



**Transcript of virtual press conference with
Dr Keiji Fukuda, Special Adviser to the Director-General on Pandemic Influenza,
World Health Organization**

3 December 2009

Nyka Alexander, WHO communications office: Good afternoon. We welcome you to WHO's weekly virtual press conference, today on December 3rd, 2009. My name is Nyka Alexander. With us is Dr Keiji Fukuda, Special Adviser to the Director-General on Pandemic Influenza. Dr. Fukuda is joining us remotely from London today. He will be giving a situation update and then we will take your questions. Dr. Fukuda, if you are ready, over to you and thank you.

Dr Keiji Fukuda: Thank you Nyka. Hello everybody and again welcome to the weekly virtual press conference and apologies for not having this on camera but as Nyka mentioned I am offsite. Let me get started and I will follow the usual format by pointing out a couple of main things as well as providing an overview of the current situation. At the current period after going into this pandemic for about 8 months, it is clear that it continues to evolve and pose new challenges and raise new concerns and that we continue to face ongoing uncertainties about the pandemic.

In the face of this, WHO strongly emphasizes that continued global cooperation is really the essential basis for fighting this pandemic. And not just this pandemic but also future global public health challenges. I will come back to this point and I will give you some good examples.

In terms of where we are in the disease activity, we continue to see that most activity is in the northern hemisphere with lower levels in the southern hemisphere. In the northern hemisphere we continue to see an up and down pattern by countries. So what you see in one country is not necessarily what you are seeing in another country.

Till this point, overall, it's too early to say whether activity is peaking in the northern hemisphere and at this point it is also not possible to predict what we are going to be seeing in the spring time.

In terms of vaccination, we estimate that over 150 million doses of vaccine have now been distributed in about 40 or more countries. And again, similar to last week, so far we have not seen any unexpected safety issues emerge, and the safety profile continues to be similar to what we see in seasonal vaccines.

When I started the virtual press conference, I was emphasizing global cooperation and what I would like to use vaccine as an example to explain what this really means. What I would first like to do, is review how we got here and to make it a little bit easier to understand all the issues.

If you first go back to April, this is when the pandemic cases were first identified, and at that time of the year it was very unclear what the future severity of this pandemic would be. Nonetheless, at that time, what WHO did was immediately start initiating all possible steps to protect people. We did that based on a couple of different things, but mainly because from historical knowledge we knew how past pandemics had, really caused a great deal of disease and death world wide. We also knew and wanted to take advantage of the fact, that a large number of countries had been preparing for the next pandemic and to build on these foundations.

Several steps were taken immediately by WHO, and this included measures such as increasing levels of monitoring and surveillance around the world, raising awareness and communications around the world, and then providing professional, community and personal level guidance on protective actions that people could take. Development of these actions each involved working with a range of global partners, and this is a general principle that we follow at WHO: to be as inclusive as possible. One of the specific actions taken by WHO was to focus on vaccines. Again, there were two basic reasons, why we focused on vaccines from the very start of the pandemic. The first and most basic one is that when you are dealing with infectious diseases, it is simply true that people with some degree of immunity usually do much better than those people who do not have any immunity. People can develop immunity to infectious diseases in a couple of different ways. One of them is simply to go through actual infection, but the cost in terms of disease and death can be very high for people. So for example, if we take polio as an example, you can get people immunized to polio by letting them get infected, but this can have a very terrible price. So the alternative approach is vaccination. It is clear when you look at the Twentieth Century that vaccines have been one of the most effective and most cost-effective and safest ways to protect people against a wide range of infectious diseases. Again, these include diseases such as yellow fever, polio, measles, meningitis, small pox, and so on. There a list which goes on and on, but the idea is basically the same. It was true and is also true for pandemic influenza.

The bottom line is that when you are facing a new infectious disease, really many infectious diseases, protecting people through vaccination is a much preferable option than simply sitting back and taking a chance on infection. Now, it's clear that in this pandemic, not all people are at equal risk for severe outcomes. In this pandemic, we have seen that the deaths are concentrated in younger people and it's been concentrated in certain groups like pregnant women. They have also seen that vaccines offer a really safe and effective way to protect such people.

Now the second main reason why WHO moved very quickly on vaccines, was that based on decades of experience, it was clear that making and distributing and administering the pandemic flu vaccine was going to be a very complex, difficult and time consuming task. So from the outset it was clear that we would have to be working with multiple partners, both in the public and private sectors, and working under very tight time restrictions if we are going to be able to make and get out pandemic vaccines. Given these considerations, we did move quickly to mobilize these global partners. And so some of these partners include groups such as ministries of health, public health agencies in several different countries, physicians from around the world, and these kinds of groups and people provided WHO with critical information on who the disease was impacting, what the impact was.

We worked with over a 120 national laboratories in countries, as well as several different national regulatory agencies, both to take a look at the viruses, monitor how they were doing, and also to select candidate viruses that could be used in a vaccine. And finally we worked with the private sector, that is, vaccine manufactures. In this process, maintaining and engaging the private manufacturing sector has been a very critical step, again, because this group has the unique and essential role in the vaccine manufacturing process.

In the first place it's the private sector which makes vaccines. Most vaccines which is available in the world for all diseases are not made by the governments or by the public sectors but it's made by companies in the private sector and these companies are located both in the developed countries but also in a number of developing countries.

Also, this group that has really a unique expertise and knowledge of vaccines because of their manufacturing of the vaccines, it's essential for public health really to act as this kind of knowledge and know-how, if we are going to fully utilize and understand the products in the best possible way.

It is also clear, however, that simply making vaccines is not the end of the story, the vaccines has to be gotten out of countries, it has to be administered to people and you have to face questions, such as who do you give the vaccine to, and for what reasons. And to answer questions like this, WHO has also reached out and engaged a number of people, through groups such as advisory groups, there is one called SAGE, Strategic, Advisory Group of Experts which provides guidance to WHO on immunization issues, and we use this group to obtain additional scientific and public health guidance and how to use the vaccine. Now the members of SAGE come from around the world, they represent various public health and scientific disciplines, but what it is is another good example of how WHO fully uses global partnerships and tries to be as inclusive as possible, to get the best possible input to make the decisions needed to move ahead when addressing something like pandemic influenza.

In summary on this main point, what I want to point out again, is that WHO has worked very closely and will continue to work closely, with all key partners, both in the public sector and in the private sector to get the input which is needed really to develop the best public health actions. We actively embrace the idea, that working with a broad coalition of partners, in this instance really a global coalition of partners, is essential for handling these kinds of threats. Now this approach is definitely necessary for the current pandemic, but I think it's also clear that it's going to be necessary for the future global health threats as you can appreciate I think, that we have been a very highly interconnected and fast-moving, globalized world now, and WHO considers that working in isolation is really not an option. We really need to fully utilize all capacities around the world to address these kinds of issues. Let me stop here, I think I will just open it for questions at this point. Nyka, back over to you.

Nyka Alexander: Thank you Dr Fukuda. Before we go over to questions, may I remind everyone that as usual an audio file of Dr Fukuda's briefing will be available immediately afterwards, on the WHO web site, www.who.int and a transcript will be available later today or perhaps tomorrow morning. To ask a question, please type 01 on your keypad. The first question is from Helen Branswell, Canadian Press, Helen please go ahead.

HELEN BRANSWELL, CANADIAN PRESS: Hi, thanks very much for taking my question. I'll try to squeeze in two if I could please. I heard you when you said that it is too soon to know what's going to happen in the spring but I am wondering if WHO has given any thought to when it would feel safe to declare the pandemic over. What is the mechanism for doing that, and how would you do that, and I ask, because there are certainly people who feel that this has turned out to be much less of a threat to global health than was first thought. In fact CDC has come up with this fatality ratio of 0.018, which people are pointing to suggest this is quite a mild event, and I am wondering if you could address both that notion that it's very mild, and when you feel it would be safe to declare it over?

Dr Keiji Fukuda: Sure, good questions First let me start with the second question and I will come back to the first question. In terms of the impact of the pandemic, of the important point is that, from the very beginning of the pandemic, we had pointed out repeatedly that we don't really know what the future is going to bring. And we have also noted that when we look at the Twentieth Century the

experience has been that pandemics can range from relatively mild side, to being on the more extreme side. I think at this point, it is fair to say that we still haven't fully gone through the pandemic, and that it is possible that there could be unexpected events which occur as we continue to go through.

But I think the other point is simply true that it is quite possible to have a pandemic on the milder side and if we are experiencing that, and if the number of serious cases is kept down, and this is something, again, something for which we should all be thankful.

Now in terms of how we move from a pandemic period to a non-pandemic period. Again if we look back the history for some guidance, we will see that we typically have a period in which pandemic infections are quite high. Then we go a transition period in which those newly emerged viruses, pandemic viruses, often become seasonal influenza viruses.

So to go through this, what WHO is doing is reaching out to get the best possible technical and scientific assessments of where we are. And then I think that we will also necessarily engage some of the other deliberative bodies, such as the International Health Regulations, to make some of the formal decisions needed to step away from the pandemic period and go back down to a non-pandemic period.

And then also, I think that there will be a number of questions of practical importance, related to vaccines and so on, and for some of those issues that we all could be reaching out to some of the other advisory boards that we often use such as SAGE.

Nyka Alexander: Our next question is from Jason Gale, from Bloomberg.

JASON GALE, BLOOMBERG: Hi Keiji, I would like you to talk about clinical attack rates. The November 13th WER talked about estimates of 7% to 15%. Data from sero surveys are being compiled in some countries. What is your best estimate now, of the clinical attack rate, and how does the infectiousness of the pandemic virus compare with seasonal flu?

Dr Keiji Fukuda: To provide from context, attack rates for influenza, often vary by age. And they often vary by where you are having people aggregated. So for example, typically, with influenza we see that the attack rates are highest in children. And they can be higher in groups of children when they are located in schools or located in different places where they assemble. And frequently the attack rates are lower in older people, and frequently in people who have less contact with other people. So I think that the estimates you quoted of about 7 - 15%, in general, may be reasonable. I think that there are also estimates of attack rates of about 30% in children and this would also be in keeping in what we typically see.

Now these attack rates are going to be a little different than what the seroprevalence studies show us. The seroprevalence studies will eventually probably show that in some groups the infection rates are going to be higher recognizing that some people develop illness which does not meet the symptoms and is very mild. But I think that the kinds of figures which have been quoted are probably reasonable. Thank you.

Nyka Alexander. Thank you. Before we go the next question, just to remind every one that if you have a question to ask in the queue, type 01 on your keypad. Next up is Fergus Walsh from BBC. Please go ahead.

FERGUS WALSH, BBC: Thank you very much for taking my question. Two quick questions. Firstly, when do you think the H1N1 Pandemic strain will become part of the seasonal flu vaccine, and which components of the trivalent vaccines might it replace? And secondly, on pandemic strain drift, do you have any parameters on how virulent or indeed more mild the H1N1 pandemic virus could become, are there limits to how severe it could become if it did mutate?

Dr Keiji Fukuda: OK. Again, two good questions. Let me take the first question and then I will go to the second.

In terms of the vaccines, there are a couple of different processes in groups which make substantive input into the process. There will first be the selection of what viruses should go into influenza vaccine, and this is done by a group of WHO Collaborating Centers who also work with a number of regulatory agencies. Both go through all the global data and to look at the trends and patterns among influenza viruses and then decide which viruses should be recommended for influenza vaccine.

And then normally, what goes in the vaccine itself is then decided by national regulatory authorities. So the national regulatory authorities for countries in which vaccine is manufactured will go ahead and make the recommendations for what should go in the vaccine for that country. And so they could recommend making a monovalent vaccine or a trivalent vaccine and so on.

In the pandemic situation, we also asked for SAGE to provide some overall guidance and advice on this issue, because it is an unusual period. But I expect that these are the groups that will be involved in making these decisions. I think it is not possible to second guess what the decisions will be, but they are the groups that will be involved.

Then in terms of drift. Drift is a process in which the virus mutates. And based on those mutations, the properties of the virus can change. So when we look at influenza, we see that there are examples where viruses become less virulent and less dangerous for people. For example when we look at the 1918 situation, we have seen that virus when it first came out was very lethal for people but over time became milder. But we have also seen that there are examples of viruses coming out which are relatively mild at the beginning and then over time become more pathogenic for people.

So again, there are examples of viruses going both ways. Because we fundamentally do not know and cannot guess how these viruses are going to change. I think it is not possible to second-guess what direction drift will take us. Although we fully expect that the drift will occur over time with these viruses as they do with all flu viruses. Thank you.

Nyka Alexander: Just before we go to the next question, I want to bring our media colleagues, 2 documents that we have on our website. One is on oseltamivir resistance in severely immunocompromised patients. It is the WHO investigations into two clusters of these. And there is another one - WHO use of advisory bodies in responding to the pandemic. Both of these are available on <http://www.who.int> where one can generally see all our pandemic information.

The next question is from Joseph Masselmane, Sun Media, Kuala Lumpur. Please go ahead.

JOSEPH: Dr Keiji, I would like to ask you, could you please confirm that the virus has become resistant to Tamiflu antiviral as reported in the WHO website yesterday. And cases reported in the UK and US, has already reports of a mutated strains in Japan, China, and Norway. How seriously can these mutations impact global public health? With one out of the two antivirals available currently, already facing resistance, and how profound is the disparity in terms of the drift variance in these mutations? Thank you.

Dr Keiji Fukuda. OK. Let me try to address these. It is very important point for everybody to understand clearly. Right now, WHO has been informed about 96 H1N1 Pandemic viruses which are resistant to oseltamivir. There are a huge number of influenza viruses, pandemic viruses, which are out there, and many of these viruses have been studied in laboratories, so it is only a small number of influenza viruses which have been identified as resistant to oseltamivir. So right now, it is important to emphasize that we do not see widespread resistance to oseltamivir anywhere.

However, as was mentioned, we have heard that there are oseltamivir resistance in a number of countries, in small numbers. And then again most recently, as we discussed last week, that have been some clusters of oseltamivir resistance occurring in people who are severely immuno-compromised. So right now, we still do not have anything to suggest that there is widespread resistance. Most viruses remain sensitive to oseltamivir. However, we are always concerned about the emergence of resistance among any kind of pathogens, especially pandemic influenza. It is something that we will be monitoring closely, and we will be monitoring whether there are any significant changes in the spread of these viruses. But we do not see it right now. Thank you.

Nyka Alexander: Our last question is from Richard Knox, NPR. Richard please go ahead.

RICHARD KNOX, NPR: Yes thank you very much, and hello Dr Fukuda. I want to follow up on points that Helen raised earlier. She mentioned that WHO, I mean CDC, has been calculating a case fatality rate of [0.018] percent which is about a 100 times less severe than the 1918 case fatality rate. Does WHO have its own case fatality rate or a range, and secondly, again following up on Helen's questions, can you indicate when WHO will convene consultations on transition to a post-pandemic period and what will trigger that?

Dr Keiji Fukuda: Richard, let me take the first question. No, WHO has not calculated case fatality rates based on current information. But there is a reason for that and it is an important reason to understand.

With the current pandemic, we really have data which is almost an anomaly, when we look at how influenza has been counted in the past. So when we look at the 1918 pandemic for example, the way that we estimated the number of people dying from that pandemic, was really to look at vital registry data available in the US but also in other countries. And then to use various modelling techniques to estimate how many of those deaths were related to the pandemic and not to other causes.

And this is typically the approach which is used up until the present for seasonal influenza. People do not typically count influenza deaths on a one-by-one basis. And so we do not have a lot of data on laboratory confirmed deaths for seasonal influenza. But in this current period, with the pandemic, that is the data that we have, and the reason why we have it is that there is so much interest in it. But also it is much too soon to be able to have the vital registry in death data that is typically used to model and estimate overall deaths. And so I think that it will take another one to two years, after the pandemic, for those data to be collected and for the kinds of estimates which are typically done for seasonal influenza, but also for pandemic influenza, to be done to make the estimates.

I think, that when we have those estimates, then we will be in a much better position to really talk about how does this pandemic stack up with the earlier pandemics, as well as with seasonal influenza.

So in terms of the second issue, there is no set date right now for when the transition discussions on transition will take place on more formal settings, but from the beginning of the pandemic, again, how procedures are done, what steps, what considerations, should be taken both for going up in terms of

the phases, but also going down in terms of phases, has been under discussion and under consideration. So I anticipate that at least in some time in 2010 we will be discussing this in more formal settings, more concentrated ways, to try to get the best scientific picture, of where we are in this pandemic, whether we should expect a third wave in countries to come, or not, whether we think that there is convincing information to say that we are really moving away from the pandemic period. Again, it's a little bit early to begin those discussions now, because we are still in a period where some countries in the northern hemisphere are still increasing in terms of their infections, even though in some countries as such as the United States and Canada it looks like infections and these cases are going down. That's still not true for the entire northern hemisphere, but it will have to wait a little bit longer, Thank you.

Nyka Alexander Thank you Dr Fukuda, and thank you to all the journalists online. This has been the virtual press briefing from WHO Headquarters today with Dr Keiji Fukuda, Special Adviser to the Director-General on Pandemic Influenza. I would like to remind you that there will be an audio file posted on our website shortly, and later today or tomorrow morning a transcript of the briefing. The web site is www.who.int. The next virtual press briefing should be next Thursday. Thank you again, and have a good day.