DEPARTMENT OF HEALTH AND HUMAN SERVICES

BLOOD SAFETY AND AVAILABILITY

ADVISORY COMMITTEE

Twenty-Ninth Meeting

Tuesday, May 9, 2006

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Marriott Crystal Gateway
1700 Jefferson Davis Highway
Arlington, VA 222022

C O N T E N T S

P R O C E E D I N G S

Call to Order, Roll Call, Conflict of Interest

DR. HOLMBERG: We are calling the meeting to order, the 29th meeting of the Advisory Committee for Blood Safety and Availability, the advisory committee for the Secretary of the Department of Health and Human Services.

We sort of waited for things to get going this morning. I don't know about any of you but us, who live around the area here, we had some tough commutes this morning and accidents along the way. I was told that Wednesdays are even worse than Tuesdays so we will see how tomorrow goes.

We have some unique things planned for today and tomorrow and, hopefully, each one of you has received the packages ahead of time as far as mails and then you have your notebooks in front of you.

I would like to call roll. First of all, Dr. Bracey?

DR. BRACEY: Present.

DR. HOLMBERG: Dr. Angelbeck? I know she

was traveling from Europe and hoping to be here on time this morning. So, she will probably show up a little bit later. Miss Birkofer is absent today. She will be back with us tomorrow. Dr. Bloche is going to be with us this afternoon. Dr. Dr. Duffell? Miss Lipton is not with us today. Both she and Dr. Klein are meeting with the National Heart, Lung and Blood Institute and going through their strategic plan for research. They will join us tomorrow and will be part of the working group on research agendas. Mr. Matyas?

MR. MATYAS: Here.

DR. HOLMBERG: Mr. McGuire is absent. Dr. Pierce?

DR. PIERCE: Present.

DR. HOLMBERG: Miss Pahuja?

MS. PAHUJA: Here.

DR. HOLMBERG: Dr. Ramsey?

DR. RAMSEY: Here.

DR. HOLMBERG: Dr. Roseff?

DR. ROSEFF: Here.

DR. HOLMBERG: Dr. Sandler is absent. Dr.

Sayers is absent. Miss Thomas? Mr. Walsh?

MR. WALSH: Here.

DR. HOLMBERG: Dr. Wong?

DR. WONG: Here.

DR. HOLMBERG: Dr. Bowman is working on a project up in Baltimore and he will be joining us tomorrow. Dr. Epstein?

DR. EPSTEIN: Here.

DR. HOLMBERG: Dr. Kuehnert?

DR. KUEHNERT: Here.

DR. HOLMBERG: CDR Libbyr?

CDR LIBBYR: Here.

DR. HOLMBERG: And Dr. Klein, as I mentioned, is excused for participation with NHLBI.

Just a reminder of conflict of interest, if there are any conflicts of interest during our discussions, please do state that there is a conflict of interest. Also, during the public comment period, I would also ask that if there are any known or perceived conflicts of interest that that be disclosed at that time. Dr. Bracey?

Chairman's Comments

DR. BRACEY: I would also like to welcome you all to the 29th meeting of the Advisory Committee on Blood Safety and Availability, and particularly thank the committee members for taking time away from family and work to attend to this important effort.

Today we will review evolving issues directly related to our mission of promoting blood safety, specifically looking at the impact of the mumps epidemic in Iowa and other parts of the Mid West. We will also hear from the workshop on donor deferral for high risk behavior, and there will also be an update from the FDA on bar code requirements.

However, in a departure from previous meetings, we will spend a significant amount of time on strategic planning. This committee is somewhat unique in the sense that rather than addressing issues from above solely, we also are charged with developing a vision of the safety and availability of blood in the United States.

Later on this morning the executive

secretary will offer us a review, as a parallel item, of previous recommendations of the committee and the responses that have been returned from the Assistant Secretary and Secretary. This, in part, will help lay some of the groundwork for the work that we are doing today but, again, I think in the strategic planning initiative we really want to take a look forward and think about developing an ideal system absent any specific restrictions.

One thing I would like to note is that I have spent a fair amount of time, as I know other members of the committee have commented, upon reviewing the transcripts of the previous meetings, and one I think resonant theme was that there was some concern about drift in the committee or a lack of fire in the more recent deliberations. This may be, in fact, related to the fact that we are no longer in a crisis mode but, again, I think as we reevaluate our work and the needs today we will be re-invigorated as the final result of those efforts.

Now, under the issue of availability there

have been some recent reports in the press, particularly in reference it IGIV unavailability problems. I would like to comment that the Assistant Secretary, in his letter to me which I am sure you have all read, indicated that the Department is aware and he wanted me to assure you that he and his staff are working to adjust this, including making some payment adjustments. What we hope to do as we proceed through these meetings today is perhaps to get an update on the status of the availability of IGIV and assessment of the efficacy of our system for determining whether the patients' needs are being met.

So, with that, I would like to go ahead and turn it back over to the executive secretary.

DR. HOLMBERG: Thank you. Our first speaker today will be Dr. Nakhasi, from the FDA. He will be talking to us about the FDA's current considerations on the mumps deferral.

FDA Current Considerations on Mumps Deferral

DR. NAKHASI: Thank you very much, Jerry, and thanks for the invitation to present the

current update on the mumps epidemic as well as considerations for donor deferral.

The presentation which I am going to be giving today is a culmination of several teleconferences between FDA and CDC, as well as our dialogue with the TTD, the Transfusion Transmission Diseases Committee of the American Association of Blood Banks. The update which was provided by CDC regarding the epidemic is as follows:

As of May 4, 2006 a total of around 2869 mumps cases have been reported to CDC from 13 outbreak affected states. Out of these 2869 cases, almost half--more than half of the cases have been reported from Iowa and the other half from seven other states, including Nebraska, Kansas, Illinois, Wisconsin, Missouri, Pennsylvania and South Dakota. Twelve isolated sporadic mumps cases related to travel have been reported from Colorado, Minnesota, Mississippi and New York.

Actually, you know, you don't need to read this slide. This morning's "Washington Post" had exactly the same thing written there. So, I guess

if you read this morning's "Washington Post" we can skip the slide.

The current reported numbers of hospitalizations is 35, which includes complications such as meningitis and encephalitis and orchitis. The majority of cases reported from all states are in two-dose MMR recipients. I would like to sort of add here that at the moment the AICP, which is the CDC's advisory committee on vaccination, has recommended this two-dose since 1989. In Iowa two-dose regimens were not required for grade school entry until 1991. The current AICP recommendation for children for two doses is at 12-15 months of age, and the second dose is given at 4-5 years of age at the time of entering school.

Live attenuated mumps vaccine was introduced in the U.S. in 1977 and the effectiveness of the two-dose vaccine is approximately 90 percent. So, having that background, there are cases still occurring among those recipients.

The majority of the cases so far reported are in the age group of 18-24 year-old college kids especially, but there are cases reported as early as 1 year of age, less than 1 year and more than 90 years of age but the majority of the occurrences is between 18-24.

The other fact is that between March 26 and April 23, 2006 11 persons are known to have been potentially infectious with mumps while traveling on 33 different commercial flights, involving 8 airlines. To date, out of 226 exposed passengers and crew, 117 have been followed up to 25 days and 2 cases have been confirmed which were related to mumps transmission during air travel.

The current source of outbreak is still unknown but mumps strain has been identified as a genotype G, which is the same as has been circulating in the United Kingdom since 2004, and the current epidemic in the U.K. is going on at present and more than 70,000 cases have been reported.

Now, the question we faced was is mumps

virus and is there blood transmissibility because that is what our concern is, at least in the Office of Blood at FDA. So, I will give you a little bit of background about what we know about mumps virus.

Mumps virus is a negative-stranded RNA virus belonging to paramyxoviridae family. The virus initiates infection in the upper respiratory tract, then spreads via primary viremia in draining lymph nodes, and then to the parotid and salivary glands. Infection disseminates widely to secondary viremia and can cause orchitis, arthritis, pneumonia and meningitis. However, 20-40 percent of the cases may be asymptomatic and, therefore, there is a possibility of asymptomatic viremia.

Primary transmission of this mumps virus is through droplets via the respiratory route. At the moment, so far we do not know any cases of transfusion transmission ever reported in the literature or at the moment.

The incubation period for the infection to appearance of clinical symptoms is generally 16-18 days but the range can be as early as 12 days and

as long as 25 days. Symptoms usually are resolved within 10 days. However, mumps specific antibody can be detected in serum as early as 11 days following experimental infection in humans. These studies were done in 1948.

Plasma viremia appears to be terminated with the development of humoral antibody response. However, virus appears to be present in plasma. Some studies indicate that it can also be cell associated, especially lymphocytes. So, the point is, you know, if worse comes to worst, lymphocyte reduction procedure could remove some of the virus.

Isolation of mumps virus from blood has been real and the possibility is that maybe because of the fact that there is antibody present in the blood at that time virus could be associated with antibody, therefore, it may be very difficult to isolate mumps virus from the blood. In experimental models in mammals it has been shown that virus dissemination can occur through cell-associated viremia.

Now, there are concerns regarding

potential blood transmission so we had a discussion, once the epidemic started, internally to find out what could be the potential concerns. The potential concerns are that primary contact is not always easily identified; possibly asymptomatic trace can be present in the preclinical period, during convalescence and in asymptomatic infections. Also, when illness is reported post donation, there may be infected products on the shelf and those products can go into the people and may cause adverse events. So, susceptible recipients, including adults and immunocompromised patients may be at risk for serious outcome of transfusion transmission.

So, at that point we had internal discussions as well as discussion with the CDC to see, if there was a possibility of down the road transfusion transmission, what should be in place for prevention if there was such an infection. We had discussions internally and the following things came out of that as a possible consideration for intervention:

We discussed that maybe blood banks should consider avoiding blood drives at affected colleges, trade schools and other institutions and facilities which are suggested by state and public authorities in the areas where they are experiencing mumps epidemic. The decision should be based on minimizing the risk of transfusion transmission while maintaining blood supplies adequate for medical needs. The policy should be in place for a minimum of one month after the last diagnosed case.

The consideration for intervention and donor information--donors should be provided with information by the recruiters at presentation when they come to donate, in a written format, allowing them self-deferral if they read the information, and I will tell you in a second what the information should be, and a new question should be added to the donor questionnaire to allow deferral at the time of screening. This portion was really added by the AABB recommendation after they had discussions with us.

The information should include the following: Existence of mumps in the local area; concerns about theoretical transmission by blood; and the donor deferral criteria which are as follows--donor deferral criteria: donors should be deferred for 2 weeks post resolution in case of diagnosed illness. Donors should be deferred for 4 weeks post vaccination, the reason being that vaccination has MMR, which is measles, mumps and rubella and the rubella usually has a viremic period of 4 weeks so that is why the 4-week post donation vaccination.

Donors who have contact with a mumps case or cases should be deferred until 4 weeks after the last recognized contact. Product should be retrieved from 4 weeks prior to onset of illness or 2 weeks after resolution of illness from people--you know, people after they donate blood come back and say they had an infection and, therefore, in those cases those products should be retrieved 4 weeks prior to and 2 weeks after the resolution.

The additional considerations for intervention which were added by the AABB recommendations--because the title also says, you know, what were the AABB's recommendations, they added plasma for further manufacture, source and recovered, is not affected by these recommendations because of viral inactivation procedures used to manufacture plasma derivatives because it will inactivate the virus.

Collection facilities may want to consider refraining from production and transfusion of fresh-frozen plasma from collections from institutions or locales with the epidemic mumps.

Basically, what we did was after we had the internal discussions, as I said in the beginning, with the TTD committee of the AABB they put forward a letter to consumers basically stating these possible interventions.

Lastly, I think I would like to acknowledge the contributions from the Department in the Center for Biologics, CDC, as well as the AABB task force. Thank you very much.

Committee Questions on the Presentation

DR. BRACEY: Thank you. Questions from the committee? Let me ask this question, do you know, based upon the recommendations, what the impact has been in terms of blood collections in, let's say, the State of Iowa? Is that information known or is that still in its early stages of being assessed?

DR. NAKHASI: I am sorry, I couldn't follow you.

DR. BRACEY: The impact on blood collection within the regions that are affected, is there an effort to monitor the impact of this new set of restrictions?

DR. NAKHASI: Yes, there is an effort by the blood establishments to monitor blood availability in those areas, yes.

DR. BRACEY: Dr. Epstein?

DR. EPSTEIN: I just want to comment on a few of the unusual aspects of how this set of recommendations unfolded. Hira hinted at this. These are voluntary recommendations by the blood

industry, and how they came about was that, of course, CDC and the state public health authorities made us aware of the epidemic. FDA convened the group of experts and discussed what we knew about mumps, and we engaged the industry to ask, well, what can be done.

But the basic problem here is that there is nothing highly effective that we can do. If you read the recommendations carefully, you will see that they are full of discretionary judgments. In other words, is there a mumps epidemic in the region? Is it focal such that you can identify a site where it would be warranted to avoid collection, implementing the policy consistent with maintaining the blood supply, etc.?

Why is that? It is because there is no proven transmission and there is no highly effective intervention. So, we had to allow a lot of room for judgments to be made locally.

So, I think that this is, in fact, a successful model in dealing with certain uncertainties in the context of an evolving

outbreak. I think, similar to West Nile, it reminds us that issues of concern are not always limited to conditions that have a prolonged carrier state, that when we are dealing with acute outbreaks, if there is potential for infectivity in blood--in this case viremia but it is not always a virus, of course--then interventions may be warranted.

So, these are recommendations that represent what is feasible now but, for example, history of case contact is actually rare. The blood organizations have told us that even in the outbreak regions if you ask donors if they have had contact with a mumps case, usually they just don't know. So, there is a lot of room for discretion here and I think that is partly why it is appropriate that we have industry voluntary standards because then, you know, things are not black and white. I mean, there is nothing you could enforce here because the medical directors simply have to exercise judgment whether they should withhold the blood drive.

DR. BRACEY: Thank you. Additional comments or questions? Dr. Ramsey?

DR. RAMSEY: What is the current trend of numbers of cases?

DR. NAKHASI: Actually, maybe Matt can answer that. Do you know what is the current trend? As of two days back there were 2869 cases, but it seems that there are some cases still increasing in certain areas. But Matt can tell you.

DR. KUEHNERT: Well, I can just give you a general feel. The Iowa curve is likely plateau-ing, flattening out. In the rest of the country though there are more cases so it is unclear what the epicurve is ultimately going to look like. But, you know, part of this is surveillance bias too. As you heard, a lot of these cases are in people who are asymptomatic and have no known exposure so it is just a matter of how hard you are looking. In Iowa they are looking very, very hard and elsewhere they may not be looking that hard. So, as states look harder they

will probably find it.

As Hira mentioned, the vaccination efficacy rate with 2 doses is about 90 percent; with 1 dose it is less. So, you are going to see if you have widespread exposure a lot of people being infected even if they got vaccinated. So, that is where we are at.

If I could just make a couple of comments, as far as the rationale for the deferrals, one thing that I thought was a compelling reason concerning deferring in institutions where there is a lot of mumps is that most of these people are going to be re-vaccinated to ensure that they have gotten 2 doses. So, since the deferral for vaccination is 4 weeks they are going to be deferred and that wouldn't be a great place to have a blood drive. So, apart from the idea of whether transfusion transmission occurs, that seemed to be a compelling reason to avoid drives in those areas. It is going to be harder if we have a wider epidemic to be able to maintain availability. So, that is where I think being discretionary is very

important.

The other thing, and maybe this is more of a question, is concerning some discussion about looking at transfusion transmission and obtaining samples in high exposure areas. I don't know--I haven't got an update on whether that is being done but that is really important because we just don't know. Back in the day when everyone had mumps you were not going to detect transfusion-transmitted mumps because everybody had it anyway, but now we are in a very different situation where we could look at it. So, I don't know, Hira, if you have heard about any specific concrete things being done in that area.

DR. NAKHASI: Yes, in response to that, I think we made that specific recommendation and request to the AABB task force and they were very open to that. I do not know whether they are collecting at this time but they were very open that that would be the right way to do that because this is the time to get those samples, you know, to show whether there is transfusion transmission of

mumps. My group has to follow-up with the TTD committee to see how that process is going on. But to answer your question, they were open to that idea, yes.

DR. BRACEY: Thank you.

DR. RAMSEY: Can I ask one more question?

DR. BRACEY: One more question.

DR. RAMSEY: What is going on in the U.K. with regard to the blood system there? Are they taking any steps with all those cases?

DR. NAKHASI: Yes, that is a good question. We thought the same thing and we contacted people in the U.K. Basically, we got the impression that they have not done anything specific for these cases because, first of all, as Dr. Epstein and Dr. Kuehnert mentioned, there are no definite transfusion transmission cases of this. However, whatever the processes are in place for donor deferral, they are following on that, but they have not done anything specific in response to this epidemic.

DR. BRACEY: One last question from Dr.

Pierce and then we will move on.

DR. PIERCE: Thanks. Are there any plans for a re-vaccination program?

DR. NAKHASI: Is there any plan?

DR. KUEHNERT: Yes, at least I can speak to the Iowa situation. I believe they already started re-vaccination campaigns but they are focused on the age group where the epidemic is occurring, primarily I believe it is 18-25 year-olds. So, they started a first campaign that targeted I think the narrower group, widened it to include I think 22 year-olds to 25 year-olds, and now they are considering a third vaccination campaign to perhaps target a wider group. But right now they are targeting primarily college and other institutional campuses.

DR. BRACEY: We will move on now to the next speaker. The topic is an update on FDA workshop on donor deferrals of high risk behaviors. Dr. Andrew Dayton, of CBER, will make that presentation.

Update on FDA Workshop on Donor Deferrals

of High Risk Behaviors

DR. DAYTON: Good morning and welcome. Periodically, as you know, we reexamine the criteria we use for donor deferrals and the most recent reiteration of that process has involved a workshop we held on March 8th on behavior-based donor deferrals in the NAT era, the particular stimulus for this being to reexamine the donor deferrals now that we have sensitive nucleic acid tests for many of the most important transfusion-transmitted viruses.

I am going to give you brief highlights of the workshop. I can't possibly summarize the whole workshop in the time allotted, but the highlights I have selected are the ones that are most directly connected with the debate that we are going through on what to do next. I certainly, by no means, mean to slight those whose data I haven't included.

By way of comparison, Cees van der Poel, from The Netherlands, gave us an update on basically Europe's attitude towards these issues, and informed us that the European Blood Alliance

decided not to change the present policy of permanent deferrals of potential donors who have a history of male sex with other males, or MSM. And, 15 out of 15 countries have permanent deferral of donors with sexual behavior which puts them at high risk of acquiring severe infectious diseases.

He also reported on a court case brought by four MSM against four blood banks, and they were complaining that the Equal Treatment Act forbids discrimination in offering goods or services and that MSM is a manifestation of sexual orientation. But the verdict was that there was no direct discrimination. The purpose of the selection was to prevent virus infections including HIV. Homosexual men are disproportionately affected by the selection so there is indirect discriminatory activity but, however objectively justified, it is not disproportional given the interest of the recipients of blood.

Matt McKenna, from the CDC, gave us an update on prevalence and incidence of HIV. He pointed out that there are about half a million MSM

infected with HIV in the United States. There are about 300,000 injection drug users infected with HIV in the United States. About three-quarters are diagnosed in both groups. This is important when we do quantitative models for determining what the effect of prevalence is if we change policy.

The incidence of MSM is about 2-3 percent per year in high risk and about 1 percent per year in low risk. The incidence of HIV and injection drug users is about 0.5-1 percent per year and declining in the overall prevention outcomes and risk to the blood supply.

This is a summary. It doesn't reproduce very well on the slide. This is an actual slide I lifted from Matt's talk, showing the prevalence with various behavioral categories. The two at the top are the ultra low risk, the general population of blood donors. This number, down here, is 10 percent, 20 percent, just to give you an idea of the scale. This is the prevalence in young injection drug users. This is the prevalence in older injection drug users. This is for young MSM;

older MSM; STD patients and prisoners.

The first stuff I gave you was for HBV. This is for HCV and, again, the very low risk of the general population of blood donors; young IDU; older IDU. Young MSM is here. MSM HCV isn't such a big problem. With older MSM there is a slight increase. With STD patients you get this. In prisoners there is a very significant problem.

Ed Murphy gave us an update on HTLV and I think the big take-home here is that HTLV testing is not nearly as ironclad as HBV, HCV or HIV. There are two reasons for this, one of which I will get into later. The most worrisome is that there is only one ELISA test--well, the screening involves one ELISA test and the ELISA tests are not nearly as sensitive for HTLV as they are for the other viruses so we really are much more dependent upon deferral policies for HTLV-II. It is not uncommon in various estimates of sensitivity to see numbers like 95 percent sensitivity or even 85 or 99.5, which is still not very good compared to tests for other viruses.

He also reviewed some of the HTLV risk groups. I don't think I really need to go into those details. The residual risk of HTLV-I and II hasn't been estimated since Schreiber in about 1996. It is probably still 1-2 per million units. Cold storage and leukoreduction probably reduce the risk but it is inferential data only at this point.

We had a very interesting update on HHV-8 from Sheila Dollard. She did present evidence that HHV-8 is transfusion transmitted. In her study 2.3 percent of HHV-8 seropositive blood units led to infection of the transfused patients. The criteria for HHV-8 seropositive and seroconverted were very stringent in the study so she suspects that the estimate is low.

She gave a summary of the prevalence of HHV-8 in various risk groups. For instance, in screened U.S. blood donors it is 2-4 percent. In the general population it is 2-10 percent. In men who have sex with men and who are also HIV-infected it is 40-50 percent.

I want to draw your attention to two data

points here. In men who have sex with men but who are HIV minus the prevalence is elevated. It is 12-16 percent. But in screened blood donors it is still 2-4 percent. We don't have any screening tests yet for HHV-8 so the question arises as to how effective is an MSM deferral policy for blocking HHV-8 from exposing blood component recipients.

We have calculated that having MSM deferral to 1-5 years would result in roughly a 2-5 percent increase in HHV-8 exposure to blood recipients. It is debatable whether you should worry about this size increase. You might not from a perspective of an epidemic, but if your patient is the one who gets the infected unit it can be devastating, and many of the recipients of blood and blood products are in some way immunocompromised and HHV-8 is particularly well-known for doing damage to immunocompromised individuals, particularly Kaposi's sarcoma and HIV.

I mentioned a few minutes ago about why HTLV was a problem, and one of them was that the

sensitivity of the HTLV tests was not as good as the ELISA tests for other viruses. There is another problem in that there is no redundance in HIV testing. One of the take-homes that we got from data that Mike Busch presented was the level of redundance that is provided by having a NAT test in addition to an ELISA test. The point I am making is that, of course, NAT was brought in primarily to pick up window period cases and it is recognized by the blood industry as a useful counseling tool as a supplementary test.

But it has additional value when you try to make quantitative calculations of risk, and that is that if, for some reason, the ELISA didn't work due to a primary test failure of some sort, there is a very good probability that you would pick up an infected individual with the NAT test. So, to calculate that redundance you will need to know how often do NAT tests fail and how often do ELISA tests fail.

Mike Busch did a study of this, looking at discordant results between NAT and ELISA and

basically retesting if you want to understand the basic protocol. And, the bottom line is that both tests have a primary error rate of about 1/3000. So, for HCV or HIV where there is a NAT test there is about one in a million chance of both failing at the same time. This is important when we do our quantitative models because it basically makes the test failure rate for those viruses drop out.

Similarly with HBV, you get a redundance between the HBsAg test and the ELISAs. So, HBV also has some redundance by having two tests.

Mike Busch also presented some information from a recent paper which addresses the issue--we believe it eventually addresses the issue of safe subsets. But what is it? Basically, it was a RED study in which they went back and sent query letters to people who had given blood, and they asked basically questions concerning deferral-related behaviors. Included in that were a group of MSMs and, although they shouldn't have given blood, they did. We know that happens at about a 0.3 percent rate.

They also looked at the results of the blood screening tests to see whether they had been positive or negative for transfusion-transmitted viral illnesses from the blood screening tests. They asked a series of questions about abstinence history for MSM. For abstinence anywhere between 5 years and 12 months or less than 12 months the adjusted odds ratio was 4 or 3, depending on which group you look at, for having a positive screening test for transfusion-transmitted viral illness. So, it would look as if these had a higher rate of infection than people who did not report MSM or people who had MSM only before 1977. Very interestingly, the data for abstention for over 5 years had an odds ratio that was no greater than controls.

Now, there are some caveats with this. Well, let me point out that this was also true for first time and repeat donors, which is an important thing to understand. The caveats are that this is possibly an atypical population. After all, they had already donated blood despite the deferral

policies. The suggestion is that a 5-year abstention is identified as a safe subset because there is no reason that 5 years should be safe otherwise. HIV, for instance, doesn't go away, nor does positivity for the other major viruses.

So, this underscores the value of what I think everybody would certainly like to see, which would be a prospective national study of MSM abstention history correlated with sexually-transmitted diseases and transfusion-transmitted viral infection positivity.

I have mentioned several times quantitative models. We have been developing them to quantitatively estimate risk, since about 1998, for this issue. The last time we looked at this quantitatively was in 2000. The take-home from that time was that the biggest source of risk was quarantine release errors. The blood bank gets a unit. It is sitting in quarantine, waiting for testing, and it gets inappropriately released.

At that time we based our tentative calculations on data from New York State, which had

been provided very kindly by Jean Lindon and that came from a cohort basically collected throughout the '90s. Although it was a well-designed study, I would point out that that may be a bit outmoded by now.

But one of the things we looked at this time was another mode of calculating quarantine release errors, and what we did was we looked at the biological product deviation reports, and we pulled out all of the release errors we could find that were associated with repeat reactive units.

When you do that calculation--we split it into blood centers and hospitals because the hospitals are smaller, less automated and have a log-fold greater quarantine release error rate. We were getting numbers from blood centers of 0.4/10,000 erroneously released, and for hospitals 7/10,000.

Now, I should point out that this data covers all the biological deviation product reports from 2003, 2004 and 2005--no, wait a minute, well, it was three years ending in 2005. Also, to

determine the prevalence in the quarantine during that time period of the repeat reactive units, we were supplied data for that time period by the American Red Cross so that covers about 45 percent of the blood supply for that period.

So, we had a pretty good data set. We won't say that it is ironclad but we think it is probably the best estimate. When we plugged that into quantitative models for what would be the risks you would face if you changed the deferral policy for various behaviors to 5 years or 1 year, we have the results here and I am going to just walk through them very briefly. The behaviors we looked at were deferred policy for MSM for 5 years or for injection drug users for 1 year.

I have given two columns here summarizing the percent increase in risk. This is often a source of confusion when I give this talk. We are looking at the total number of components we would anticipate to be newly released by one of these policies divided by our estimates of the current numbers which are being released, in other words,

the change in risk divided by the current residual risk to give you these percentages. These are not components, these are percentages.

So, for MSM for 5-year deferral the HIV increased risk would be about 1.7 percent over the current residual risk if we use the biological product deviation report calculations. By contrast, if we were to use the older New York State data that we used last time we would have something like a 25 percent increase in HIV risk. So, this 25 percent would be, over a background that we calculate of about 12 units nationwide being released currently per year, we would go up to something like 16. These numbers, like 25 percent, are pretty worrisome. Most people don't worry too much about a risk this size for HIV of only 1.7 percent increase in residual risk. It actually is a number that is basically on a par with increase in the amount of blood that you would be getting by increased donor pool so you could consider it a wash.

Again for 5-year and 1-year the risks for

HIV and HBV were fairly small with the current data; still troublesome with the New York data. MSM for 1 year is still pretty low, as I said. And, injection drug user--that deferral for 1 year is a different story. Again, for HIV and HBV the risks are fairly small, but if you look at the HCV and particularly the HTLV the risks are really quite daunting. So, it is a very, very different situation than the MSM situation.

I have pretty much given you the summaries. This is a quick summary of Steve Anderson's work. He determined error limits for estimates. This is for the MSM 5-year and 1-year deferral, but to give you an example here is the current residual risk. Here is the residual risk calculated for the deviation reports with error bars; and then this is the New York state with error bars. When we brought this before the Blood Products Advisory Committee in 2000 one of the things they wanted to see was what do the uncertainty limits look like in this data. So, we instituted this analysis to give them insight into

that.

Roger Dodd gave an interesting commentary in that emerging infectious diseases do not appear to have any overall common characteristics with respect to class of organism, transmission route or pathogenesis. Consequently, he holds that they cannot be considered as a homogeneous group. All transfusion-transmitted infections must necessarily have a blood-borne phase but this does not assure transmissibility by sexual or low volume non-parenteral routes. Consequently, risk behaviors associated with such transmission routes are not common to all transfusion-transmitted infections.

However--I am bringing this up because this is part of the current debate--although there is no guarantee that the next virus will be disproportionately prevalent in MSM, the real question is whether there is a high probability that such will be the case. Of course, it is unknown what the next virus will be so you can't really answer that, but you can point out that MSM

does represent a major risk factor for two of the five major screened transfusion-transmitted viral infections.

Just to take some of the highlights from Celso Bianco's talk, he was concerned about the notion of pretesting in the blood donation environment, and he pointed out that rapid HIV tests used for pretesting are not compatible with current good manufacturing process requirements for collection facilities licensed by FDA. Pretesting of first time donors will have a severe impact on blood availability, and substantial operational improvements in the past few years have reduced the risk of inappropriate release of marker positive components.

I should say, as I said before, one of the reasons we are worried about the older New York State quarantine release data is that it comes from an era when, during that era, there was a transition to more highly automated and more highly computerized systems, a transition which is still occurring in the smaller blood collection centers.

The industry has since then made tremendous progress in computerization and automation with the consequent drop in risk.

Kristen Miller gave us a very interesting talk on how problematic questionnaires were. I think certainly this audience is aware that factors impacting response accuracy include that if you are asking about sensitive or stigmatizing behaviors, you have to worry about the motivation of the person giving blood. There is literacy, how complicated the questionnaire is. Also, some of the questions can make demands upon the respondent in terms of memory problems, time frames and behavior sometime ago, and also the donor knowledge and understanding of risk.

So, if I can conclude, we are having extensive discussions with NIH and CDC to try to arrive at a consensus recommendation. There is the possibility for additional research to help us make this decision. One such study would, of course, be the national survey of MSM abstention times correlated with infectious markers.

It is technically also possible to institute, let's say, a reduced MSM deferral and monitor the blood that comes in and see what happens. Looking at the numbers we have calculated, we would be able to find out an awful lot about how accurate our calculations were and we could get some insight into whether the policy is okay. But, of course, there are very understandable negative points to making the change and then monitoring to see if it is safe.

So, we are in the middle of the debate and that is where we are today. Thank you. DR. BRACEY: Thank you. Questions from the committee for Dr. Dayton? If there are none, thank you for your presentation. Next we will hear on bar codes and machine readable data, guidance of April 2006. Judy Ciaraldi, Consumer Safety Officer from CBER, will present.

Bar Codes and Machine Readable Data,
Guidance of April 2006

MS. CIARALDI: Good morning. Thank you very much. I am going to present an update today

on the bar code rule that was just put into practice in blood and blood component or blood establishments, and focus basically on these products and the applicability of the rule to these products.

Before we had the bar code rule, our old blood component labeling regulation said that the container label may bear encoded information in the form of machine readable symbols that were approved by CBER. This meant that having machine readable information was an option.

In 1999 the IOM published a report called "To Err is Human: Building a Safer Blood System." In it they cited several studies that estimated between 44,000 to 98,000 people die each year in the U.S. due to medical mistakes. The report also said that the errors were often preventable and bar codes could help with this.

As a result of this and other reports, the Secretary, Tommy Thompson, set up a patient safety task force in 2001. One of his objectives was to apply the bar code technology used in other

industries to tracking drug distribution and to prevent medical errors.

FDA was named as one of the federal agencies to lead this effort. The outcome of the task force was an encouragement to use the bar codes to allow healthcare professionals to use screening equipment to verify that the right drug in the case of these products, blood components, was given to the right patient. The rule predicts that the number of medicine and transfusion errors will be reduced by using the bar codes. They predict 502,000 over the course of 20 years, and that there would be a great savings in healthcare cost, 93 million over 20 years.

The new bar code rule now mandates machine readable information on the label. The rule became final on February 26, 2004 and it became effective on April 26, 2004. Products approved after the expiration date have 60 days after the date that they are approved to comply with the rule. Products that were approved before the effective date have a 2-year implementation time period,

which means that by April 26 of this year blood and blood components and other products approved before the effective date have to comply with this regulation.

There are three regulations that were affected by the new bar code rule. The first one is 21 CFR 201.25. This states that the rule applies to most prescription and certain over-the-counter drugs regulated under the FD&C and PHS Acts. It also states that the minimum amount of information that is to be on the label is the NDC number, which is the national drug code number. It is a number or code that identifies each individual drug. And, the information had to be displayed as a linear bar code.

It also stated that the bar code label requirements did not apply to hospitals, clinics or public health agencies. These particular facilities are exempt from establishment registration. FDA's legal authority extends to products and not to hospitals. The rule is not going to require at this time that hospitals buy

and implement new automated bar code technology but certainly we encourage it. The hospitals that I mention over here do not include hospital transmission services that I am going to talk about on my next slide.

Another rule that was impacted was the inclusion of a new regulation, 610.17. This particular rule says that biological products must comply with 201.25. It also states that the bar code labeling requirements do not apply to devices and they do not apply to blood and blood components for transmission, and directs that these products, here, must comply with 606.121.

606.121 is the label requirements for blood and blood components. It says that the container label must bear encoded information in a format that is machine readable and approved by CBER. This particular rule applies to blood and blood components intended for transfusion and regulated under the FD&C and PHS Acts. It applies to blood establishments that manufacture, process, repack or relabel blood and blood components,

including transfusion services that pool or aliquot blood components. This particular rule does not apply to source plasma. Source plasma is exempt from 606.121.

Which products must comply? Any blood component that can be transfused to a patient and any blood component that is used to make the final transfusable component. This means that if a red blood cell will later be made into a leukoreduced red blood cell and the leukoreduced red blood cell is the final transfusable product, both the source red blood cell and the final leukoreduced red blood cell must bear the machine readable information. It also includes any aliquots, split or divided units, syringes and pooled units made from the blood components. It applies to intraoperatively collected autologous blood that is sent to the blood bank for storage and is dispensed from the blood bank to the patient, as well as any fibrin or platelet sealant that is manufactured for allogeneic use.

Certain products are exempt from this

regulation. These include products for further manufacturing use, such as recovered plasma, source plasma and source leukocytes. however, the final products or derivatives made from these source products may have to comply with the bar code rule depending on their intended uses.

Devices, as I mentioned before, are also exempt from the bar code rule, devices such as filters, apheresis instruments, blood collection sets. This is because devices do not have a standardized identification system similar to blood and drugs. FDA is taking a harder look at this to determine in the future if devices will be brought under this requirement.

Other products that are exempt are postoperative or intraoperative autologous blood collected and transfused in the operating room or the recovery room, as well as any salvaged autologous blood that is collected in this setting and is transferred to the floor with the patient, and transfused on the floor. In other words, the blood stays with the patient. It does not apply to

any autologous fibrin or platelet sealant that is manufactured and used intraoperatively, or any drainage collected in the operating room or emergency room as part of trauma care. These last three bullets represent products that are collected and used as part of the patient's treatment.

The minimum amount of machine readable information that must be on blood and blood components include a unique facility identifier. For most blood establishments that will be the FDA registration number; a lot number that relates to unit to the donor; a product code identifying the product; and the group and type of the donor.

Other bar code requirements state that the information must be on the container label. The information must be unique to the blood component; must be surrounded by sufficient blank space so that the information can be scanned correctly; and must remain intact under normal conditions of use. The rule did not specify where on the label the information is kept, just these limitations in the requirements.

You have heard me mention two particular phrases, machine readable and bar code. Currently drugs are required to have a linear bar code that meets one of a few standards listed in the regulation, such as the EAU UCC standard. Linear bar codes are established in proven technology. They are widely used. They are easily applied and recognized. They are very cost effective and, to our knowledge, there are no significant problems with using linear bar codes. We have been asked about the use of other technologies and FDA has stated that we will evaluate this in the future but for right now linear bar codes are required for drugs.

Blood and blood components are required to include information on the label that is machine readable. It did not specify a specific type of bar code symbology or any other type of machine readable technology. This will allow new bar codes and new technologies to be used for blood and blood components.

Blood components also do not have to meet

the linear bar code standard that the drugs have to meet. In other words, they don't have to meet the EAU UCC standard or any other standard described in the regs for the linear bar code for drugs. The bar codes that are currently used on blood components at this time do not meet the standard and FDA felt that there wouldn't be much gained by overhauling the whole system and that the objective of the rule was still met.

The two bar codes that are currently used in the blood establishments are the Codabar and the ISBT 128. FDA recognized the Codabar and acceptable labeling format in 1985 and the ISBT in 2000. We did recognize, however, with the ISBT that there were some issues in using this that were not consistent with our regulations so blood establishments that are converting and using ISBT must submit to us for approval for a variance to deviate from the regs for those issues.

In comments that came to our proposed rule we were asked to mandate the ISBT symbology, and we agreed that the ISBT symbology would be a uniform

bar code and it is consistent with an international standard, but if we mandated this in the regs and there were new bar codes or new technologies that came along in the future we would have to do new rule-making in order to adopt or accept those other technologies. So, we elected not to do this.

Because blood banks do get involved with preparing tissues, I briefly wanted to go over the tissue requirements for the bar code rule. The bar code rule applies to human cells, tissues and cellular tissue-based products that are subject to premarket approval under Section 351 of the PHS Act. It does not apply to hematopoietic stem or progenitor cells from peripheral or cord blood that are only regulated under Section 361 of the PHS Act. These include autologous products and products from first and second degree blood relatives.

Now, the bar code labeling regulation includes provisions for exceptions to complying with the bar code regulation. The purpose of the rule is to reduce errors and increase patient

safety. For this reason, we will not consider any requests based on financial reasons for not complying or claiming that there is a low rate of error associated with that product. We will look at requests if complying with the rule will affect the safety, purity, potency and effectiveness of the product, or if complying with the rule is not technically feasible. Compliance with the rule will be evaluated during routine blood establishment inspections.

For more information I have provided to you some links to the posted guidance that we have. The first is the link to the bar code rule. Secondly, we have posted on our web site frequently asked questions that we have received for blood and blood components. This addresses questions that we have received for aliquots and pooled products.

We have also posted a guidance to industry for questions and answers that have come in for labeling drug products. This guidance particularly deals with the NDC number, other technology, as well as the placement of the bar code.

Additional guidance can be found in our guidance documents that we posted accepting the Codabar and the ISBT. Right now we are asking industry to funnel all their questions through our Office of Communication, Training and Manufacture Assistance in CBER. I have included their e-mail. They will take their questions by e-mail.

In summary, we feel that bar codes can help reduce and detect potential medication errors by enabling healthcare professionals to check whether they are giving the right drug or blood component to the right patient. Medication and transfusion errors are a serious public health problem and we believe putting bar codes on drug products and blood components will significantly reduce these errors. Thank you very much.

Committee Questions on the Presentation

DR. BRACEY: Question, clearly bar codes and systems will help in terms of preventing errors. I guess what I am trying to get to is in that we will have bar codes on the units, what is your vision of what will make this happen? In

other words, what will actually stimulate the hospitals to use those technologies that are now available? It seems to be rather prevalent for drug use so, again, I am interested in what your vision is on that.

MS. CIARALDI: That is a very good question, and a lot of discussion was set aside for it in the final rule, in the preamble to the final rule. In the end, the discussion came along the lines that the more that bar codes are used by the blood banks and by the pharmacies in issuing the drugs and blood components, the more the hospital industry will push themselves to see that it is a good idea and they will see the benefits of it and use it.

So, right now the mandate is not coming down for hospitals to use this but we are hoping that hospitals will get pulled along with the discussions, the public discussions about the benefits of its use.

DR. BRACEY: Thank you. Dr. Kuehnert?

DR. KUEHNERT: I wanted to ask a couple of

questions. First, you mentioned tissues. So, with this bar code rule does it mean that there is the same requirement for bar codes to be on tissue products? Or, is that not required at this time?

MS. CIARALDI: They are required, but those that need to meet that are regulated under 351 of the PHS Act. So, I have divided it up into ones that need to meet and the ones under 351, the containers that hold the tissues not the tissues themselves--

DR. KUEHNERT: Right, right.

MS. CIARALDI: --but the containers that hold the tissues must bear bar codes. The ones that are not regulated under 351 but are regulated under 361 of the PHS Act right now do not have to comply with the bar code rule.

DR. KUEHNERT: Okay, then I have two other questions. One was about your machine readable information slide. Those are the elements that are required to be on the bar code? Is that right?

MS. CIARALDI: Yes.

DR. KUEHNERT: Like, you know, what

screening was done on the component, whether it was irradiated, whether it was leukocyte reduced, are those all just optional?

MS. CIARALDI: No, a part of the product name includes whatever additional steps were done to it to make it a final product, such as are those red blood cells irradiated or are red blood cells leukoreduced. The irradiated and leukoreduced are part of the product name. They are considered the proper product name.

DR. KUEHNERT: So, where it says product code, that is where it would be?

MS. CIARALDI: Right.

DR. KUEHNERT: Okay. Then, my final question to follow-up on that is as far as thinking about integrated healthcare information--I am not sure if this is relevant to bar codes or not, but is it in an HL7 compatible format if you needed to then transfer that information into an HL7 compatible system, is there any issue with that? Would there be additional requirements or is it not relevant?

MS. CIARALDI: The bar codes used for blood and blood component--I don't know if they are compatible with HL7. I remember reading but I don't remember what the outcome of that was. There was a lot of discussion in the final rule, the preamble to the final rule about the drugs and right now they are saying that--I can't remember that either, to tell you the truth. Do you remember?

DR. BRACEY: Dr. Holmberg?

DR. HOLMBERG: Yes, the ISBT working group, North American working group, has joined the HL7 working group and the whole concept with HL7 is up until there are standards it is a local handshake between the different computer systems within an HIS, Hospital Information System. So, what they are really working on now is that they are--and they have been for the last three or four years--trying to work through HL7 to make sure that it is compatible.

DR. KUEHNERT: This is really important because if want all the safety systems to work

together we have to make sure they are all in the same language. So, that is good to hear.

DR. BRACEY: Dr. Duffell?

MR. DUFFELL: Two questions. Can you refresh my memory on what the difference between 351 and 361 is?

MS. CIARALDI: 351 is the requirement for licensure; 361 is the requirement for infectious disease testing only. It doesn't involve licensure. Is that correct, Dr. Epstein?

DR. EPSTEIN: Well, it is a little bit more substantive. 361 was promulgated under the requirements for control of communicable disease but it consists of a set of regulations that deal with donor eligibility registration and good tissue practices which apply. However, those provisions are short of licensure, which means that there is no premarket review requirement.

Under part 351 of the Public Health Service Act you cannot distribute a product unless it is licensed or interstate commerce. You can't distribute it. So, there is a premarket review at

FDA. So, the 361 products do not undergo premarket review. They are, however, subject to standards and they are subject to inspections.

MR. DUFFELL: Thank you. The second question dealt with the exemptions to conditions that you mentioned. Can you give us some practical examples of where those have been granted and what they were for?

MS. CIARALDI: So far there has only been one exemption granted that I am aware of. That dealt with a product that was prepared about the time that the rule became effective. The product itself was approved but the last batch was made right at the time that the rule became effective. The last bit of product was set to expire in 2006 at the time when the rule had to be implemented for these products. So, what they asked for was the last of their lot of their inventory that was on their shelves, could they distribute that without having to put the bar code rule on. After examining all the information about it and their continuing with their practice of monitoring

postmarketing for adverse events, the approval was granted. But that is the only one that I know of right now, and it arose because it kind of fell in the time frame of when the rule was requirement.

DR. BRACEY: Dr. Ramsey has a question or comment.

DR. RAMSEY: I guess a comment and question. One, does anyone have a sense of what the proportion of blood components is in the country in which the bar code is actually being used at the present time?

MS. CIARALDI: All the major blood and blood components have some type of bar code, either the Codabar or the ISBT.

DR. RAMSEY: Right, but at the bedside, does anyone know what proportion of the actual use at the bedside would be?

MS. CIARALDI: The use of bar codes to scan in at the bedside by the hospitals, do you mean?

DR. RAMSEY: Right.

MS. CIARALDI: Once the blood is issued

from the blood bank, how is the bar code used at the bedside?

DR. RAMSEY: Right.

MS. CIARALDI: I don't know the percentage of that, what its use is.

DR. BRACEY: There was a presentation by Dr. Dzik at the American Society of Hematology meeting in December, and the numbers roughly are that out of the 4000 to 5000 hospitals in the country there may be 80 hospitals that are using these systems now. So, it is the vast minority, very small numbers. So, I think it clearly is a challenge to figure out a way to use these new tools that are available because we do have tools but we need to learn how to use them.

DR. EPSTEIN: Well, I think one step in that direction is that FDA has cleared I think three device systems for performing the automated match of the recipient and the unit. So, that should facilitate widened use but the main barrier really appears to be cost.

DR. BRACEY: You know, one thing I noted

in the information that was handed out is that health grades is a system that hospitals pay particular attention to, and I was a little dismayed in the sense that, from what I could gauge, among the 20 parameters the misadministration of blood didn't make it. That is unfortunate because the incidence of problems that they noted was low but, to me, that is sort of an indicator, a quality indicator of other things that are working in a hospital environment. And, if there is some way that we could get that--well, it is inserted but we could get that analyzed, I think that would be very important because each of those items in my hospital--I mean, there are task forces working on preventing DVTs, make sure that all persons are on aspirin--all of the things that are listed so we need to get that active. Dr. Epstein?

DR. EPSTEIN: I just want to make one additional comment about the hospital implementation of the bedside match. It has been made very clear by Ms. Ciaraldi that the codification system on the blood unit is not

identical to the codification system being used for most pharmaceuticals. This was a significant debate in the rule-making, which was whether or not to let the blood products maintain their existing codification schemes or whether to force the whole blood industry to change its coding scheme.

In the end, the decision was that we would let the blood system stay as it was as long as it was compatible with the machine readable code. But the implication is that hospitals are dealing with two schemes. And, we were assured that the technology to permit reading of two different codifications, you know, bar codes or machine readable codes. is not daunting but it does involve an investment on the part of the hospital to have readers and databases that can accommodate the simultaneous use of the two systems. The alternative, of course, would have been to mandate the one standardized codification scheme to essentially make the blood system harmonize with the pharmacy, but that would have required an enormous cost burden on the other side of the

equation, which is the blood collectors. So, this was an issue of debate and that was the resolution. But there are technology solutions; it is just that they involve a cost.

DR. BRACEY: And I think that is a very important point. In my hospital, we are actually on the cusp of implementing such a system and a real problem is the fact that you will have to have two sets of hardware to work at the bedside, and whatever we can do to try to harmonize the readers with making the necessary interpretation I think would be really, really key because I think that is going to be a significant hurdle. Dr. Holmberg?

DR. HOLMBERG: Yes, Ms. Ciaraldi, one of the things as far as I see a discrepancy is the labeling of blood products versus plasma and albumin coagulation factors. We know that there are some blood banks that do distribute some of those products, those plasma products. But, for the most part, some of that is distributed--or most of it is distributed through the pharmacy. So, in FDA's mind are those products such as IGIV, albumin

coagulation factors considered biologicals and would fall under the machine readable or would they fall under the pharmaceutical?

MS. CIARALDI: They would fall under the pharmaceutical although we would need to have the NDC code in a linear bar code. The impetus of putting the bar code on there would be by the manufacturer of the plasma derivative, the IGIV, albumin manufacturer.

DR. BRACEY: Any additional questions? Dr. Epstein?

DR. EPSTEIN: Just one more remark, which is that we are also moving in some areas toward radio frequency identification systems, and it has been recognized that for many drug products there may be an issue of the effect of the energy delivered by the radio frequency device on the product. This is an area that is just beginning to be explored, but we don't have constraints in place now. For example, machine readable code could include RFID and, you know, we need to ask whether that could affect the products.

DR. BRACEY: Thank you. Actually, there is one other thing that I thought of as well, and that is that there are systems now to allow bar code reading at the time of specimen collection, which is another problem that we see. Again, as we think in terms of strategic planning, I hope that we think of all these technological capabilities later on in the meeting. Miss Thomas?

MS. THOMAS: I don't have a question but just a comment. I understand about the cost factor that is involved, but I would really like for it to be noted that we do not want to forget about the people that need it most, the patients. Dr. Ramsey had asked about the bedside. I don't know from your perspective, but working with patients I have seen first-hand the errors in blood delivery, and I think we really can do much better than what we have been doing. That is all I would like to say.

DR. BRACEY: Thank you. We sure can. With that, we will take a break for 15 minutes. It is now 10:33 so we will reconvene at about 10:48. Thank you.

[Brief recess]

DR. BRACEY: We are reconvening. Our next speaker will be our own executive secretary, Dr. Holmberg, and he will present the progress report of recommendations made by this committee over the period of his tenure, 2001 through 2006. Dr. Holmberg?

Review of Past Advisory Committee Recommendations

DR. HOLMBERG: Thank you. Several members had asked for a review of the progress that had been made, some of the recommendations that have been made over the last few years. I went back to 2001 and did a summary of those recommendations.

I would also like to make sure that you are aware that on the web site there are recommendations. All the recommendations are there. We are in the process of putting the response letters in PDF format and also attaching them to the web page. So, if you go to that web page you will see in a table format recommendations and response on that.

But what I would like to do today is to

give you a little bit more, not just the letter response but also some of the things that have happened along the way. I think one of the frustrating things that most of the committee members probably experience is that there may be a recommendation that takes place and it may be 12-18 months to maybe 3 years before we actually see some sort of result. The thing is that in the background we are working on these issues and so we may not be able to report back specifically what has happened but we are working.

Going back to just last January when we talked about a potential pandemic influenza, there were some recommendations that were made, very clear recommendations as far as how to prepare the blood community. One of the first things was to recognize the blood and plasma system as a key element in the critical infrastructure of the HHS plan.

I have to say that we have made great progress on that. We are constantly making the Office of Public Health Emergency Preparedness

aware of blood and plasma products. We also have invited the AABB task force to be a representative on the sector of specific coordinating committee of the Office of Public Health and Emergency Preparedness.

The other comment was to assure full funding of research. The funding for some research projects is being considered and there may be some things that the working group may want to consider a little bit more. I know that there have been some articles that have come out recently about the potential of viremia in blood samples. So, this is something that maybe the working group may want to consider later.

The other thing is to target federal support to enhance global and domestic surveillance. We are working with the CDC on global and domestic surveillance. If you have read the HHS plan and the President's plan, one big pillar of that plan is actually surveillance and, if it potentially happens overseas to start with, how do we contain that influenza there until a

vaccine can be produced.

The final thing that was made in the January, 2006 recommendation was to recognize the central role of AABB task force on domestic disasters and acts of terrorism in the development and implementation of a national strategy to address potential massive blood and blood product shortages during a pandemic; assure input into a federal policy--I don't know what is happening here but I can read it from my screen--to ensure input into federal policies and communication in cooperation among state and local public health authorities and appropriate; blood collection organizations, hospitals, medical professional organizations and patient advocacy organizations.

The HHS agencies are actively participating with the AABB task force and the blood safety and availability is part of the communication working group, and the coordination is taking place through the local and state regional health administrators. So, we are continuing to work at that. We are working with

the AABB task force and all the HHS government agencies are working with the task force to make sure that we can help develop that draft plan for the blood community.

One of the recommendations that came forward at the last meeting was to develop national principles under which state and local public health authorities and healthcare providers can prioritize allocation and minimize disparities in blood and blood product availability and use during a critical shortage.

As we can all tell by the discussions that took place at that last meeting, this is a tough issue. It sounds great but trying to implement this and make sure that we can get down to the local and state level with the actual prioritization of blood products is a key issue. Again, this may be something that the working group may want to discuss.

Going back to September of 2005, there was a lot of discussion about the immune globulin intravenous, the IGIV. The recommendation was to

increase reimbursement for non-hospital IGIV therapy to a level consistent with current market pricing; consider reclassifying the administration as a biological response modifier so the administration to be higher; and then consider a public health emergency to address short-term problems and modify the current plan to change hospital reimbursement to ASP plus 8 percent, effective January, 2006.

The IGIV issue is very complex. As Dr. Bracey has mentioned in his response back from the Assistant Secretary, Dr. Agwunobi, the Department is seriously looking at this. We are constantly in communication with many of the agencies within HHS on the access and availability to the product; and reimbursement is reported monthly and is readjusted quarterly. I must say that IGIV is the only drug for which this is done, and the only problem is that there is a lag period in reimbursing so that a price that is effective right now, it may take 6 months to readjust that price but, once again, this is the only drug that this is being done for.

The other factors that have also contributed is that manufacturers have raised prices and the biological response modifier is dependent on a recommendation from the AMA, and we are still trying to get some clarification on that.

The other recommendation was to reexamine whether the current IGIV supplies are meeting patient needs; and work with Congress to establish a long-term stable and sustainable reimbursement structure.

The manufacturers have increased their distribution of the product over 16 percent since August, 2004--I am sorry, August, 2005 that should be. I am sorry. You can correct that in your notes. I must say that in the month of March there was a record level of distribution of IGIV through the various channels.

One of the other complex issues that affects IGIV is not only reimbursement but also the various channels of distribution. So, we have distribution channels of going through the encumbered market and the unencumbered market,

going through the GPOs, the distributors, especially pharmacies, and so there are a lot of different complex issues that have to be addressed.

There are also activities going on in the secondary and grey market. Some of you may have also seen that in March there was a conviction and also a penalty given to a company out of Florida, in excess of $40 million, in response to the late '90s/early 2000 situation of distribution of IGIV. We are constantly looking at the secondary and grey market, and every time I personally get an e-mail from a pharmacist I make sure that the various manufacturers are very much aware of how their product is getting into other channels.

The other thing is that we have done an analysis of the CMS claims and the claims have increased from 2003 to 2004 both in hospitals and physicians' offices. I have to put the caveat here, do claims equal utilization? We know that there has been an increase of 75 percent in claims from 2004 to 2004 in physicians' offices and that was before the AMA. We also had questions asked

and we have responded to the Ways and Means Committee of Congress.

Also, in September, 2005 we laid out the parameters for the strategic plan. I don't want to bore you with these because each one of these elements we will be discussing in a lot of detail, as you can see, but the response is that we will be discussing that in working groups and reporting back tomorrow afternoon on the progress of the strategic plan.

In may, 2005, once again IGIV. The recommendation was to declare a public health emergency so as to enable CMS to apply alternate mechanisms for determination of the reimbursement schedule for IGIV products. Also, to assist CMS to identify effective short- and long-term solutions to the problems of unavailability of access to IGIV products in all settings.

As I already mentioned, there is production availability but in different channels. One of the things with the Medicare Modernization Act is that there was a phase-in approach to the

product so there was a first phase where the reimbursement was changed in the physician's office, and then effective January 1, 2006, there was another change that took place in the hospital outpatient setting.

There is also an evaluation going on right now, with a report due at the end of the summer, from the Office of the Inspector General on the whole issue of the channels, the distribution of the products, the access and availability of the product. So, that is forthcoming and, hopefully, by the next time we meet I might be able to give you an update on that report.

In January, 2006 one of the things that we were very effective in working with CMS was to include a temporary add-on fee for IGIV. This is temporary and it is around $76 additional fee. This is an administration fee, not an actual administration but an admin fee for finding the product and the time involved in going out, searching for the various products.

In January, 2005 we talked about and the

committee made recommendations on a bacterial blood safety initiative. One recommendation was to monitor residual bacterial contamination risk and generate summary reports; provide resources for surveillance of transfusion-associated sepsis; and make additional recommendations as may be needed to maintain recipient safety.

As you can see with the response there, this is part of the strategic plan that you all put together and rolled it up into the strategic plan, and this will be discussed today.

Also, the issue of reimbursement of plasma-derived products and their recombinant analogs was discussed. The recommendation was to adopt principles to guide reimbursement. You can go back and look at those principles. It also urged the Secretary to support any proposed policy and/or legislation to address the extraordinary financial burden for these patients. One of the things that CMS did do was to add on a fee for coagulation factors at 14 cents per unit.

In August, 2004 there were discussions on

the transfusion-related acute lung injury. Recommendations included the expeditious development of a standardized definition; implementation of clinical education and effective surveillance; modeling the impact of deferral on screening interventions; and research into the etiology, diagnostic testing, epidemiology and treatment and prevention.

Some criteria have been established in a joint professional group meeting of Canada and the U.S. Also, I am pleased to say I think that at one of the last meetings we did have a report from NHLBI, talking about the granting of some funds and preexisting grants and funds being made available to add on the investigation of TRALI.

In August, 2004, we had discussion of access to treatment for rare blood disorders. The recommendation was to promote obtaining additional licensed indications for already licensed products; promote approval of products and their indications in the U.S. for European licensed products; and promote developing new products.

There was a workshop in May, 2005 that dealt with IGIV and also, in June of 2005 there was another workshop on some of the government processes, the FDA regulatory processes to get a product to market.

In August of 2004 was the bacterial detection and platelet concentrates and 7-day platelets. The recommendation was to urge DHHS to adopt strategies to expedite licensure of a pre-storage pooled whole blood derived platelet component for transfusion based on criteria of the available information.

The FDA is currently working with blood centers and manufacturers on pre-storage pooled platelets and apheresis products for 7-day approval. Later on, in upcoming meetings we can probably have an update on the status of that, but that is in the process.

Also in August, 2004 was the public health impact of implementing hepatitis B virus mini-pool NAT for blood donor testing. The committee in this particular case did not support the mini-pool

hepatitis B virus NAT for blood donations as currently conceived. The feeling was that health dollars would best be spent to expand the hepatitis B immunization program, especially in the high risk groups; and encourages the development of a multiplex direct pathogen testing on individual donations.

The response is that FDA did approve the mini-pool but did not mandate it for donor testing. The Department encourages broader HBV immunization programs, especially to the younger generation; and also the Department supports the development and ID multiplex testing.

In April, 2004 were the reimbursement issues. They reiterated the recommendations of January, 2004; endorsed the MMA conference report statement that the Secretary is directed to compile and clarify the procedures and policies for billing of blood and blood costs in the hospital inpatient and outpatient setting, as well as the operation of the collection of the blood; and timely response on the above.

A letter came out from Dr. Beato to Dr. McClellan to discuss issues presented by the committee. I have to say that in March of 2005 there were some activities. Not only did we get a response back from Dr. McClellan but also there was a publication, 100-04, for Medicare claims processing of March 2005 that clarified the blood, terminology and charges.

Also for reimbursement, April, 2004, to exclude blood clotting factors from competitive acquisition under the exclusion authority granted, and the Secretary should use his authority contained in the MMA to exclude all blood products and transfusion medicine and services from the establishment of quality standards and competitive acquisition and provisions of the MMA.

Once again, the memo between Dr. Beato and Dr. McClellan addressed some of those issues and blood is not part of the competitive acquisition provision.

In April, 2004 was the bacterial contamination of platelet products. The committee

encourages dialog between HHS agencies, blood programs and manufacturers to ensure strategies for prompt development of technologies, design and completion of feasible studies and satisfaction of licensure requirements to permit both the pre-storage pooling of whole blood, derived platelets and extension of platelet dating.

The HHS agencies joined the AABB task force on bacterial contamination of platelet products to accomplish additional guidance to the user community, and design of clinical studies and clarification of regulatory requirements of platelet pooling/extension. I am pleased to say that there are a few blood establishments that are proceeding with 7-day platelets, collecting the data for licensure of 7-day platelets, and several of the manufacturers have already had their collection bags approved for 7-day platelets.

In January, 2004 we looked at the national blood policy since this was first stated in 1974, and the committee found the goals of supply, quality, accessibility and efficiency as stated

applicable today, and recommended the development of a 5-7-day inventory, and also recommended full funding of HHS blood action plan in the area of private and government supply monitoring and increasing blood supply, and funding of the National Blood Reserve.

There have been awareness programs coordinated by the private sector, AABB, ABC and ARC, with public service announcements. This has been very effective. The BASIS monitoring program was launched this spring and we are currently recruiting participants so that we can, at the Department level, monitor the supply and demand of blood products throughout the nation. As far as some of the actions and some of the things that we may face in the working groups today, there always remains the resource issue of funding.

As far as the National Blood Reserve, the Office continues to work on this issue and one of the confusing things about the National Blood Reserve, which we may bring back to the committee later on, is that there appear to be differences of

opinion now in the private sector on the need for a National Blood Reserve. So, we would like to bring that back for further discussion.

In January, 2004 reimbursement was also readdressed. The committee urges the Secretary to address finding needs at all levels of the blood system to support product safety, quality, availability and access through targeting of additive resources and appropriate reform of the CMS reimbursement system for blood and blood products, including plasma derived therapies and their recombinant analogs.

Once again, the memo that went to Dr. McClellan addressed these issues. The publication was changed and in March of 2005 for coagulation factors there was an add-on of 14 cents per unit. Also, in 2006 there has been a temporary add-on for IGIV.

Also for reimbursement the committee recommends the Secretary direct CMS to reexamine the framework for cost reimbursement in the product area and, in the interim, provide reimbursement

based on actual cost of acquiring and providing the products.

Some of the activity has been for the ambulatory procedure codes to be reviewed and pricing on those, and also one of the things that we have done in the last year, which I think we have talked to you very briefly about and, hopefully, at the next meeting we can actually have a presentation on it, but that is of our national survey that we did. We did provide a grant to the AABB and they did a 2004 study. It was 2005 but based on 2004 data, and part of that data actually considered the cost of blood products. So, very interesting information and currently this is in the report stage and will be written up for publication, and we will report back to this committee on that survey--very interesting, the different trends in blood collection and practices, along with reimbursement issues.

May of 2003--this was actually before my time. I joined in October of 2003, but in May of 2003 CMS was to identify specific cost of blood

products within the market basket; to consolidate, simplify and review reimbursement policies; to develop timely and adequate reimbursement mechanisms. I think you see the general theme. I think over the years we have talked a lot about reimbursement and the process by which that takes place, and you can see the responses there.

Again, to identify contingency funding for unanticipated blood safety initiatives that require immediate implementation. This has been an unfunded mandate. As we all know, from time to time the FDA will approve new additional testing and then trying to make sure that that gets covered in the reimbursement cost is difficult and very often has to wait for the next cycle of price evaluation.

One of the things that we are doing, along with the various private sector--the AABB, the ABC and the ARC, is that we have worked with the Bureau of Labor Statistics to work on the market basket. Unfortunately, I think that that might be--Theresa, you can help me out here, how many years will that

be before that is done, the market basket?

MS. WIEGMANN: Too many.

DR. HOLMBERG: The answer to that was too many years. I think the answer was something like 2009 that they were thinking that they would be finished with that. So, we have a long way to go but at least we have blood and blood products on the radar for the market basket.

MS. WIEGMANN: Just one little note on that too is that once we have the BLS, even if they have that data there is no commitment whatsoever from CMS yet that they would use the data. So, that will be the next hurdle I guess.

DR. HOLMBERG: Okay. You can see that some of the transmittal of 2005 helped to clarify a lot of the issues once again.

In January, 2003 there was recognition of leading causes of transfusion-related fatalities. Hopefully, some of these issues will be discussed at today's working group and tomorrow's working group and reported back tomorrow afternoon in open session. But the committee recognized that some of

the risks that we face that we need to reduce the risk of bacterial contamination. We need to prevent errors; research that may improve safety and extend the shelf life of platelets; and research and technology practices that could reduce the incidence of TRALI.

Some of our discussions even today regarding the bar code ruling which is now in effect and also I can say that NHLBI initiated a working group on TRALI and also has supported some research funding and two specific research grants for TRALI.

Of course, some of the recommendations that have taken place in 2004 regarding the bacterial contamination issues of platelets were addressed, and I think we are moving pretty well on that factor.

Also in January, 2004, subcommittee formation, and the committee tasked itself to develop subcommittees. The charter does permit subcommittees to meet. By the way, there have been several people who said, well, are the working

groups subcommittees or working groups. According to our FACA representative, the words are interchangeable. So, because of our working today and tomorrow morning on the various topics of the strategic plan, I prefer us to call them working groups but the whole concept under FACA rules is that it has to be reported back to the full committee. Anything that is discussed, any decisions that are made in the working group of the subcommittee must come back to the full committee and be aired in an open forum. So, we will be taking notes and reporting back tomorrow afternoon.

Once again, in 2003 reimbursement regarding clotting factors, and the committee further recommended that the Secretary direct CMS to promptly revise the Carrier Manual provisions. It says no action noted here, but actually in my first 6-9 months on the job I spent a lot of time up at CMS working on some of the instructions and directions to the local carriers for reimbursement. I think, along with the procedure manual 100-04, we have made some great strides in just the reporting.

I also must compliment the blood organizations for their educational workshops that they supported throughout the country. I think that those educational workshops did a lot to help correct some of the mis-reporting that was taking place.

In September, 2002, once again reimbursement was an issue. As you can see here, it is an ongoing issue and where it says no action taken, we can work within the Department to a certain extent but you also have to understand that some of the issues regarding Medicare are congressionally mandated and so, because it is a statute, it is really a congressional issue and our hands are tied on some of the latitude that we have.

September, 2002, again reimbursement and 2002 was also public awareness. The Secretary should support public awareness of ongoing needs for routine blood donations by healthy persons; PSAs, public service announcements, visible blood donations by top officials; funding for demonstration projects; support of specific

initiatives; and play a lead role in increasing the participation of federal employees.

Secretary Thompson initiated the "Give Life, Give Twice" campaign. Secretary Thompson was very big on donations and also encouraged organ and tissue donations. Since then we have moved on with the Donation Nation to try to increase the amount of federal employees donating and, as I mentioned before, the AABB, ARC and ABC supported the public service announcements which had great impact on donations.

In September, 2002 was the monitoring issue of how do we know or what is the current availability of blood within the nation. Our system that we were using at that time was primarily a demand type system from the hospitals only. So, the new system that we have under BASIS is actually supply and demand and we will compare between the supply and the demand. The system, as we roll it out, will provide a lot of information to not only the hospitals but also to the blood centers, and it will, hopefully, help the hospitals

in some of their transfusion committee reports and also the blood centers in the utilization of products within their area. The one thing is that it is voluntary and we are requesting and recruiting participation in that at the present time.

Inventory management--as you can see here, the Secretary should support initiatives to improve management of blood inventories, including defining the roles of liquid and/or frozen reserves; integration of supply forecasting for intervention strategies; and strategies to facilitate movement of blood from areas of surplus to areas of shortage.

Some of these are the principles of the National Blood Reserve and, once again, I believe that we need to come back and readdress these issues because I am hearing comments from different parts of the blood sector concerning the efficacy of a National Blood Reserve and the intent there.

The blood community has changed the impression of worthiness of the National Blood

Reserve and Dr. Beato, at the time, also asked the committee or would like the committee to readdress the issue of frozen blood reserves and the rationale on the recommendation not to include frozen blood into this strategy.

So, I think that on "our things to do" we may want to come back sometime and take a look at the National Blood Reserve and the purpose of that, and if this is something that we should continue to go forward with.

In January, 2002, right after 9/11, for response to disasters the Secretary should act to promote and coordinate a single, consistent public message on blood issues. ESF-8, emergency support function 8 of the Federal Response Plan should be reviewed to incorporate the recommendations and organizational members of the AABB task force, and the AABB task force should coordinate the national response of the blood community, and fund the evaluation and potential development of a National Blood Reserve.

The response to that is that the Assistant

Secretary for Health is responsible for the nation's blood supply. In a time of disaster, a coordinated message will be prepared through the Office of the Assistant Secretary for Health. Also, over the last couple of years we have rewritten the emergency support function number 8. The final on that came out in December of 2004. So, for even some of the issues that took place--the hurricane issues of 2005, that ESF-8 was rewritten and it was the first time that that was utilized. As anything else, having a plan and people really utilizing the plan are two different stories. So, we are in the process of re-looking at the ESF-8 and lessons learned on what we can do better on that.

Also, evaluation of the National Blood Reserve is currently under way. As I mentioned earlier, the AABB task force does have a seat at this sector-specific coordinating council for emergency response.

January, 2004, the Secretary should recognize and incorporate the FDA's Office of Blood

Research and Review strategic plan into the HHS response plan for counter terrorism and disaster preparedness. This was done. It was incorporated to the Department's plan.

In April, 2001 was the global blood safety. The Secretary should foster research, training and standard setting activities in international blood safety including development and transfer of appropriate technologies for the developing world; and support the establishment of a mechanism to identify priorities and coordinate the exchange of information and activities among government and non-government agencies in the U.S. and the international community.

Once again, the senior advisor for blood policy, which is myself--I am involved with the collaboration for blood safety and the Office is also involved with the President's emergency plan for AIDS relief. I have to say here that one of our blood organizations, the AABB, is involved with that and has just recently been given two additional countries to work with within Africa and

we are working with our other agencies in the evaluation and the ongoing of the PEPFAR in both Africa and the Caribbean.

Also, our professional organizations, such as AABB and the Protein Plasma Therapeutic Association and also--I put this down here but I am sure that I am overlooking other organizations that we interact with, but the World Hemophilia Foundation on a global level, we are involved with them.

Once again, in April, 2004 with the blood monitoring--you know, a lot of these recommendations repeat themselves and I really won't spend a lot of time going over those but we are in the process right now of implementing our BASIS program and recruiting hospitals and blood centers.

In January, 2004, the issue of universal leukoreduction--the recommendation was made that the Secretary should strive to minimize the impact on supply; assure adequate funding for universal leukoreduction; issue a regulation to implement

universal leukoreduction that addresses these concerns; support research to investigate unresolved scientific issues in the area of universal leukoreduction; and also--which wasn't really part of the universal leukoreduction, but also that the Secretary should appoint a non-voting member from CMS.

No formal decision has been made on universal leukoreduction and research is ongoing. As far as the CMS participation, a committee member was appointed in August, 2003. Dr. Bowman has been serving on the committee in that capacity.

So, that is a highlight of some of the recommendations that we have addressed over the last five years. I hope that it is helpful and I will go back from time to time and update the recommendations. I would like to be able to, in a very simplified way, put this on the web. The problem is that once it is on the web--some of the recommendations are extremely wordy and trying to find the action items on that would be very helpful and I will try to maintain a list like this, as the

committee has requested, on the web site.

DR. BRACEY: Thank you. Dr. Holmberg, with that extensive review I think it really lays out sort of a roadmap of where the committee has been, particularly for the newer members. It also provides the opportunity, as we plan, for gap analysis to see if there are areas that have not yet been addressed that we consider to be important.

Moving on then into our planning for our session today, if you still have the power, I would like for you to give us your view of what the Secretary's 500 Day Vision is. I understand that this is not necessarily viewed as the HHS strategic plan but this is what, in essence, is a driving force within the agency, and how you would envision our strategic plan melding into that.

Secretary Leavitt's 500 Day Vision

DR. HOLMBERG: Well, we are trying to resolve some of the problems that we have had with the computer and move on with this. I appreciate the help that I am getting here. So, I think that

if you have the handouts in front of you I will just try to speak to those and we will get caught up on the slides in a few minutes.

One of the things that we have to understand is that the Secretary has a 500 Day plan and that 500 Day plan it actually identifies various issues. There are some guiding points, principles that he has to address those plans. I look at it very simply. You know, when I was doing a lot of TQM type of activities, there is a Japanese word--and I did spend four years in Japan. The work hoshin means that everybody is pointed in the right direction, in the same direction--I won't say right direction but the same direction. Okay? And, people are going in that direction to a common goal.

There is another term that is used in Japanese society, when a group comes to consensus on an agreement or a consensus on a direction, what they do is they go yo-one. So, the whole idea is we want to have a lot of yo-ones and try to determine where our strategic plan is. But the

most important thing is how do we envision where we want to see blood safety and availability go? How does that blend into the Secretary's plan?

Even with the organization of the working groups, I have tried to organize that in such a way so that it would be very helpful to see how we fit into the Secretary's plan.

DR. BRACEY: One question in terms of the plan, do you foresee that there is enough budgetary support to have a stand-alone plan developed, because these things are costly? DR. HOLMBERG: Well, that is one of the things that we need to discuss. Our resources are always an issue and one of the things also that you have to understand is that even as I have gone through a lot of these recommendations, these are recommendations from the committee to the Secretary. It doesn't mean the Secretary accepts every recommendation. So, we have to keep that in mind. As you make recommendations, as you put together a draft strategic plan, what we are looking for is a little bit more added to what was presented.

You know, we have to be a bit more concerned about the resources that would be required. That is one of the benefits of trying to get a draft that is in agreement or is lined up with the Secretary's 500 Day plan.

As you can see, many times we are all going in different directions but one of the things is that we do want to all go in the same direction and the whole idea is that the common goal is blood safety and availability.

What Secretary Leavitt developed when he developed his 500 Day plan after his appointment and confirmation--his statement was that "the President of the United States has given me a very clear mission: to help Americans live longer, healthier and better lives, and to do it in a way that protects our economic competitiveness as a nation."

The principles that he has for his vision are, first of all--and everything comes back to these ten principles so when we are looking at developing our strategic plan we really need to

consider some of these principles. That is, care for the truly needy, foster self-reliance; national standards, neighborhood solutions; collaboration, not polarization; solutions transcend political boundaries; markets before mandates; protect privacy; science for facts, process for priorities; reward results, not programs; change a heart, change a nation; and value life.

So, those are the principles. If we look at the plan that he has, the 500 Day plan there are actually six elements of the plan: transform the healthcare system; modernize Medicare and Medicaid; advance medical research; secure the homeland; protect life, family and human dignity; and improve the human conditions around the world.

Now, a lot of the things that the committee made recommendations to back in September really fall under those tops four. That is why we have organized the working groups as we have. The protect life, family and human dignity is a little bit more social aspect of things, and also to improve the human conditions around the world, and

I think the best example of what we have done within the Department and also the agencies and also the AABB, has been the PEPFAR working in both Africa and the Caribbean.

So, how does the blood safety and availability complement the Secretary's plan? Actually, when you look at blood safety and availability, in my Office probably 80 percent of what we do is to convene people together to talk about issues and to get some ideas going. We also are responsible for policy and probably a smaller percentage is actually the products, the end products such as what we have done with BASIS being our blood availability inventory system.

What I would like you to do today as we break down into working groups--I have taken the fish bone diagram a little bit differently and I would like you to try and work with this and see if you can build upon your recommendations that you made back in September. Some of the issues under transform the healthcare system are, first of all policy; transfusion practices; donor recruitment

and retention and biovigilance.

So, the question we want to ask is how or what can be done to improve blood safety and availability as part of transformation of the healthcare system. So, each of the four working groups will actually be addressing some of those. What my goal for you is, is to be able to provide back to the Department and the agencies a little bit more meat on the bone. So, for policy, a little bit more specifics of what should be part of policy development.

And, for transfusion practices, what are some of the things that need to happen in transfusion practices? Donor recruitment, biovigilance is a big one. We have talked about that a lot. So, think of that and think of adding to the bone of the fish bone diagram there. But the question that we want to ask is how or what can be done to improve blood safety and availability as part of the transformation of the healthcare system?

Now, as I went through a lot of the

recommendations of the committee over the last couple of years, a lot has been addressed to reimbursement. I realize that availability is very dependent on reimbursement and access to care. So, what we want to do is we want to look at the reimbursement issue and say what can be done to modernize Medicare and Medicaid as it pertains to blood safety and availability? What are some of the things that we need to standard up there? What are some of your recommendations to the Department to improve and modernize Medicare and Medicaid?

The other area is to advance medical research. This will be discussed tomorrow morning. Hopefully, we will have input back from Dr. Klein and also Ms. Lipton and we will hear a little bit more about what NHLBI is thinking. The question we want to ask is what research needs to be targeted to improve blood safety and availability? So, some of the two areas that you addressed back in September were a strategic research agenda and also funding for promising new technologies.

Then, secure the homeland, what can be

done to improve blood safety and availability as part of securing the homeland? There are three things that you recommended back in September, are risk communication, disaster planning and integration of blood plasma system in the public health infrastructure.

So, that gives you an overview of the four different areas that we are really going to be concentrating on over the next two days and how do we put a little bit more meat on the bones here of the fish bone diagram?

Any questions?

Committee Questions on the Presentation

DR. BRACEY: Thank you. Questions? Dr. Epstein?

DR. EPSTEIN: Just one question, not really to put you on the spot, Jerry, but under modernized Medicare and Medicaid the fish bone was devoid of entries and, yet in your own summary of the advisory committee recommendations there were quite a few strategies that were discussed and some actually recommended--you know, the market basket

idea for blood, improving the reimbursement utilization reporting system, to have contingency funding for new needs. There were actually many, many things.

DR. HOLMBERG: Thank you for that comment. One of the things that I tried to do with the fish bone was to only address those elements that were identified in the September meeting. Now, the advantage of going back and reviewing the recommendations of the committee is to pick up those areas and, as I was going through, there were many times I said the committee might want to consider these things. So, definitely I would say, you know, in the working groups go back through the recommendations and take a look at some of the things that we may want to specifically put in the strategic plan to recommend under modernized Medicare and Medicaid. So, a very good point and, again just to reiterate, go back into the recommendations. If action has not been taken on a specific area that you feel that you want to make a recommendation to the draft plan, please put this

in and attach it to the fish bone.

DR. BRACEY: Any other questions? Well, much of what I was going to discuss I think has been covered. I will just make a few comments in terms of specific deliverables or meat on the bone that I consider to be, (a) timely and where there are various elements coming together and, (b) I think very important.

One is the concept or the development of a coordinated system for hemovigilance. There is much that we have done over the years but it is very hard to get at the effect of what we have done, i.e., with bacterial screening; i.e., with use of new donor history questionnaires. Clearly, we are behind in this as a nation in that the U.K. and other countries have had some success. I won't say that they have ideal programs. So, I would see that as something that would, in essence, be a deliverable to be considered.

In addition--and this is something that actually I did not see in the committee's previous deliberations, and that is revisiting the issue of

blood conservation and alternatives. There currently are some sort of nascent organizations and, in fact, there is even a commercial organization by the name of Hemo Concepts, that are hoping to engender a sense of consideration of the appropriateness of utilization throughout the U.S. Who knows how much fat there is within the system but, clearly, if we look at blood conservation we could, in essence, shift some of the needs into more needy patients.

Lastly, I think that we need to look at the issue of technology in terms of automated systems, as we have talked before, with the ISBT labeling. It is clear that these systems will offer a savings in terms of errors that patients otherwise would not have had to suffer.

Then, lastly, I wonder--and we have talked some about it--the national blood policy was examined in 1998, a revisit of the 1970s policy. But, in truth, when we are working at a hospital level or regional blood center level the issue of distribution of blood I think is unresolved. I

know that there are imbalances within certain regions such that one hospital will have a fairly robust supply of a given type of blood and another may not. These are issues that I think a strong statement and a strong national blood policy might help resolve.

Considering the technologies that are available, one would think that we would even be able to do continuous on-line tracking of blood and blood components. I really see no reason why we shouldn't be able to do that if we could coordinate the systems to have the systems talk to one another.

So, I think as far as my tenure, the things that I really would hope that we could see come out as a product from this committee would be some improvement in biovigilance or hemovigilance; improvement in blood conservation; using the automated tools that are available and then, lastly, biting the bullet and seeing if, in fact, we need to revisit our national blood supply, that is, the national blood policy and inventory

distribution.

So, I will just kind of end with that now and then open up for questions from the committee because, again, I want to make sure that in terms of getting the meat on the bones here it is clear in terms of what the working groups will be charged with.

MR. WALSH: Specifically related to the working group activities and, as a member of the committee since meeting one, you know, I really appreciate the fact that we are taking the time in the next two days to this. I think it is going to be a very valuable exchange.

But as it relates to Dr. Dayton's presentation of the FDA workshop on donor deferrals, I would just like to go on record, if I may, as a weekly plasma user and four time transfusion recipient, that it is not apparent to me that there is any safety issue. Safety is our primary charge and it is not apparent to me that there is a reason to look at any change in the deferral at this time.

Access and availability is our second charge and it is not evident that, specifically availability, is being impacted by the current deferral regulations.

The final slide from Dr. Dayton indicated that the CDC, FDA and DHHS are going to continue to look at this situation. The Europeans have decided they are not going to change their position, and this World Human Rights Committee has determined that it is not a discrimination issue, although I don't think that is the purview of this committee anyway.

So, I am just wondering are we supposed to comment as a committee on this? Is this something we need to continue to ask the FDA for reports on?

DR. BRACEY: I think the one thing that is important, since this is a committee that is a diverse mixture of medical personnel as well as consumers, that we need to hear the consumer side. I am not sure that the consumer side has been heard and I would think that some comment would be in order. I would like to hear what the rest of the

committee members think. Dr. Epstein?

DR. EPSTEIN: Well, first I think it is important to point out that the behavioral-based exclusions, particularly the lifetime exclusions, have been reexamined multiple times already over an almost two-decade period. The reason is that they tend to be put in place before we have other effective interventions and then, once we have screening or in some cases as, for example plasma derivatives pathogen reduction, then their utility becomes questioned. So, we have in specific reexamined the deferral for male sex with males at least half a dozen times in advisory committees and workshops.

So, it is an ongoing process and I think taking a little bit broader view, coming back to Dr. Bracey's point, the big picture is that we need to continually reexamine the entire framework of the donor recruitment incentives and deferrals, that each and every specific measure has its underlying specific rationale but that the science changes. So, that is kind of the big picture.

In terms of where we are, well, you know, the workshop was the most current effort to gather information, to hear what the science of today says and to reflect on it. But I think that there is another perspective, which is that this committee is, in fact, empowered under its charter to deal with issues such as ethics and social choice and priority, and that part of the issue regarding at least the male sex with male deferral is that there is a perception of discrimination which is itself a reality that the blood centers have to deal with and that, you know, we feel that there is a need for balancing that concern against what is the primary concern, obviously, which is safety of the patient.

But, you know, we are aware. Andy didn't get into this, but there was a presentation by Ron Bayer, who is a well respected ethicist, to try to flesh out the dimensions of other social concern. But they have practical implications which is that we may well be turning off a generation of young people who feel solidarity with the gay, lesbian,

bisexual and trans-gender lifestyles and simply see our science based policies as misplaced. I think that we have to have an open mind about how we look at the issue and can we contain risks, and are there alternatives.

So, that process is ongoing. I am not trying to suggest that, you know, we are poised to make a change, only that we have an open mind to reexamine the issues on their merits.

Art, if I could be indulged just a couple more minutes?

DR. BRACEY: Sure.

DR. EPSTEIN: I just have my own remarks about what we heard. I think Jerry helped us a great deal by highlighting issues that remain unresolved in relationship to past considerations. I was sort of scribbling down and I think some of these--you know, leukocyte reduction, a slew of issues related to reimbursement through CMS Medicare/Medicaid, the issue of blood reserves and its linkage to disaster and shortage management, products for rare diseases and some steps taken but

much to be done--there was a whole set of technology issues. I think that list could be expanded--multiplex testing for infectious diseases, strategies to interdict TRALI, improvements in control of bacterial contamination, the 7-day pooled platelet and, not on the list but my recollection is that we discuss pathogen inactivation strategies and then, of course, the strategic plan itself. The new element that got added there I thought was the need for a prioritized research agenda. I mean, we have heard about a lot of other things, including biovigilance/hemovigilance. But the piece that really hadn't been on the table before was a prioritized research agenda.

Then, in terms of technologies I kind of have my own short list at the moment, which is nanotechnology, really coming to terms with pathogen reduction is feasible technology. The goal to have an antigen-free red cell or blood substitute I think would dramatically improve transfusion medicine. There are some technologies

that could be talked about. You know, the hemoglobin-based oxygen carriers or enzymes that, you know, can strip the antigens off the red cells, etc.; screening tests for TRALI; a screening test for VCJD; a malaria screening test. Under the heading of hemovigilance, hemovigilance I think we need a special focus on emerging infectious disease. Again, we have talked about that at previous meetings.

Then, just some other issues, you know, the whole issue of reexamining the donor base, in other words, how we recruit donors, why we defer donors, reentry strategies, availability or lack of availability of supplemental tests--I think all of that. Then, there in this whole underlying theme when we talk about blood availability is the issue of evidence-based practice. I think that that stands out as a huge area of unmet need. You know, there is more and more discussion of it worldwide but there is not a lot of resource that has gone into doing the studies that could reexamine practices that date back 40 and 50 years that we

take for granted and that may, in fact, not be evidence-based. Then, linked to that is the idea of product alternatives.

I would mention that there is an international organization which is the National Association of Transfusion Alternatives, NATA, which is focused on that very thing. Of course, there is the specific issue of hemoglobin-based oxygen carriers and their future.

Then, just one more, I think, large issue area which is related to evidence basis is, you know, what do you do with off-label use? We understand how you get answers through controlled trials, but once FDA licenses a product it is perfectly legal for doctors to use it off-label. In fact, it is sensible when the literature gets out ahead of the approvals process. But we do find ourselves then in an awkward situation because over time use keeps expanding and it is not always evidence-based and the products haven't been subjected to new trials for new indications. So, we find ourselves in a difficult situation where

doctors use products but we don't really know how well they work.

Anyway, I am just trying to add to this gap analysis before we go off into our working groups, and these are just sort of my personal reflections.

DR. BRACEY: That sounds good because, you know, one of the things when we put together our strategic plan it looked like most of the key elements we had, the prioritization of research clearly I think is important.

Other comments from the committee? Did we finish on Mr. Walsh's point? That is, specifically on this one issue, the MSM, what is the committee's feeling in terms of whether or not it is satisfied with where we are or do we need to, in other words, make a specific statement on the latest workshop findings? Dr. Pierce?

DR. PIERCE: I support what Mr. Walsh has said in terms of if it is not broke don't fix it. What I wonder though is for every workshop that is run whether or not the committee really needs to

take a stand, or is there some threshold for when it looks as if policies might be moving toward change that the committee should take a more active interest.

DR. BRACEY: And I sense that we really aren't seeing a significant move. We are looking at gathering data at this point, unless I have the wrong perspective on it. So, I would personally, after hearing the discussion, feel that we can observe for the moment. Dr. Pierce?

DR. PIERCE: Jay, do you agree with that point since this came about from your agency?

DR. EPSTEIN: Well, I think is possible at some future time that the Department will want the committee to look at the policy or its alternatives. I think that we are right now in a mode of data gathering and reconsideration. You know, we haven't taken any position. The reexamination that came up at the workshop isn't a signal that we are making change, only that we are periodically reexamining the issue. So, you know, from my point of view, I think it is okay for the

committee to be an observer at the moment.

DR. BRACEY: Thank you. Additional comments? Dr. Pierce?

DR. PIERCE: I have another comment, actually based on a couple of other points that Jay had made about the research agenda. What has the committee thought about over these past few years with regard to how much to promote a research agenda, and how basic it should be with regard to blood utilization?

For instance, you mentioned hemoglobin substitutes and improved red cells. You could take that further and find ways to further reduce blood utilization during surgery by doing more minimally invasive surgery, for instance, or by using other techniques such as cells or tissues that might obviate the need for surgery. What is the committee's position on these aspects of the research agenda?

DR. BRACEY: I have not been on the committee for an extended period of time, but in my view I think that is a gap right now, looking at

those alternatives, and that is something that the committee needs to focus more time and attention on. But, Dr. Holmberg, would you have any comments on that?

DR. HOLMBERG: You put me on the spot. Again, I think that is the whole idea of prioritizing, I think that is exactly what you are saying, if I understand correctly what your comments were. Or, are you asking for how basic science--are you asking for the basic science aspect of this?

DR. PIERCE: Well, it might be best to give an example. For instance, there are stem cells or stem-like cells that are going into individuals with congestive heart failure, for instance, and those are in clinical trials. If that proves to be successful, that may obviate the need for a lot of subsequent surgery that would then decrease significant amount of blood utilization in that field.

So, how far is the committee's purview with regard to those kind of technologies? They

are not that basic in that they are in clinical trial development but they are certainly more basic than anything I have described here.

DR. HOLMBERG: Well, I think that the field is wide open, and I think that what the committee wants to recommend will, hopefully, dovetail with what the Department, through NHLBI, can support. So, I think that if you feel that this is an avenue that needs to be further investigated because it does impact blood safety and availability, then I would say, you know, put it on the table and let's see where it falls out.

DR. BRACEY: Yes, I would second that. I think that anything that offers a potential needs to be discussed within the forum, particularly the research working group. There will be information brought back to us from Dr. Klein and Karen Lipton of the discussions that are actually ongoing at NHLBI right now so we could really not only accept those ideas, but also insert new ideas into what is being discussed by that group. Dr. Kuehnert?

DR. KUEHNERT: I had another point. I

just have a question about looking at use and where that fits in, because we talk a lot about transfusion practices and optimizing practice and about surveillance for adverse events, but what I am thinking about is surveillance for why physicians and clinicians use the products they do. We talk a lot also about off-label use and say, well, this off-label use happens and throw up our hands but, on the other hand, we don't have an idea of what the epidemiology of that off-label use is. So, how do we address that?

DR. BRACEY: That is an important question, and there is a body of literature that now suggests that non-infectious problems related to transfusion are resulting in worse outcomes. You know, there was a lot of research done before with the issue of filtration, but filtration aside, there is additional information and if we could promote the development of studies that would look at these outcomes--actually, to me, I was seeing a parallel in terms of one of the key elements to look at efficiency of resource utilization. I

mean, it really almost fits into that sphere. So, that is one thought I had about it. Dr. Epstein?

DR. EPSTEIN: Yes, I would just like to come back to Dr. Pierce's point and, again, these are just my personal reflections. I think the committee tends to deal with three kinds of things. We deal with controversial issues where there are difficult situations and arguments on both sides and the Department wishes to be advised.

I think that we deal with addressing threats and opportunities. In other words, what are the big picture issues in terms of things that are affecting safety and availability, and what is the nature of the threat and are there candidate interventions that need to be promoted?

Then, I think that the third domain which is really where we are going with this strategic planning is the vision thing. It is just to attempt to provide an insightful look at the larger forces that are operating and where the direction of effort should go.

So, Art, I think you said it very well.

You know, sometimes we are in the urgent mode because there is a crisis and then there is this issue of, well, shouldn't we be doing something broader in the planning mode and vision and direction?

So, that would be my answer, Glenn. Those would be the criteria that you would apply in asking yourself should we occupy ourselves looking at some basic scientific issue. I would say yes, if it fits into one of these paradigms.

Open Public Comments

DR. BRACEY: Thank you. In the interest of time, I think we should open up for public comments. We do have a public comment today--at least I have one. Is there another? Dr. Holmberg will read the letters. Dr. Whitaker, from the AABB, is here. I didn't know that she actually showed up but she is here! Thank you.

DR. WHITAKER: Hi. I am Barbee Whitaker and I am Director of Special Projects with the AABB. I will be reading a statement in support of a U.S. biovigilance program.

AABB believes strongly that there is a clear need for a U.S. biovigilance program to capture and analyze data regarding infectious and non-infectious risks associated with receiving a blood transfusion or a tissue transplant. Other countries, notably the United Kingdom, Canada and France, already have in place hemovigilance programs that provide policy makers and operational facilities with valuable data regarding transfusion risks. Because the United States, unlike these other countries, does not have a national blood program and because the U.S. population is approximately five to ten times bigger than any of these other countries, we believe that any U.S. hemovigilance program must week to coordinate and integrate the existing efforts to reduce duplication, and must be a public/private initiative to ensure that the effort is sustainable.

AABB has presented to this committee on numerous occasions about the need to invest in the collection and analysis of data regarding a host of

blood and transfusion safety issues. Absent reliable data, policy decisions regarding transfusion safety will continue to be based on incomplete data and anecdotal evidence. Today, we do not have the fully reliable data in the United States about the relative risks of transfusion, whether the risk is in an emerging infectious agent or a non-infectious serious hazard of transfusion. For example, it is widely believed that the current data underestimate the magnitude of non-infectious risks of transfusion. These underestimates are due in part to the fact that current data on non-infectious hazards are derived from passive reporting systems rather than the prospective, active investigation of blood components transfused into patients.

A study involving three major teaching hospitals in Belgium concluded that current, passive reporting systems underestimate the true frequency of serious hazards of transfusion by 30-fold. Even fatal transfusion mishaps are subject to significant under-reporting. Despite

the established occurrence of fatal transfusion-associated graft versus host disease, there were no transfusion-associated graft versus host disease fatalities reported to FDA from 1976 to 1985. As the government and private sector continue to face budget constraints, the advisory committee, HHS and blood organizations will need good, reliable data to prioritize corrective measures to mitigate transfusion risks.

The AABB has long identified the development of a national hemovigilance system as a priority. The AABB 2006-2007 strategic plan identifies the development of a broader biovigilance system as one of the primary objectives for the association. As a practical matter, however, the AABB alone cannot implement a comprehensive national hemovigilance or biovigilance program.

AABB, however, believes that it can serve aa critical role in the development and implementation of this system. AABB has a demonstrated track record in bringing organizations

and their interests together toward a common goal. Some examples are the Bacterial Contamination Task Force, the West Nile Virus Task Force, the AABB Interorganizational Task Force on Domestic Disasters and Acts of Terrorism, and the Nationwide Blood Collection and Utilization Survey.

On June 1, AABB is initiating a pilot project to collect needed early warning data regarding the threat of transfusion-transmitted West Nile virus. With our unique perspective representing virtually all of the nation's blood collection facilities, including community blood centers, the American Red Cross facilities and the hospital transfusion services responsible for transfusing most of the blood in the United States and our substantial experience in data collection, including several editions of the Nationwide Blood Collection and Utilization Survey, AABB is well-suited to collect and analyze such data. AABB is prepared to establish an interorganizational task force and work with other interested parties, including HHS and international organizations that

have many years of experience in managing hemovigilance networks, to expand this project to collect and analyze data regarding other infectious, as well as non-infectious, risks of transfusion. In the future, our larger goal is to expand such a hemovigilance program to a biovigilance program that will include data on tissues and cellular products, including hematopoietic stem cells. Our efforts in helping hospital blood banks manage tissue inventory in compliance with JCAHO and AABB standards will put us in an excellent position to accomplish this endeavor.

AABB strongly believes that the private sector transfusion medicine community needs to work closely with the government in advancing our common goal of collecting and analyzing data regarding transfusion risks that will be used to improve patient care. We respectfully urge the advisory committee and the Department of Health and Human Services to support the concept of a joint public/private initiative that brings the best of

both sectors to address this urgent need. Thank you.

DR. BRACEY: Thanks you, Dr. Whitaker. Comments? Dr. Epstein?

DR. EPSTEIN: Just one comment, which is do you think the committee could get a copy of the 2006-2007 AABB strategic plan as part of our deliberations in the work groups?

DR. BRACEY: All right, thank you. Written comments? Actually, we have one member of the public, Mr. Dubin?

MR. DUBIN: I am Corey Dubin from the Committee of 10,000. Most of you know us or know me. There are a couple of things I want to speak to.

First I want to say it is troubling to us, after this many years in the process, that when we hear about joint efforts these days, we hear about the private sector and the government. We have been dropped out of that list. We used to be on that list. It used to be government, industry and users, consumers--whatever words we want to use.

We don't believe, because the AIDS blood crisis is over, that government should remodulate itself back to its old methods where consumers can't get through the door to get to the table, and we have some concerns about that and they are strong, and we would much rather work our concerns out within the HHS in a cooperative discussion because that is the way we like to work. We have worked with a number of people sitting at the table, and continue to do so, FDA being one, CDC being another.

So, I think it is important--and I look at the AABB and say I have been hearing this shift in your comments for a while. We are very concerned about it. We lose 8000 people to get out of the process. We still intend to honor people by coming and talking and understanding. And, I think anybody would be hard-pressed to say the Committee of 10,000 or the NHF, as an example, have been emotional in these proceedings or not been good participants at the table. So, I think that is important.

That said, we think, and we have been saying this for over a decade, that for a country like the United States, a world leader in medicine in so many fields, to not have a national blood policy that brings these things together under one roof--whether that is done by Congress or whether it is done by DHHS, in the private sector, consumers, all of us--it boggles our mind and we continue to raise the issue of a national blood policy.

MSM should be discussed there. We should be dealing with MSM but we just keep kicking the ball with it over and over and not substantively dealing with it. I heard a nice presentation today though, to further the discussion a little, that had some good information in it and we were thankful to hear that. But I think a lot of these issues would come up under the rubric of a national blood policy. And, I think when you look to the European governments, a lot of them have that kind of policy. Canada has it. We don't. And, we would urge again and again--we urge it here; we

urge it in Congress with our friends--the importance of a national blood policy.

Just a quick side bar, for us, the MSM discussion comes up at a time when we still have concerns about the implementation. We have seen a lot of changes. We have seen a lot of new regs. We have seen donor screening and NAT testing--all good advances that have certainly raised the safety of the blood supply. But I think one of the problems that we still see is some 13 years later the ARC is still under a consent decree. There are regional differentiations between how blood banks are doing, individual blood banks. A lot of that is staff issues and education issues and in service. Again, we think this all could come back to a national blood policy as well which sets national standards, requires certain kind of training and gets us all together to move the nation another step.

It is impressive, Jerry, to look at--and I mean this, I am not being sarcastic at all--to look at the body of recommendations that have come from

this committee and to sit and take them in is powerful. The question is how do we take them from that point where we are looking at them, and they are important and they address a lot of critical issues from our perspective, and start to meld that discussion towards a policy that really takes all that good work and turns it into something very meaningful and more than a body of recommendations?

I know we are a little repetitive on this point, but we will keep doing it because we think it is so important, and we are going to remind you all that we are not going away. I will pass and fade into memory but there will be other people--the list is pretty long but there will be younger people in our place standing here, saying the same kinds of things.

I want to remind you all that you can forget us but we won't be going away any time soon because we really believe in a partnership. We believe the stakeholders is all of us. I have a friend who works in this area and is a very respected friend. She is a lawyer and an advocate

and she always says those with an arm and a game need to be at the table. We like that statement. We think it is very important because those with an arm and a game can provide a lot of anecdotal information about what happens and how things work in terms of product, in terms of care choices, in terms of living with diseases. And, I always want to end by saying thank you again, Mr. Chairman, Jerry and the whole committee for allowing us to speak. Thank you.

DR. BRACEY: Thank you for your comments, Mr. Dubin. Dr. Holmberg?

DR. HOLMBERG: In your notebooks there are two e-mails that I have received from two different individuals. They both relate to the IGIV availability at the Kansas University Medical Center. I won't read the second one because it is addressed to the committee members and you can read that just as well. But the e-mail that I am going to read actually specifically asked me to read this to the committee at the meeting today and I will honor that. I have tried to remove the specific

name of the patient but I will read that:

I receive IGIV at Kansas University Medical Center, University of Kansas Hospital, and she gives the address.

The last two months have been hell as they notified me by word of mouth that as a Medicare patient I could no longer receive my IGIV in the outpatient clinic within the hospital building as that is apparently not part of the hospital itself, but owned by some internal medicine doctors. The reason was given to me that they were not paid enough by Medicare to cover the cost of the medication I take, which is 30 grams of IGIV every two weeks.

I have been getting this medication now for 11 years. Right now I am on Gamunex, but did have anaphylactic shock from the medication they had be on years ago. For most of that time my private insurance paid for my care and my medications. A few years back they asked that I try just getting my medications every three weeks. I had been able to stay out of the hospital for ten

years until then. After this increase in period between my appointments, I ended up in the hospital with pneumonia. One time, as my hospital records will show, I was in for ten days and very nearly did not pull through. They were forced to put me back on every two-week schedule but they did not like it.

A couple of months ago I was discriminated against because I was on Medicare and told that I could receive my IGIV in the hospital itself, but had to go through admissions each time, and they would not give me a set appointment. I have arrived there at 7:30 a.m. and waited forever for an appointment. Now I am being told that all patients getting IGIV or Remicade must now report to the cancer center of the hospital, which I have never seen.

The stress of not knowing from one treatment to the next what is going to happen to me has been horrible. This is not a kind disease, CVID, and I have to have my treatments on time and the correct dose. I need help. I go to the cancer

center for the first time this week and I am crying as I write this since I have never seen that area of the hospital. Thank God for John, or I just could not deal with this without his support.

Again she gives her name. If there is any way to get Medicare rules changed back so that my sister and other patients in the same predicament can go back to the level of care that existed before, the quality of life and longevity will continue to improve for these patients. If, however, they continue to be sent hither and fro in confusion, exposing themselves to the sickness and infection among residents in the hospital setting, adding i the stress factor, I fear their lives are in jeopardy. Thank you for your consideration.

DR. BRACEY: Thank you. Are there comments? This is one of the things the committee was quite concerned about and we, again, have gone on the record with the Assistant Secretary on this.

If that is it, then we will adjourn for an hour for lunch and the working groups will meet back here. We will have the room arranged so that

there are small tables for each of the working groups that will meet this afternoon. Thank you.

[Whereupon, at 12:34 p.m., the proceedings were recessed, to reconvene on Wednesday, May 10, 2006 at 1:00 p.m.]

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