FactCheck.org's Managing Editor, Lori Robertson checks in, looking at misstatements spoken about health policy in the public domain, separating the fake from the facts. And we end with a bright idea that's improving health and well being in everyday lives.

If you have comments, please email us at chcradio@chc1.com or find us on Facebook, Twitter, or wherever you listen to podcast. Now stay tune for interview with Dr. Anthony Fauci here on Conversations on Health Care.

Mark Masselli: We're speaking today with Dr. Anthony Fauci, Chief Medical Advisor for the Biden Administration's COVID-19 team and Director of the National Institute for Allergy and Infectious Disease at the National Institute of Health which he has lead since 1984.

Margaret Flinter: Dr. Fauci has directed research on HIV AIDS, on SARS, Ebola, Zika and now COVID-19. His team has been researching the science behind the mRNA vaccine for years. Dr. Fauci, welcome back to Conversations on Health Care.

Dr. Anthony Fauci: My pleasure, good to be with you.

Mark Masselli: You know we're just a few weeks away from July 4th President Biden has set really a great goal of 70% of Americans receiving at least one dose of the vaccine by that date. And I think it's fair to say we are on the 10 yard line or it seems like we're pretty close. I wonder if you could talk about the collective effort that made this possible. And also it seems to me without the mRNA vaccine what this remarkable and elegant science has put together, we may not be where we are today.

Dr. Anthony Fauci

Dr. Anthony Fauci:

Thank you very much Mark. Well I think certainly with regard to the latter question Mark, it's true. We have been very fortunate that the investment that has been made in basic and clinical biomedical research both in the platform technology namely mRNA among others, as well as the proper configuration of the immunogen, the spike protein and it's right confirmation to be highly immunogenic has lead to spectacular success with vaccines in the sense of high, high degree of efficacy in the clinical trial and effectiveness in the real world setting. So that's you're absolutely correct, if we did not have that successful investment that went back decades, we would not where we are right now, that's for sure.

With regard to the implementation of the vaccine plan, President Biden has made this a very, very high priority, literary from the very first day and even before he was inaugurated. And it has to do with mobilizing all of our assets to get people the convenience of being vaccinated. Community vaccine centers, federally qualified health centers, 40,000 pharmacies no longer needing a computer to sign-up, just go in and get vaccinated; mobile units to go out. But also creating what's called the Community Corps, which is the corps of individuals who will be trusted messengers to get out into the community, a greater degree of outreach to the Brown and Black community. I mean I myself have probably spent I mean dozens and dozens of interviews like this with leaders of the Black clergy, the Black community, the Black business community, Black sports figures just to make sure that we get Black and Hispanic people there, understanding why it's important to get vaccinated.

So this success that we're seeing where we have 50% of the adult population already vaccinated, 64% of the adult population receiving at least one dose, is not an accident. It happened by a lot of effort.

Margaret Flinter:

Well, you know Dr. Fauci, I don't know that we as a country as a people have ever learned so much, so fast, put into action so many things and pivoted to make it work, couldn't agree with you more and we couldn't have done it without the science that led up there. So we're very excited about how successful all of our vaccination efforts have been here in the United States. But with the window on the world, it is such a, just huge tragedy to see how difficult this is, in so many parts of the world. The G7 Summit leaders announced a donation of 870 million vaccine to the world's poorest countries and that came right after the Biden Administration donation of 500 million.

Dr. Anthony Fauci

But tell us about this effort to get vaccines to billions of people around the world who are in greatest need. Is there a chance that that will be effective on a global scale, the way it's been able to effective on a national scale? Is there an infrastructure there to take those vaccines and get it into the arms of the people in those countries?

Dr. Anthony Fauci:

Well, Margaret, that's a good question, because there are two elements to getting the global response. One is the doses themselves is to scale up particularly in those companies that have the capability of scaling up by putting a major investment. I think we can do that. I believe that we can get billions and billions of doses in the next year or two. We want to do it as quickly as a we possibly can.

I think what President Biden's first step towards that was really a very, very important move because as he said when he landed at the Air Force base in the UK that America is back. And that means back in our leadership role. So when we do something like 500 million doses, the rest of the world follows up, because we're not going to be able to do it alone. The United States is not going to be able to take care of the rest of the world, alone, but we can be an important leader in doing that.

The second part of the point you're making is a very good one. What about the capacity, the absorptive capacity of these countries? And you know let's look at the history of what we've done globally with vaccines with polio, with small pox, with measles. What we've done with PEPFAR and the global fund with drugs, to individuals in developing countries particularly in Southern Africa has been very successful. So although one might think well, many of these poorer countries don't have the capacity, you'd surprised what they can put together. So I've faith that if we get them the doses they will be able to implement the program.

Mark Masselli:

You know you had said to us before that the coronavirus expect mutations out of it, we see the Delta variant is leading to spikes in hospitalizations in the UK and Germany and elsewhere, but the good news in Paris is that the vaccines have shown some promising protective nature about at least that variant. Trying to connect at least for our audience, the importance of what we just talked about in terms of this policy to make sure that we're addressing the global pandemic, because when people aren't vaccinated these variants will continue to mutate. What do you worry about in terms of variants in the population that's unvaccinated around the

Dr. Anthony Fauci

globe and how that impacts the United States?

Dr. Anthony Fauci:

Well, Mark, a couple of very important issues you bring up. I think the first one that we're fortunate and that the vaccines that we have available right now work quite well against the variants, including the 617, because we know now from the study from the Pfizer drug at least that it's about 88% effective. So we're in good shape with regard to the vaccines that we have.

Getting back to the issue, is that a global pandemic requires a global response, is really important, because as you're correctly saying, if we get the level of infection very low and we get the overwhelming majority of the population vaccinated in the United States, and a large proportion of the rest of the world particularly in the lower and middle income countries are not vaccinated, that is a sure fire way to generated additional new variants. And we may not be so lucky the next time around that the variant that emerges is one that our vaccine is able to cover. It may be that it eludes the protection of the vaccine. So we've been fortunate thus far but we can't count on being so fortunate forever, which means we've got to get the rest of the world vaccinated.

Margaret Flinter:

Well, on the front of getting everybody vaccinated we're excited to move down to the 17 and old group and then the 15 years old, we're vaccinating the 12 and up kids now, very exciting. And know that the trials are going on to look at approving children as young as 5 and that might come as soon as September, I understand. What kind of data are you seeing in terms of safety and efficacy for young children? And also number of doses, are we, do we have any reason to think that kids will need boosters, that adults will need boosters. What do you think we'll see?

Dr. Anthony Fauci:

Well, a couple of questions there, first with regard to adolescence the 12 to 15, we have clear cut data on that that it works really very well. And the original Pfizer study had essentially a 100% efficacy in that group of adolescence from 12 to 15, it's really, really good. Thus far the safety profile looks really quite good. You'll always have a very rare adverse event but if you look at the risk benefit of adverse events compared to the benefit of the vaccines overwhelmingly in favor of the vaccine.

With regard to boosters, you know we will likely need a booster shot for durability of protection not necessarily for the higher protection, because these vaccines work very well. But unlike measles vaccine which is essentially lifelong protection,

Dr. Anthony Fauci

we probably are not going to see that. So a likely after a year or so we don't know what that's going to be Margaret, whether it's going to be a year or a year and a half. So we likely will need a boost. Whether it's going to be a regular boost or just maybe once every few years, we don't know. We're doing the studies now to determine what the need would be #1 and what the right boost approach is.

Mark Masselli:

Dr. Fauci, I'm wondering if you can give some advice to health care organizations like ourselves that are trying to address our staff's concerns and also to deal with the science. Many of us are laying out standards that require people like we do with the Influenza shot to be vaccinated except for religious or medical exemptions. Do you have some advice to health care organizations all across America on the standards they should employ?

Dr. Anthony Fauci:

Well, you know that is as you probably well know Mark, it's going to lead a lot of controversy because the idea about mandating vaccines it's not going to be done centrally, by the Federal Government. But I'll guarantee you that there are going to be organizations maybe universities and colleges, maybe airliners, maybe cruise ships and certainly certain healthcare organizations might in fact mandate that you've to be vaccinated. In fact there was a recent lawsuit that you know where they tried to prevent a mandate of vaccines and it turns out the lawsuit was lost and people really had to get vaccinated if the institution that you're associated with requires it. I think it's going to vary greatly from state to state, because already some Governors are trying to get laws through that says you can't mandate vaccinations.

Margaret Flinter:

Well Dr. Fauci, I wonder if I can get you to comment on another area that I know has been of great interest and concern to you and that's minority representation and research over the years. Certainly we've seen the impact on minorities during the COVID pandemic, but we also want to make sure that there is minority participation in the COVID vaccine trials. And I know that that has been somewhat successful. But I understand that you're seeking a much broader role for communities of color at the NIH with the All of Us Research Program. And we wonder if you could just take a minute to talk about what's going on there and why that's so important?

Dr. Anthony Fauci:

Oh yeah, I mean the NIH has made a major commitment you know not only for minority representation among us but for minority health. An equity you know we have an institute, the

National Institute of Minority Health Disparities which in fact is devoted completely to guaranteeing that we have the wherewithal to make sure that all disparities that are addressed right upfront in a very serious manner. So the NIH is taking this really very seriously, from the Director right down to the people in the trenches.

Mark Masselli:

That's great. Talking about public health you know we're in the midst of doing mass vaccinations and those are starting to roll down now, we're doing more door-to-door, but talk about the infrastructure that we need to have in place. We have a childhood vaccination distribution program in America, we don't have one for adults, wondering what your thoughts are about, how we learn from this gap that we had in terms of the investments that we need to make in our public health departments and our public health departments?

Dr. Anthony Fauci:

Well, you just hit something that is very, very important. You're absolutely right, the infrastructure for childhood vaccines is infinitely better than any infrastructure. So we've got to integrate the idea of adult vaccines right into the healthcare system. You know many physicians are doing that right now, by making sure in encouraging their patients, but that's their patients, you've got to have an infrastructure that goes beyond requiring a physician. You've got to be there available to be able to give vaccines for people who don't necessarily have the accessibility of a physician that they could call up. So we have a ways to go Mark, because we haven't solved that issue yet, of a structure to get vaccines like COVID-19 vaccines and Pneumococcus and Zoster and all the others that we need to adults to get.

Margaret Flinter:

Dr. Fauci, I know we don't have much remaining time with you. But I have to say it's been 40 years since HIV AIDS was declared a health threat, we've been on that journey with you over these last 40 years since the beginning. And I think that you've predicted a cure is possible within 10 years and you pointed the dramatic scientific collaboration around COVID as proof of what can be accomplished. What say you, about this, do you think this is possible 10 years?

Dr. Anthony Fauci:

Well you know I think there are two issues with regard to HIV AIDS, one is the vaccine. And I think what we have learned from the extraordinary technologies that have allowed us to succeed with COVID-19 vaccines are going to be readily applicable to HIV. I think HIV vaccine work and attempts is going to get a very positive shot in the arm from the work that's been done with COVID-19. It's going to be a little bit

Dr. Anthony Fauci

more problematic with the cure, I mean we have spectacularly effective drugs against HIV, one pill a day and you can suppress virus to below detectable levels, something we wouldn't have imagined you know in the beginning of the outbreak. But to actually eradicate it from a person I think it's doable but it's not going to be easy, but we'll continue to try.

Margaret Flinter: We've been speaking today with Dr. Anthony Fauci, Director of the National Institute for Allergy and Infectious Disease at the NIH and a Chief Medical Advisor for the Biden Administration's COVID-19 team. You can learn more about his vitally important work by going to www.niaid.nih.gov or follow him on twitter @NIAIDnews.

Dr. Fauci, thank you for your life long dedication to eradicating infectious disease for your heroic work in the face of this pandemic and for joining us again on Conversations on Health Care.

Dr. Anthony Fauci: Thank you very much Mark, thank you Margaret.

Mark Masselli: Well Margaret, we are so fortunate to have Dr. Fauci on again, third time around the virus. He joined us back in February 20th of 2020 which is a long time ago.

Margaret Flinter: Long time.

Mark Masselli: And I think one thing that stuck out in my mind is when he reminded us of the number of travelers from China to the United States, this is just before all heck broke loose in the United States, but he said, there were 20,000 people a day who came. We knew the virus was going to hit all over the country and it did.

Margaret Flinter: Yeah, I'd say he was something of a prophet. And a prophet who spoke in about as clear voice as anyone we had ever heard in science who really understands that people need to know, they need to hear the science, it needs to be understandable and that there is course of action to take. And he has really been with us every step of the way throughout this pandemic.

Mark Masselli: And I think one of the things that remarkable in addition to all of his work in the science that he brings, what a humanitarian he is. He makes the point that he has spent an enormous amount of time with the Black and Brown populations leaders in this country to make sure that every citizen, citizens that we care so much about here at our community health center are reached by this vaccine. And make sure their voices are heard by leaders within their own community.

Dr. Anthony Fauci

Margaret Flinter: That's right and not just here in the U.S. but I really appreciated him when we asked about what's happening globally and even if we give 500 million doses from the U.S. and 850 from the G7 summit. Can people deliver this vaccine into the arms? And I really appreciated his clear respect for the developing and under resource countries that they have figured out how to deal with measles and small pox and polio. And that they really, we would be surprised I think is what he said, we would be surprised just how much talent there is there for getting done a job that just has to be done.

Mark Masselli: Right we hope you all join us for another episode of Conversations on Health Care. Peace and Health.

[Music]

Mark Masselli: At Conversations on Health Care, we want our audience to be truly in the know when it comes to the facts about healthcare reform and policy. Lori Robertson is an award winning journalist and Managing Editor of FactCheck.org, a nonpartisan, nonprofit consumer advocate for voters that aim to reduce the level of deception in U.S. politics. Lori, what have you got for us this week?

Lori Robertson: When President Joe Biden announced plans to reduce U.S. greenhouse emissions by 50% by the end of the decade, he provided a few examples, but no detailed plan about how that would be achieved. Nonetheless, speculation by a British tabloid that it could include reducing beef consumption lead to a wave of outrage from Republican Officials and Conservative media. Republican Representative Lauren Boebert tweeted that Biden's plan included "cutting 90% of red meat from our diets by 2030." She added "Why doesn't Joe stay out of my kitchen?" But there is no such plan. Agriculture Secretary Tom Vilsack said there was no plan by the administration to reduce beef consumption.

On April 22nd during remarks at the virtual Leaders Summit on Climate, Biden said, some of his infrastructure plan will help the U.S. cut greenhouse gases in half by 2030. That's compared with emission levels in 2005. Biden talked about infrastructure for clean technology, capping abandoned oil and gas wells, reclaiming abandoned coal mine, stopping methane leaks and auto workers building electrical vehicles. He didn't mention beef or cattle ranching which does account for some greenhouse gas emissions.

But a story in the Daily Mail speculated that Americans might have to cut back on eating red meat by 90% citing a Michigan

University study. The study considered diet scenarios that would reduce greenhouse gas emissions including one in which 90% of beef consumed in the U.S. were replaced with plant based alternatives. But two of the authors of the study told Yahoo News that they didn't know of any connection between their study and Biden's climate plan.

While Republicans and social media users piled on with posts about not being able to eat hardly any burgers, it was all a fake controversy. It is true that livestock operations particularly cattle farming contribute a significant amount to greenhouse gas emissions. The UN estimates that globally 14.5% of all human caused greenhouse gas emissions are due to livestock and cattle represent the majority of that.

A 2019 UN climate change report concluded that reducing red meat consumption would lower greenhouse gas emissions and promote better health. But Agriculture Secretary Vilsack said there is no effort to limit beef consumption on the part of the White House or the USDA. And that's my fact check for this week. I'm Lori Robertson, Managing Editor of FactCheck.org.

Margaret Flinter:

FactCheck.org is committed to factual accuracy from the country's major political players and is a project of the Annenberg Public Policy Center at the University of Pennsylvania. If you have a fact that you'd like checked, email us at www.chcradio.com, we'll have FactCheck.org's Lori Robertson check it out for you here on Conversations on Health Care.

[Music]

Margaret Flinter:

Each week Conversation highlights a bright idea about how to make wellness a part of our communities and everyday lives. When Venture Capitalist and Shark Tank co-host Mark Cuban decides to sink a couple of hundred thousands of dollars into your business idea taking a very small percentage of the company in return, you are probably onto something. And that's what happened to Olivier Noel, a medical student and young geneticist at the University of Pennsylvania when he appeared on the popular ABC show.

Through his research and studies Noel learned that no matter how many resources a clinical study has it is still extremely difficult to get a large sample of participants to join in studies. There are many barriers to getting a good cross section of study participants especially ethnic diversity. So he thought, what if you could simplify the process, eliminate the barriers to research participation and build up a rich DNA database for

future research all at the same time. And he created DNAsimple, because he wanted to make it well simple.

Olivier Simple:

I think the idea came about right around my second year of my PhD. I was actually working at the Institute of Personalized Medicine in Hershey. And one of the key problems that I saw there is that you know there was the proper infrastructure, there was sequencing ability, there was enough funding for really amazing research projects but it ended up being a little bit of a chasing game where we couldn't build enough, strong enough cohort at first, to be able to do some of the studies we wanted. Some of the patients we were looking for, it was taking a very long time for them to come. And every day we'd be going down and talking to the you know the counselors and asking did we have patients from this background today. How many patients for that particular genetic background that we had this month?

And so I ended up going to a genetics conference at Penn actually and the keynote speaker there was alluding to a similar problem. And one of the ways they were able to contact patients was through Facebook. And so from Facebook they were able to connect with a number of patients all the way in India and organized logistics to be able to get the sample.

So the joke at the time, at the conference was that you know Facebook is the new way of doing genetics. And really that stuck with me and really one of the, sort of the light bulb went on. And I realized that that's something that we could use and leverage to be able to recruit patients differently.

So I wanted to sort of leverage DNA and particularly leverage social media to be able to build a national database where somebody did not need to be a patient or go to the same hospital or be in the same region to be able to participate in the research study and properly provide samples for research.

Margaret Flinter:

All the participants have to do is to take a simple swab of the inside of the mouth, send it in and wait to see if your specific DNA is of interest to researchers. Noel says that the company will make their DNA and disease data available to researchers studying specific diseases offering those researchers a much broader spectrum of study participants.

Ketki Karanam:

So one of the things we really wanted to do at DNAsimple is to allow for the possibility of doing longitudinal study so that you keep track, you could continue keeping contact anonymously obviously with a particular donor. And so if you're doing a

Dr. Anthony Fauci

study for example and you have the ability to collect samples now, collect samples in three months, collect samples in six months and see how that varies, which is very difficult to do if you're going to be in contact with the patient once. And so that was another key factor that we --

Margaret Flinter: And the study participants themselves receive an extra something for choosing to participate, a cash stipend for offering up their DNA to research.

Ketki Karanam: So we ultimately provide a minimum of \$50 every time somebody provides a saliva sample, which they could keep for themselves or donate it to a charity of their choice.

Margaret Flinter: DNAsimple has gotten a big boost from the Shark Tank win and they are scaling up the infrastructure to expand their DNA database to represent as broad a demographic spectrum as possible. DNAsimple a vetted database linking researchers with a broad array of participants to enhance lab research by eliminating the barriers to finding participant, now that's a bright idea.

[Music]

Mark Masselli: You've been listening to Conversations on Health Care. I'm Mark Masselli.

Margaret Flinter: And I'm Margaret Flinter.

Mark Masselli: Peace and Health.

[Music]

Moderator: Conversations on Health Care is recorded at WESU at Wesleyan University, streaming live at www.chcradio.com, iTunes, or wherever you listen to podcasts. If you have comments, please email us at www.chcradio@chc1.com or find us on Facebook or Twitter. We love hearing from you. The show is brought to you by the Community Health Center.