Introduction

The Histocompatibility Committee met teleconference on January 14, 2020, to discuss the following agenda items:

1. HLA Typing Errors
2. HLA Typings in Donor Highlights Text
3. Public Comment and Outreach
4. CPRA Calculation Project Update
5. Open Session

The following is a summary of the Committee’s discussions.

1. HLA Typing Errors

UNOS IT staff presented an update to the HLA typing errors project.

Data summary:

The definite implementation date for the HLA typing errors changes will be 2/27/2020. System notices will be sent through email, as well as the Transplant Pro newsletter and the tech newsletter on 2/6/2020 and 2/13/2020. Notices will also go out through the unos.org system notices and UNet the day of implementation. A draft of the notice will go through Histocompatibility leadership first. Additionally, testers are needed to address the HLA testing errors. The HLA audit log is currently being addressed.

Possible users are also needed to test TDAI or waitlist, and there will be some for DonorNet, since that is what’s typically used. UAT testing will go from 2/3/2020 to 2/5/2020. The professional education team will work with UNOS staff to create a how-to video for entering data hopefully 2 weeks before the implementation date. Finally, the Donor HLA Audit Log was presented in detail to the Committee.

Summary of discussion:

Of note, in the HLA Audit Log, any fields that are not exactly the same during the update will be flagged and highlighted, but that will not necessarily mean there is a discrepancy.

There were no questions from the committee. [Name of next Committee Project or case review discussed]

2. HLA Typings in Donor Highlights Text

The equivalency table updates in follow-up to the data request made by the Committee in November were presented by UNOS research analyst.

Data summary:
Since not all donor typings are supported by DonorNet, a typing that cannot be entered into DonorNet can be noted in the donor highlights text by a lab. Therefore, the Committee previously requested how commonly HLA typings appear in the donor highlights text and which typings cannot be reported in DonorNet at this time. All donor highlights text notes for every deceased donor between 1/1/2018 and 10/1/2019 were looked at, equaling 11,485 donors. Regular expressions were then used to pull out anything that looked like HLA typing in that text.

Overall, HLA typing very uncommonly appears in the donor highlights text. Of the roughly 11,500 patients, there were only 56 instances where HLA typing was mentioned in the text, and 82% were reported by one of two different labs. Of those 56, 39 typings could be entered into DonorNet and 17 were instances not in DonorNet. The most commonly reported was DPVB1 1501, which talked about not being able to rule that out as the typing. DPB1*762:01 and B*83:01 will be added in the next equivalency table update, so will no longer appear in the donor highlights text.

Of the 17 typings not in DonorNet, most were only entered once, but DRB4*01:03 null was mentioned 12 times. On a previous Committee call, one Committee member had a follow-up question regarding what the actual donor typing was that was entered for the donors with the notes about the null alleles. In 70% of those, the donor was entered as a DR53 negative and in each lab there were inconsistencies in reporting the null allele as positive or negative at year 53.

Of note, HLA-DPA1 is another that was entered by one lab in the donor highlights text across 22 different donors with 86% antigen 1 versus 2.

Overall, HLA typing information might be an issue of individual lab practices for different labs since there are few HLA typings that cannot be entered into DonorNet.

Summary of discussion:

One question was whether the nulls reported were all from the same lab, because it could possibly mean that there was one null allele and one normal allele. It was clarified that two different labs entered the null allele in the highlights text, and they were entered into DonorNet as homozygous positive.

One Committee member asked if the HLA typings were not reported according to WHO nomenclature due to a character limit in the text. The character limit is quite high, so is probably not the issue. UNOS staff commented it is unlikely there is any null in the nomenclature in the UNOS/OPTN programming.

3. Public Comment and Outreach

Data summary:

All documents/papers/proposals/requests for feedback from the community going out for public comment are handled by the discussion agenda and the non-discussion agenda. Discussion agenda engages stakeholders and develops the feedback to achieve the intended goal. The non-discussion agenda helps share those proposals with less lower resource commitment, less controversial, less impactful by a different mechanism.

Six discussion agenda items were presented, which will be introduced in regional meetings in the coming months. Six non-discussion agenda proposals were also presented and will be available to the transplant community, one being the HLA equivalency tables update.

The public comment plan includes targeted outreach to Histocompatibility stakeholders. ASHI and CAP, transplant societies, and laboratory personnel will be engaged to consider the goals, how the Committee intends to reach those goals, and to provide feedback on them. A national webinar on
1/27/2020 will also be an opportunity to share the Histocompatibility proposal, along with three others, and hopefully take the feedback to OPTN. In other OPTN committee proposals, there is a proposal and guidance from the Operations and Safety Committee that deals with ABO determination. This will be shared with the Histocompatibility Committee at their next monthly call in February to gain feedback.

Summary of discussion:
The Ops and Safety Committee’s proposal is regarding much needed guidance for how to handle massive transfusions, and that will be interesting to the Histocompatibility Committee and potentially for HLA labs in the future. There is a section on using molecular method to be ancillary testing for serology ABO types, as molecular methods could help massive transfusion scenarios.

Another commented that the ABO molecular typing also does a better job with A2 determination. The subtyping was not addressed in the report, but there is a separate document on subtyping that could be brought up at the public comment.

4. **CPRA Calculation Project Update**

UNOS staff presented on progress of the CPR project.

Data summary:
The project is still in the evidence-gathering phase, but there is a draft request for proposal that is undergoing internal review. A data use agreement with the National Bone Marrow Program is being developed. In addition, the manuscript for the CPRA paper has been submitted to the New England Journal of Medicine. The issues regarding panel size, with further analyses that could be done, will be brought to the community for further feedback. The next subcommittee meeting will be 1/24/2020.

The more comprehensive haplotype frequencies are still preliminary. To continue development on the 9/11-locus panel, the completed RFP process and a draft of a manuscript and finalized frequencies for the 11-locus data will be needed.

Summary of discussion:
There were no questions from the Committee.

Next steps:
The manuscript will be distributed to the Committee and kept confidential by its members.

5. **Open Session**

The 2020 regional meeting schedule was reviewed. There will be Histocompatibility representatives at the regional meetings to be part of the OPTN process, engage with members, and hear about common issues. If the proposal is pulled off the consent agenda, the regional reps will present at their assigned regions. Members will let the Chair know if they have any scheduling conflicts. The slides to be used at the national webinar may also be used for the regional meetings if necessary.

Two new staff members to the Histocompatibility Committee were introduced and welcomed, one who will become the primary point of contact for the Committee members. A policy associate new to UNOS, but not to transplant, will also be coming on.

More details on the upcoming in-person meeting in April will be sent out so members can begin making travel arrangements. Thus far, dinner and a tour of the National Donor Memorial Organ Center are planned.
The Chair commented that her cardiologists and thoracic surgeons in her region want to explore the possibility of having a point system for the thoracic organs like there is for the kidneys, to incorporate sensitization status of the patient. This will be brought up with the Thoracic Committee to see if they will want to pursue this project. Another member indicated that the transplantation societies are thinking about the same issue. A few weeks ago there was HRSA a meeting of the presidents of the transplantation societies, where there was discussion regarding immunobiological factors in allocation, including allo sensitization, for other organs outside of kidney. The ASHI group at the meeting considered this good for the Histocompatibility Committee to start thinking about to develop a proposal.

One member brought up that the OPTN Histocompatibility SharePoint site that was previously used for posting minutes and announcements has not been updated or used since November of 2018. Of note, UNOS is in transition of moving to a new system, where meeting materials and minutes will be posted to a different place of the website. The link and information will be sent to the Committee members. It can be used as a tool for communication and information sharing. The slides from this meeting, and eventually the meeting summaries, will be posted.

**Upcoming Meetings**

- February 11, 2020 from 12-1 pm EST
- March 10, 2020 from 12-1 pm EST
- April 17, 2020, In-Person Meeting, Richmond, VA