

*Briefing to the OPTN Board of Directors on*

# **Update Histocompatibility Membership Requirements**

*OPTN Histocompatibility Committee*

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# Update Histocompatibility Membership Requirements

*Affected OPTN<sup>1</sup> Management and Membership Policies:*

- C.1: Histocompatibility Laboratory Compliance*
- C.2: Facilities and Resources*
- C.3: Histocompatibility Laboratory Key Personnel*
- C.4: Laboratory Coverage Plan*
- C.5: Changes in Key Laboratory Personnel*
- C.6: Histocompatibility Laboratory Policies and Procedures*
- C.7: Histocompatibility Laboratory Testing Requirements*
- C.8: Inactivation and Withdrawal of OPTN Membership*

*Sponsoring Committee:* Histocompatibility

*Public Comment Period:* July 31, 2024-September 24, 2024

*Board of Directors Meeting:* December 2-3, 2024

## Executive Summary

The OPTN Histocompatibility Committee proposes to update and clarify the histocompatibility laboratory membership requirements, as well as align them with the Clinical Laboratory Improvements Act (CLIA) regulatory updates for histocompatibility labs being implemented on December 28, 2024.<sup>2</sup>

The Committee is proposing the following areas of change:

- Allow multiple OPTN-approved laboratory directors at a histocompatibility lab, with one primary laboratory director responsible for OPTN operations
- Update laboratory director education and training requirements to align with CLIA regulations for a technical supervisor
- Clarify and expand requirements for laboratory agreements with transplant hospitals and organ procurement organizations (OPOs)
- Modify required personnel and add a primary data coordinator to act as OPTN point of contact
- Update laboratory subcontracting requirements and remove requirement for the laboratory director to review and approve all subcontracting results before release
- Expand inactivation and withdrawal notification requirements
- Remove requirements that are redundant to other existing regulatory requirements for labs and clarify language

Following public comment, the Committee updated the definition of a laboratory director to align with the requirements for a CLIA technical supervisor.

<sup>1</sup> This proposal was originally drafted using the former structure of the OPTN Policies and OPTN Bylaws. On July 24, 2024, the OPTN adopted a new structure of governance, splitting the OPTN Bylaws into two documents: the OPTN Bylaws and OPTN Membership and Management Policies. The references to the affected provisions have been updated to match the format adopted in July. For more information, please see the OPTN proposal *Revised Bylaws and Management and Membership Policies*, available at [https://optn.transplant.hrsa.gov/media/g1hfnqvs/specialpc\\_invest\\_combineddoc.pdf](https://optn.transplant.hrsa.gov/media/g1hfnqvs/specialpc_invest_combineddoc.pdf).

<sup>2</sup> Centers for Medicare and Medicaid Services, *Clinical Laboratory Improvement Amendments of 1988 (CLIA) Fees; Histocompatibility, Personnel, and Alternative Sanctions for Certificate of Waiver Laboratories*. Federal Register, 12/28/2023. <https://www.federalregister.gov/documents/2023/12/28/2023-28170/clinical-laboratory-improvement-amendments-of-1988-clia-fees-histocompatibility-personnel-and>.

## Purpose

The goal of this proposal is to clarify and update histocompatibility membership requirements as well as align with upcoming CLIA regulatory changes.

For personnel, these changes include allowing multiple OPTN-approved laboratory directors at a histocompatibility lab, with one primary laboratory director responsible for OPTN operations. In addition, it aligns laboratory director education and training requirements with CLIA regulations for a technical supervisor. It also modifies references for required personnel and adds a primary data coordinator role to act as the point of contact for the OPTN in regard to data submission.

This proposal also clarifies and expands requirements for laboratory agreements with transplant hospitals and organ procurement organizations (OPOs) whom they contract with. It also updates laboratory subcontracting requirements and removes the requirement for the laboratory director to review and approve subcontracted test results before release. However, the subcontracted laboratory director is still required to review and approve all test results they release, regardless of whether it was being completed for their laboratory or under a subcontract.

In addition, inactivation and withdrawal notification requirements are expanded, which better aligns with the requirements for transplant hospitals and OPOs. And lastly, general clarifications were made, as well as requirements removed that are redundant to other existing regulations for labs, such as CLIA.

## Background

The Membership and Professional Standards (MPSC) Histocompatibility Subcommittee began work on this proposal in January 2020 and met five times to develop proposed changes. Draft language was presented to the Histocompatibility Committee in March 2020, who provided feedback and were supportive of the project. The full MPSC Committee reviewed the proposed changes in May 2020 and endorsed the initial draft language<sup>3</sup>. The project was put on temporary hold while awaiting other regulatory changes that impact proposed changes. In December 2023, the Centers for Medicare and Medicaid Services (CMS) published a final rule updating CLIA regulations, with an effective date of December 28, 2024.<sup>4</sup> In order to update and align the histocompatibility membership requirements with CLIA regulations, the OPTN Histocompatibility Committee began work again on the project, with the approval of the MPSC, and revised the developed language for release for public comment. The proposed changes were reviewed again with the MPSC and endorsed by both the MPSC<sup>5</sup> and Histocompatibility Committee<sup>6</sup> in May 2024.

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<sup>3</sup> OPTN Membership and Professional Standards Committee. Meeting Summary, May 21, 2020. Available at <https://optn.transplant.hrsa.gov>.

<sup>4</sup> Centers for Medicare and Medicaid Services, *Clinical Laboratory Improvement Amendments of 1988 (CLIA) Fees; Histocompatibility, Personnel, and Alternative Sanctions for Certificate of Waiver Laboratories*. Federal Register, 12/28/2023. <https://www.federalregister.gov/documents/2023/12/28/2023-28170/clinical-laboratory-improvement-amendments-of-1988-clia-fees-histocompatibility-personnel-and>.

<sup>5</sup> OPTN Membership and Professional Standards Committee. Meeting Summary, May 21, 2024. Available at <https://optn.transplant.hrsa.gov>.

<sup>6</sup> OPTN Histocompatibility Committee. Meeting Summary, May 28, 2024. Available at <https://optn.transplant.hrsa.gov>.

## Proposal for Board Consideration

### Multiple OPTN-Approved Laboratory Directors

The Committee is proposing allowing multiple laboratory directors per laboratory to become OPTN-approved, while still requiring one director to serve in the primary role. Currently, the OPTN only approves a primary laboratory director so other eligible directors may be employed at the laboratory but not receive the distinction of an OPTN-approved laboratory director. Accrediting bodies currently approve multiple laboratory directors per laboratory. This causes confusion when a non-primary director transitions to a new lab and fulfills the role of primary with the OPTN for this first time, as they are now required to complete the full application process which includes submitting a portfolio of 50 cases covered during the five years prior to the date of application. This proposal will allow any individual who fulfills the CLIA requirements of a technical supervisor to submit an application to the OPTN and become approved as an OPTN laboratory director. While the individual will still need to submit a key personnel application when transitioning labs, they will not need to submit a full portfolio of cases after their first application is approved.

### Laboratory Director Education and Training

The Final Rule updating CLIA increased the stringency and complexity of histocompatibility laboratory director training requirements. Due to existing external regulatory requirements, all laboratory directors must already follow the CLIA requirements for qualifications. Part of the qualifications require that laboratory directors must be certified by a board approved by the US Department of Health and Human Services (HHS) in order to direct a high complexity laboratory, and all histocompatibility laboratories are by definition high complexity laboratories.<sup>7</sup> When discussing the need for alternate pathways or increased stringency beyond CLIA's existing requirements, the Committee felt that CLIA's requirements for laboratory directors were sufficient. In addition, this will reduce the need to have future proposals to align with future CLIA updates, as OPTN requirements now reference CLIA requirements directly instead of duplicating them.

Following public comment, the Committee discussed that the requirements of an OPTN histocompatibility lab director are currently more comprehensive than those of the CLIA laboratory director position. The Committee received multiple public comments to that effect, especially from Region 4. When the Committee reviewed the current OPTN requirements of the lab director position, they felt that it most aligned with the CLIA technical supervisor position. Therefore, following public comment, they changed the education and training requirements for an OPTN lab director to meet the CLIA requirements of a technical supervisor.

### Laboratory Agreements with Transplant Hospitals

Laboratories are required to have written agreements with every transplant program they serve, unless clinical urgency prevents such an agreement. These agreements outline expectations of the laboratory and transplant programs, including expected procedures. OPTN *Membership and Management Policy C.2.C: Transplant Program Affiliation*<sup>8</sup> contains a list of required items that must be included in an

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<sup>7</sup> 42 CFR §493.1443.

<sup>8</sup> Originally located in *OPTN Bylaw C.2.C: Transplant Program Affiliation*.

agreement. Proposed changes organize the requirements into four named categories: HLA typing requirements, crossmatching requirements, antibody screening, and blood type verification. Most proposed changes reflect re-organized and clarified requirements. Any new or amended requirements are described in the appropriate category.

### *HLA Typing Requirements*

The majority of HLA typing requirements that must be included in any transplant program agreement were simply re-organized and clarified. However, the Committee did add a requirement to notify the transplant program if expected turnaround time will be exceeded. A crosswalk of the existing and proposed requirements is in **Table 1**.

**Table 1: HLA Typing Requirements, Transplant Program Agreements**

Existing Requirement	Proposed Requirement
1. The sample requirements for typing and crossmatching.	Sample requirements
2. The loci and level of resolution typed.	Loci and level of resolution typed
3. A process for reporting and verifying HLA and unacceptable antigen data at the time of registration on the waiting list and any time there are changes. 4. A process for reporting HLA typing results to the OPTN.	Process for reporting of HLA results to the OPTN and verification of results, including verification if changes occur
5. The maximum turnaround time from receipt of sample to reporting of results to the transplant program.	Expected turnaround time from receipt of sample to reporting results to the transplant program and process of notification if turnaround time is going to be exceeded
6. A process for resolving HLA typing discrepancies and errors.	Process for resolving discrepancies and errors

### *Crossmatching Requirements*

The majority of crossmatching requirements that must be included in any transplant program agreement were simply re-organized and clarified. However, the Committee proposes distinguishing between physical and virtual crossmatching, adding a process for reporting of crossmatching results, and adding a notification to the transplant program if the expected turnaround time will be exceeded. A crosswalk of the existing and proposed requirements is in **Table 2**.

**Table 2: Crossmatching Requirements, Transplant Program Agreements**

Existing Requirement	Proposed Requirement
1. The sample requirements for typing and crossmatching.	Sample requirements for both donors and recipients

Existing Requirement	Proposed Requirement
11. The criteria for crossmatching. 12. The assay format that will be used for antibody screening and for crossmatching.	Methodology and criteria for physical crossmatching
11. The criteria for crossmatching.	Criteria for virtual crossmatching, if performed
8. A process to obtain sensitization history for each patient.	Process to obtain sensitization history for each patient
N/A	Process for reporting of physical or virtual crossmatching results to the transplant hospital and verification of results, including verification if changes occur
7. The maximum turnaround time from receipt of sample to reporting of results to the transplant program.	Expected turnaround time from receipt of sample to reporting results to the transplant program and process of notification if turnaround time is going to be exceeded

## Antibody Screening

The majority of antibody screening requirements that must be included in any transplant program agreement were simply re-organized and clarified. However, the Committee proposes adding sample requirements and a notification to the transplant program if expected turnaround time will be exceeded. A crosswalk of the existing and proposed requirements is in **Table 3**.

**Table 3: Antibody Screening Requirements, Transplant Program Agreements**

Existing Requirement	Proposed Requirement
N/A	Sample requirements
12. The assay format that will be used for antibody screening and for crossmatching.	Methodology
9. The frequency of periodic sample collection.	Frequency of sample collection
10. The frequency of antibody screenings.	Frequency of antibody screenings
13. The criteria for determining unacceptable antigens used during organ allocation.	Criteria for determining unacceptable antigens used during organ allocation
4. A process for reporting and verifying HLA and unacceptable antigen data at the time of registration on the waiting list and any time there are changes.	Process for reporting unacceptable antigens to the OPTN and verifying unacceptable antigen data at time of registration and if changes occur
7. The maximum turnaround time from receipt of sample to reporting of results to the transplant program.	Expected turnaround time from receipt of sample to reporting results to the transplant program and process of notification if turnaround time is going to be exceeded
17. If post-transplant monitoring is performed, then a protocol for monitoring antibody levels.	If post-transplant monitoring is performed, include protocol for monitoring donor-specific antibodies.
15. If desensitization will be performed, then a protocol for monitoring antibody levels.	If desensitization is performed, include protocol for monitoring antibody testing and reporting

## Blood Type Verification

If a laboratory registers candidates for the transplant program, the agreement is also required to include a process for blood type verification according to OPTN Policy 3.3: *Candidate Blood Type Determination and Reporting before Waiting List Registration*. This requirement is unchanged but moved into its own section.

## Removed Requirements

The Committee is proposing to remove the requirement for the process of requesting extended HLA typing. HLA typing requirements already contain the loci and level of resolution typed, and transplant programs may already request additional testing outside of the lab’s standard protocols.

The Committee is also proposing to remove the requirement for the duration for which specimens need to be stored for repeat or future testing. Histocompatibility labs are not required to store candidate or recipient specimens for repeat or future histocompatibility testing.

## Laboratory Agreements with OPOs

Laboratories are required to have written agreements with every OPO they serve, unless clinical urgency prevents such an agreement. These agreements outline expectations of the laboratory and OPO, including expected procedures. OPTN *Management and Membership Policy C.2.D: OPO Affiliation*<sup>9</sup> lists the requirements that must be included in agreements with OPOs. Proposed changes organize the requirements into three named categories: HLA typing requirements, crossmatching requirements, and donor specimen storage requirements. Most of the proposed changes required for inclusion in an OPO agreement reflect re-organized and clarified requirements. Any new or amended requirements are described in the appropriate category.

## HLA Typing Requirements

The majority of HLA typing requirements that must be included in any OPO program agreement were simply re-organized and clarified. However, the Committee proposes adding a notification to the OPO if expected turnaround time will be exceeded. A crosswalk of the existing and proposed requirements is in **Table 4**.

**Table 4: HLA Typing Requirements, OPO Agreements**

Existing Requirement	Proposed Requirement
1. The sample requirements for typing and crossmatching.	Sample requirements
2. The loci and level of resolution typed.	Loci and level of resolution typed
4. A process for verifying and reporting HLA typing results to the OPTN.	Process for verifying and reporting results to the OPO and the OPTN
6. The maximum turnaround time from receipt of donor sample to reporting of results to the OPO.	Expected turnaround time from receipt of donor sample to reporting results to the OPO and process of notification if turnaround time is going to be exceeded

<sup>9</sup> Originally OPTN Bylaw C.2.D: *OPO Affiliation*.

Existing Requirement	Proposed Requirement
5. A process for resolving HLA typing discrepancies and errors.	Process for resolving discrepancies and errors

### Crossmatching Requirements

The majority of crossmatching requirements that must be included in any OPO program agreement were simply re-organized and clarified. However, the Committee proposes adding a notification to the OPO if expected turnaround time will be exceeded, as well as verification of crossmatching results including verification if changes occur. A crosswalk of the existing and proposed requirements is in **Table 5**.

**Table 5: Crossmatching Requirements, OPO Agreements**

Existing Requirement	Proposed Requirement
1. The sample requirements for typing and crossmatching.	Sample requirements for both donors and recipients
9. If the OPO performs crossmatching, then all methods used for crossmatching and the interpretation and reporting of the results.	If an OPO-contracted laboratory performs crossmatching, methodology and criteria for physical crossmatching as well as interpretation and reporting of results.
9. If the OPO performs crossmatching, then all methods used for crossmatching and the interpretation and reporting of the results.	Process for reporting of crossmatching results to the OPO or transplant hospital and verification of results, including verification if changes occur
6. The maximum turnaround time from receipt of donor sample to reporting of results to the OPO.	Expected turnaround time from receipt of donor sample to reporting results to the OPO and process of notification if turnaround time is going to be exceeded

### Donor Specimen Storage Requirements

*OPTN Policy 4.9: Preservation of Excess Specimens* requires that “If a laboratory performs testing to determine histocompatibility between a donor and recipient, then the laboratory must preserve enough specimen from the deceased donor to perform subsequent testing for at least five years after the transplant.” Current membership requirements require that an OPO agreement with a laboratory include the length of time for which donor specimens are required to be stored for repeat or future testing, which must be at least five years.<sup>10</sup> The Committee is proposing no change to this requirement, simply organizing it in its own section for clarity.

### Removed Requirements

The Committee is proposing to remove the requirement for the process of requesting extended HLA typing. HLA typing requirements already contain the loci and level of resolution typed, and OPOs may already request additional testing outside of the lab’s standard protocols.

The Committee is also proposing to remove the requirement for a process for prioritizing donors for histocompatibility testing. The agreement is already required to contain the expected turnaround time

<sup>10</sup> *OPTN Management and Membership Policy C.2.D: OPO Affiliation.*



for both HLA typing and crossmatching, as well as notification if that turnaround time is going to be exceeded.

## Required Personnel and Primary Data Coordinator Role

Current membership requirements for histocompatibility laboratory key personnel outline qualifications for histocompatibility technologists. The existing OPTN requirements are that the technologist must meet the qualifications within CLIA for testing personnel qualifications for a laboratory performing high complexity testing, as well as have had one year of supervised experience in human histocompatibility or transplant immunology testing, regardless of academic degree or other training and experience.<sup>11</sup> The Committee is proposing to remove histocompatibility technologist qualifications from the *OPTN Management and Membership Policies*.<sup>12</sup> Laboratories would still need to comply with the qualifications required under CLIA for testing personnel for a laboratory performing high complexity testing<sup>13</sup>, but technologists would no longer be required to have one year of supervised testing experience. When discussing removing this requirement, the MPSC subcommittee had felt that competency testing and education already required by CLIA and accrediting bodies was sufficient for patient safety. The Histocompatibility Committee concurred with this assessment.<sup>14</sup>

The Committee is proposing the addition of a primary data coordinator role under personnel requirements, at the request of the MPSC. This also reflects existing practice at OPOs and transplant hospitals. The primary data coordinator will serve as the point of contact for questions and communications from the OPTN on data submission. This role may be filled by an existing staff member, who may have another primary role. The primary data coordinator will be required to be reported to the OPTN, and there will be a transition period while the names of the individuals filling this role are gathered utilizing the same form that is already in use for transplant hospitals and OPOs.<sup>15</sup>

The Committee discussed the potential for additional qualifications for general supervisors. Current OPTN Membership requirements require that a general supervisor meets the qualifications within CLIA, for general supervisor qualifications for a laboratory performing high complexity testing<sup>16</sup>. In addition, the general supervisor already must have at least three years of experience in human histocompatibility or transplant immunology testing under the supervision of a qualified histocompatibility laboratory director or technical supervisor. The Committee is not proposing to add any additional requirements for general supervisors at this time.

## Laboratory Subcontracting Requirements

Current OPTN Membership requirements require that if a laboratory refers testing to another laboratory, the subcontracting laboratory must be CLIA-certified, unless exempt, and OPTN-approved. As all OPTN-approved laboratories are already required to be CLIA-certified, unless exempt, this requirement was duplicative and the Committee is proposing to remove it. In addition, the Committee is proposing to remove the requirement for the primary laboratory director to review and approve all test results returned from the subcontracting laboratory before release, as the results already must be

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<sup>11</sup> 42 CFR §493.1489.

<sup>12</sup> *OPTN Management and Membership Policy C.3.D: Histocompatibility Technologist Qualifications*.

<sup>13</sup> 42 CFR §493.1489.

<sup>14</sup> OPTN Histocompatibility Committee. Meeting Summary, May 28, 2024. Available at <https://optn.transplant.hrsa.gov/>.

<sup>15</sup> *Primary Data Coordinator Form*, OMB No. 0915-0184, expires 12/21/2025.

<sup>16</sup> 42 CFR §493.1461.

reviewed by the OPTN-approved subcontracting laboratory director and the additional approval confers no additional patient safety. In addition, current membership requirements require that the identity of the subcontracting laboratory and the portion of that testing for which it bears responsibility must be noted in the report of the histocompatibility laboratory. All laboratory reports are already required by CLIA to contain the name and address of the laboratory location where the test was performed.<sup>17</sup> In addition, current membership requirements require that a copy of the testing laboratory's report be kept on file by the laboratory receiving the results. CLIA already requires that all test information maintained as part of the patient's chart or medical record must be readily available to the laboratory.<sup>18</sup> As both of these OPTN membership requirements are duplicative of existing CLIA requirements, the Committee is proposing to remove them.

## Laboratory Inactivation and Withdrawal Notification Requirements

The current provisions for laboratory inactivation only require that if a laboratory is voluntarily inactive, declared inactive, or withdraws from OPTN membership, they will be ineligible and may not provide histocompatibility testing to any OPTN members. There is currently no notification requirement to the OPTN or OPTN members that a laboratory serves upon inactivation or withdrawal. The Committee is proposing that labs that are unable to provide testing for 15 or more days voluntarily inactivate, for a period of up to 12 months, which could be extended upon request. The Committee is also proposing a requirement for inactive laboratories to notify all members they are contracted with within 7 days after inactivation, and provide an example of the notice sent and a list of all members to whom the notice was sent to the OPTN. The Committee is proposing that laboratories that withdraw membership notify contracted members and the OPTN at least 30 days prior to the anticipated date of withdrawal, as well as provide an example of the notice sent and a list of all members to whom the notice was sent to the OPTN.

## Remove Redundant Requirements and Clarify Language

The Committee is proposing to remove requirements that are redundant to other regulatory requirements, as well as some clarifying language. For example, the requirements within the current *OPTN Management and Membership Policy C.2.A: Facilities*<sup>19</sup> are duplicative of but less comprehensive than laboratory facility requirements within CLIA<sup>20</sup>. Another proposed removal is the current *OPTN Management and Membership Policy C.2.B: Records Access*<sup>21</sup>, which requires laboratories to be able to immediately access candidate, recipient, and donor records onsite. This requirement is already contained within both CLIA and the Health Information Technology for Economic and Clinical Health (HITECH) Act.<sup>22</sup> However, the largest proposed removal is the removal of criteria for a mandatory performance review and information required from laboratories with unsatisfactory performance. Member Reviews and Actions are already covered by *OPTN Management and Membership Policy Appendix L*<sup>23</sup>, which provides the MPSC with more review and information request abilities than are contained within the histocompatibility laboratory provision.

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<sup>17</sup> 42 CFR §493.1291(c)(2).

<sup>18</sup> 42 CFR §493.1291(b).

<sup>19</sup> Originally located in *OPTN Bylaw C.2.A: Facilities*.

<sup>20</sup> 42 CFR §493.1101.

<sup>21</sup> Originally located in *OPTN Bylaw C.2.B: Records Access*.

<sup>22</sup> 42 U.S.C. §201.

<sup>23</sup> Originally located in *OPTN Bylaw Appendix L*.

## Overall Sentiment from Public Comment

This proposal was issued for public comment from July 31, 2024 to September 24, 2024. Committee members presented the proposal to two other OPTN Committees and to all eleven OPTN regions for feedback, and a video presentation describing the proposal was posted to the OPTN website. Four professional organizations as well as several transplant programs, OPOs, and individuals provided written public comment.

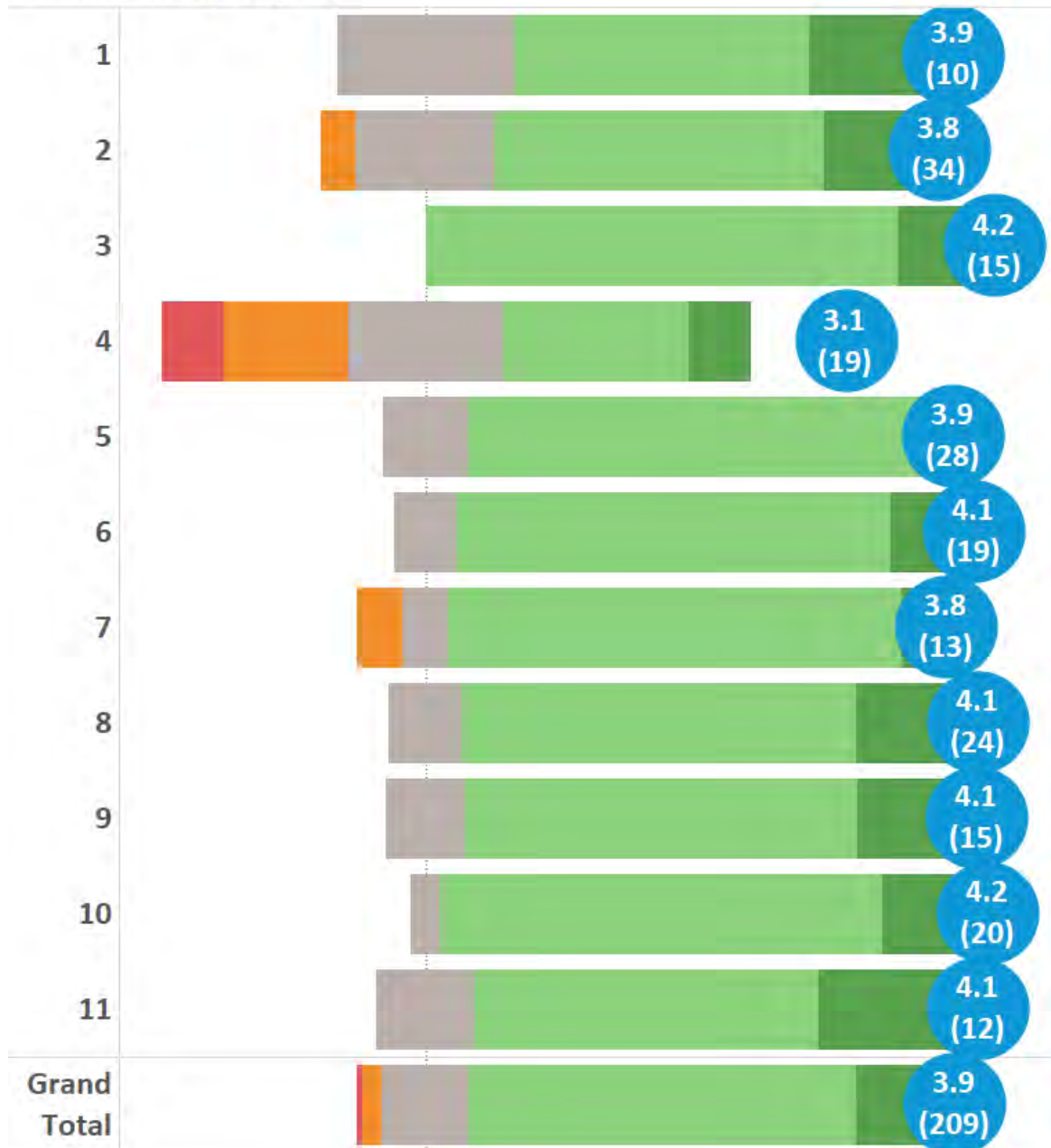
The proposal was on the discussion agenda for the OPTN regional meetings. In general, public comment sentiment has been supportive of this proposal, as indicated by the total sentiment score of 3.9 by regional meeting (Figure 1) and 3.9 by member type (Figure 2), with some pockets of concern. Further detail on the feedback and the Committee's changes to the proposal are summarized later in this document.

**Figure 1** illustrates the sentiment votes for the proposal at the regional meetings and the regions of online public commenters. Red represents strong opposition, orange represents general opposition, gray represents neutral sentiment or abstentions, light green represents general support, and dark green represents strong support. The "NP" bar represents votes that did not indicate a state/location. The score (indicated by the blue figure at the end of each bar) is calculated using a scale of 1-5. For example, a "strongly oppose" comment would receive a score of one, "support" would receive a two, "neutral/abstain" would receive a three, "support" would receive a four, and finally, a "strongly support" would receive a five.

The overall sentiment across regions was supportive (**Figure 1**), as indicated by a total sentiment score of 3.9. Opposition was raised in regions 2, 4, and 7 mostly under the theme of collaboration with other stakeholders/organizations, multiple lab directors, and implementation constraints.

**Figure 1: Sentiment by Region**

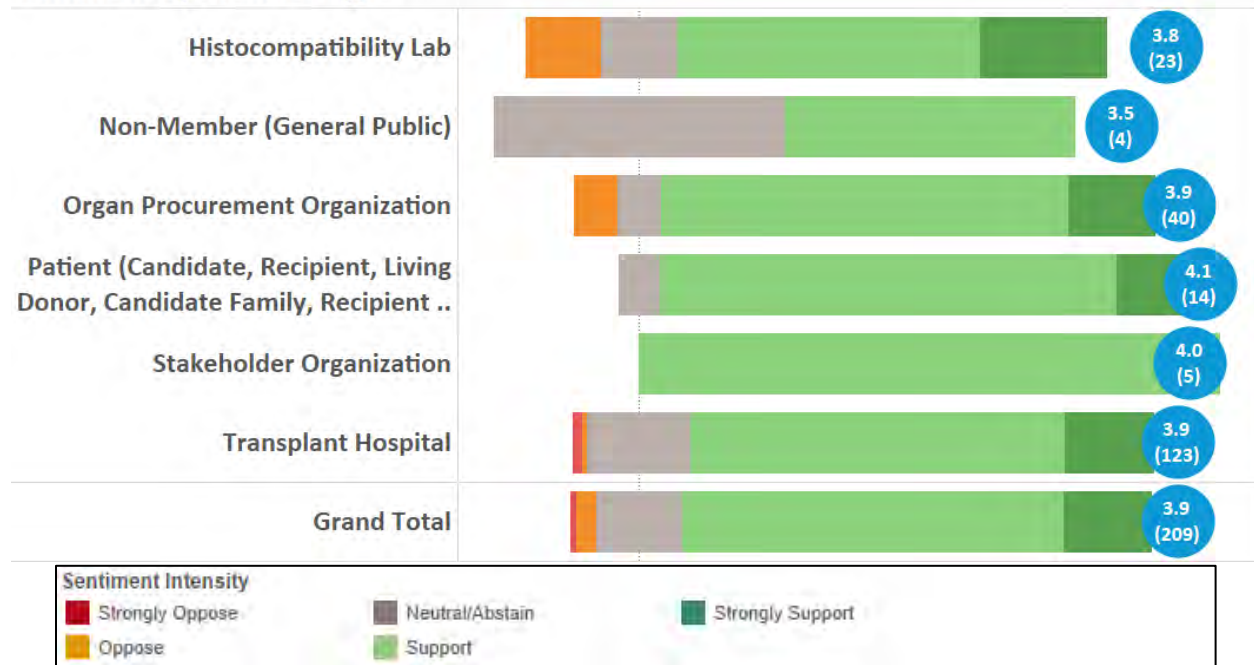
## Sentiment by Region



There was overall support across member types as shown below in **Figure 2**. The scores were calculated in the same manner as **Figure 1**. Histocompatibility labs, organ procurement organizations and transplant programs, showed some opposition to the proposal but overall had support for the proposal as demonstrated with overall sentiment scores of 3.8, 3.9, and 3.9, respectively. Further detail on the feedback and the Committee’s changes to the proposal are summarized later in this document.

**Figure 2: Sentiment by Member Type**

**Sentiment by Member Type**



In addition to the sentiment score, items out for public comment also provide the opportunity for respondents to submit a substantive written comment. Responses are submitted by members of the public at large, as well as on behalf of regions and Committees.

Commenters covered several topics, including the following main themes. Each theme is described based on the feedback provided and, where able, excerpts from relevant comments are included.

- Support for updates to membership requirements
- Multiple lab directors
- Collaboration with other organizations/stakeholders
- Written Agreements Between Programs
- Other Comments/Considerations

## Support for Updates to Membership Requirements

As previously mentioned, there was overall support for this proposal. Many commenters agreed with the update of membership requirements to align with CLIA requirements.

The American Society of Transplantation (AST) stated that “aligning OPTN Bylaws (now OPTN Management and Membership Requirements)<sup>24</sup> with CLIA regulations...stands to simplify the regulatory landscape, reducing the burden on laboratories that must navigate multiple sets of rules.”

<sup>24</sup> This proposal was originally drafted using the former structure of the OPTN Policies and OPTN Bylaws. On July 24, 2024, the OPTN adopted a new structure of governance, splitting the OPTN Bylaws into two documents: the OPTN Bylaws and OPTN Membership and Management Policies. The references to the affected provisions have been updated to match the format adopted in July. For more information, please see the OPTN proposal *Revised Bylaws and Management and Membership Policies*, available at [https://optn.transplant.hrsa.gov/media/g1hfnqvs/specialpc\\_invest\\_combinedoc.pdf](https://optn.transplant.hrsa.gov/media/g1hfnqvs/specialpc_invest_combinedoc.pdf).

## Multiple lab directors

Commenters had mixed sentiment on the membership requirement updates permitting multiple OPTN-approved laboratory directors at a single histocompatibility lab.

The Association of Organ Procurement Organizations (AOPO) voiced support and commented that this change “eliminates duplicative administrative work by permitting any individual who fulfills the requirements of a laboratory director to submit an extensive and specific portfolio to the OPTN one time to become approved as an OPTN laboratory director, regardless of whether another individual is already serving as a primary director at the same laboratory.”

Region 4 expressed concern in permitting multiple lab directors and recommended that OPTN policy explicitly define the role of “Lab Director”. It was noted that the term “Histo Lab Director” is not consistently defined and in some labs, this role can overlap with the CLIA lab director, while in others, it does not. Additionally, members in Region 4 highlighted challenges posed when the CLIA lab director specializes in another field, especially regarding clinical consultant roles.

The Committee determined no changes in defining roles was needed as the proposal includes the various roles and responsibilities.

The Committee discussed the proposed removal of pathways from current policy and decided to further clarify proposed language that the histocompatibility laboratory director must meet all the qualifications and fulfill the responsibilities for technical supervisor for histocompatibility. The Committee reasoned that this needed to be specified as there was agreement in an overlap in roles of the histocompatibility laboratory director and technical supervisor for histocompatibility. Additionally, the Committee agreed to cite the specific responsibilities outlined in CLIA regulations.

## Collaboration with other organizations/stakeholders

There were comments in support of the OPTN collaborating with other organization/stakeholders as it pertains to their established processes and procedures. Additionally, there were commenters who suggested deferring to these organizations (i.e. American Society for Histocompatibility and Immunogenetics (ASHI) on their established requirements for education and training of histocompatibility personnel to avoid redundancy and potential burden on members.

The Committee decided no modifications were needed to the proposal. The Committee has and will continue to collaborate with other organizations/stakeholders and will work to ensure alignment with OPTN guidance and policy.

## Written agreements between programs

The Committee asked for feedback on the proposed written agreements between histocompatibility labs, transplant hospitals and organ procurement organizations (OPOs). Overall, commenters were in support of these written agreements. ASHI voiced opposition to service agreements for histocompatibility laboratories that are OPO-based. There were also comments related to the agreements made related to turnaround times on specimens and storage time for specimens for repeat

or future testing; some comments were in support of these agreements while one comment suggested deferring to the parties involved to make those agreements.

The Committee decided no modifications were needed.

## Other comments/considerations

The AOPO noted that the Committee proposes a required process for “reporting of HLA results to the OPTN and verification of results, including verification if changes occur,” however, the proposal is silent regarding the process laboratories should use to report physical and virtual crossmatch results.

Additionally, AOPO commented that the Committee fails to explain how laboratories should document or “prove” results have been verified, and further, the proposal lacks any guidance explaining how laboratories can document that results have been verified when there is no change following verification. AOPO stated that they cannot support this part of the proposal as written because it is unclear and lacks a framework for compliance.

The Committee discussed the need for programs to discuss and include these components within their written agreements to clarify these processes further. The Committee decided no modifications were needed to the proposed membership requirements language.

## Compliance Analysis

### NOTA and OPTN Final Rule

The Committee submits this proposal under the authority of the National Organ Transplant Act (NOTA) which requires the OPTN to “establish membership criteria...and provide to members of the public an opportunity to comment with respect to such criteria.”<sup>25</sup> This proposal reviews membership criteria for histocompatibility laboratory members.

### OPTN Strategic Plan<sup>26</sup>

- *Aligns with other important initiative*

This proposal aligns with an other important initiative. This proposal will ensure that the OPTN requirements will align with applicable CLIA regulatory changes set to go into effect on December 28, 2024. It will also reduce redundancies in requirements across regulatory bodies and promote efficiency in administration of the OPTN.

## Implementation Considerations

### Member and OPTN Operations

#### *Operations affecting Histocompatibility Laboratories*

Histocompatibility laboratories will need to be aware of the new requirements, and personnel may require training. Laboratories will need to evaluate their transplant hospital and OPO agreements to

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<sup>25</sup> 42 USC §274(b)(2)(B).

<sup>26</sup> OPTN Executive Committee. *Briefing to the OPTN Board of Directors on Strategic Plan 2024-2027*. June 2024. Available at: <https://optn.transplant.hrsa.gov/media/h51awrli/exec-strategic-plan-briefing-paper.pdf>.

ensure they meet the new requirements. Histocompatibility laboratories may also choose to submit additional laboratory director applications, but are not required to do so. They will need to identify and provide the name of the person serving as the primary data coordinator.

### *Operations affecting Organ Procurement Organizations*

OPOs may need to alter their agreements with laboratories if they do not meet the new requirements.

### *Operations affecting Transplant Hospitals*

Transplant hospitals may need to alter their agreements with laboratories if they do not meet the new requirements.

### *Operations affecting the OPTN*

The OPTN may need to alter laboratory key personnel forms, as well as the processing of reviewing new laboratory directors. There may be an increase in the number of laboratory director applications to review, should laboratories choose to submit additional directors.

This proposal requires the submission of official OPTN data that are not presently collected by the OPTN. The OPTN has agreed that data collected pursuant to the OPTN's regulatory requirements in §121.11 of the OPTN Final Rule will be collected through OMB approved data collection forms. Therefore, after OPTN Board approval, the forms will be submitted for OMB approval under the Paperwork Reduction Act of 1995. This will require a revision of the OMB-approved data collection instruments, which may impact the implementation timeline.

## Projected Fiscal Impact

### *Projected Impact on OPTN Members*

There is no anticipated fiscal impact for organ procurement organizations or transplant hospitals. There is no anticipated fiscal impact for histocompatibility laboratories. Impacts related to the overall implementation of CLIA regulations are estimated in the Federal Register Final Rule notice.<sup>27</sup>

### *Projected Impact on the OPTN*

It is estimated that \$16,011 would be needed to implement this proposal. Implementation would involve reviewing and preparing implementation communications and educational materials, updating external facing member forms and templates, and updating the Evaluation Plan. Additionally, an increase in member engagement leading up to implementation is expected, including collecting and processing the primary data coordinator roles at all labs. It is estimated that \$13,812 will be needed for ongoing support. Ongoing support includes the review of additional histocompatibility laboratory director key personnel applications with the new ability to have multiple lab directors. In addition,

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<sup>27</sup> Centers for Medicare and Medicaid Services, *Clinical Laboratory Improvement Amendments of 1988 (CLIA) Fees; Histocompatibility, Personnel, and Alternative Sanctions for Certificate of Waiver Laboratories*. Federal Register, 12/28/2023. <https://www.federalregister.gov/documents/2023/12/28/2023-28170/clinical-laboratory-improvement-amendments-of-1988-clia-fees-histocompatibility-personnel-and>.



ongoing support includes consulting on member questions, evaluation and monitoring of data, and follow-up. The total for implementation and ongoing support is estimated to be \$29,823.<sup>28</sup>

## Post-implementation Monitoring

### Member Compliance

Although the requirements of histocompatibility labs for membership to the OPTN have changed, the process for OPTN review of applications for membership remains the same and the responsibilities for applicants to submit a complete application will not change. The detailed application process will be made available on the OPTN website on the compliance and evaluation page.

The OPTN will collaborate with accrediting bodies to ensure standards are maintained. If a histocompatibility laboratory is found to be out of compliance, the MPSC will work with the member to help them come into compliance with the membership requirements. Members who are currently in compliance with OPTN membership requirements will not need to reaffirm compliance to the new requirements. Members who submit new applications will be required to meet the new membership requirements, once implemented.

### Policy Evaluation

Not applicable.

## Conclusion

This proposal will clarify and update histocompatibility membership requirements as well as align with upcoming CLIA changes. The update to the Histocompatibility membership requirements will address the following areas of change:

- Allow multiple OPTN-approved laboratory directors at a histocompatibility lab, with one primary laboratory director responsible for OPTN operations
- Update laboratory director education and training requirements to align with CLIA regulations
- Clarify and expand requirements for laboratory agreements with transplant hospitals and organ procurement organizations (OPOs)
- Modify required personnel and add a primary data coordinator to act as the point of contact for the OPTN
- Update laboratory subcontracting requirements and remove requirement for the laboratory director to review and approve all subcontracting results before release
- Expand inactivation and withdrawal notification requirements
- Remove requirements that are redundant to other existing regulatory requirements for labs and clarify language

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<sup>28</sup> Resource estimates are calculated by the current contractor for that contractor to perform the work. Estimates are subject to change depending on a number of factors, including which OPTN contractor(s) will be performing the work, if the project is ultimately approved.

Following public comment, the Committee updated the definition of a laboratory director to align with the requirements for a CLIA technical supervisor.

The proposed changes will allow for consistent practices and compliance with CLIA regulations.

# OPTN Management and Membership Policies

## Language<sup>29</sup>

Proposed new language is underlined (example) and language that is proposed for removal is struck through (~~example~~). Heading numbers, table and figure captions, and cross-references affected by the numbering of these policies will be updated as necessary.

### 1 **Appendix C: Membership Requirements for Histocompatibility**

#### 2 **Laboratories**

##### 3 **C.1 Histocompatibility Laboratory Compliance**

4 ~~Each~~ By accepting membership in the OPTN, histocompatibility laboratory members must  
5 comply with all OPTN Obligations according to *OPTN Management and Membership Policy 6.1.E:*  
6 *Member Compliance* and must meet both of the following;

- 7
- 8 ~~1.~~ The requirements in the Clinical Laboratory Improvement Amendments (CLIA) at 42 CFR §  
9 493.1278 Standard: Histocompatibility, unless exempt. Laboratories that are exempt due to  
10 being in state that is exempt from CLIA must meet the requirements for state licensure  
11 including standards for histocompatibility.
- 12 ~~2.~~ The requirements as they apply to solid organ and islet transplantation, of the American  
13 Society for Histocompatibility and Immunogenetics (ASHI) 2013 Revised Standards for  
14 Accredited Laboratories, or the College of American Pathologists (CAP) Histocompatibility  
15 Checklist, Laboratory General Checklist, Flow Cytometry Checklist, and Team Leader  
16 Assessment of Director and Quality Checklist as of April 21, 2014. This requirement does  
17 not mandate membership in either ASHI or CAP.

18

19 If any regulatory agency takes a final adverse action against a histocompatibility laboratory, the  
20 laboratory must notify the OPTN in writing within 10 business days. The histocompatibility  
21 laboratory must also provide all documents relating to the final adverse action to the OPTN.

22

23 The histocompatibility laboratory must notify the OPTN of any change in location or address of  
24 its primary location at least 30 days prior to the change.

##### 25

##### 26 **C.2 Facilities, Personnel and Resources**

27 Histocompatibility laboratories must have ~~considerable~~ facilities, equipment, personnel and  
28 resources to ensure accurate, reliable and efficient testing.

29

<sup>29</sup> This proposal was originally drafted using the former structure of the OPTN Policies and OPTN Bylaws. On July 24, 2024, the OPTN adopted a new structure of governance, splitting the OPTN Bylaws into two documents: the OPTN Bylaws and OPTN Management and Membership Policies. The references to the affected provisions have been updated to match the format adopted in July. For more information, please see the OPTN proposal *Revised Bylaws and Management and Membership Policies*, available at [https://optn.transplant.hrsa.gov/media/g1hfngvs/specialpc\\_invest\\_combinedoc.pdf](https://optn.transplant.hrsa.gov/media/g1hfngvs/specialpc_invest_combinedoc.pdf).

30 **A. Facilities**

31 The laboratory must have:

- 32
- 33 1. Enough space and equipment so that procedures and tests can be performed accurately and
  - 34 efficiently.
  - 35 2. Adequate facilities to store medical and test records for candidates, recipients, and donors.
- 36

37 **B. Records Access**

38 Records for active candidates must be immediately accessible onsite. Records for recipients and

39 donors must be accessible as necessary to meet the clinical practice needs of any associated

40 transplant hospital or OPO.

41

42 **CA. Transplant Program Affiliation**

43 Histocompatibility laboratories must have written agreements with every transplant program

44 the laboratory serves, unless clinical urgency prevents such an agreement. Written agreements

45 between histocompatibility laboratories and transplant programs must include *all* of the

46 following:

47

- 48 1. HLA Typing Requirements:
  - 49 • Sample requirements
  - 50 • Loci and level of resolution typed
  - 51 • Process for reporting of HLA results to the OPTN and verification of results, including
  - 52 verification if changes occur
  - 53 • Expected turnaround time from receipt of sample to reporting results to the transplant
  - 54 program and process of notification if turnaround time is going to be exceeded
  - 55 • Process for resolving discrepancies and errors
- 56
- 57 2. Crossmatching Requirements:
  - 58 • Sample requirements for both donors and recipients
  - 59 • Methodology and criteria for physical crossmatching
  - 60 • Criteria for virtual crossmatching, if performed
  - 61 • Process to obtain sensitization history for each patient
  - 62 • Process for reporting of physical or virtual crossmatching results to the transplant
  - 63 hospital and verification of results, including verification if changes occur
  - 64 • Expected turnaround time from receipt of sample to reporting results to the transplant
  - 65 program and process of notification if turnaround time is going to be exceeded
- 66
- 67 3. Antibody Screening:
  - 68 • Sample requirements
  - 69 • Methodology
  - 70 • Frequency of sample collection
  - 71 • Frequency of antibody screenings

- 72 • Criteria for determining unacceptable antigens used during organ allocation
- 73 • Process for reporting unacceptable antigens to the OPTN and verifying unacceptable
- 74 antigen data at time of registration and if changes occur
- 75 • Expected turnaround time from receipt of sample to reporting results to the transplant
- 76 program and process of notification if turnaround time is going to be exceeded
- 77 • If post-transplant monitoring is performed, include protocol for monitoring donor-
- 78 specific antibodies
- 79 • If desensitization is performed, include protocol for monitoring antibody testing and
- 80 reporting

81

82 4. If the laboratory registers candidates for the transplant program, include a process for blood

83 type verification according to *OPTN Policy 3.3: Candidate Blood Type Determination and*

84 *Reporting before Waiting List Registration.*

- 85
- 86 1. ~~The sample requirements for typing and crossmatching.~~
- 87 2. ~~The loci and level of resolution typed.~~
- 88 3. ~~A process for requesting extended HLA typing.~~
- 89 4. ~~A process for reporting and verifying HLA and unacceptable antigen data at the time of~~
- 90 ~~registration on the waiting list and any time there are changes.~~
- 91 5. ~~A process for reporting HLA typing results to the OPTN.~~
- 92 6. ~~A process for resolving HLA typing discrepancies and errors.~~
- 93 7. ~~The maximum turnaround time from receipt of sample to reporting of results to the~~
- 94 ~~transplant program.~~
- 95 8. ~~A process to obtain sensitization history for each patient.~~
- 96 9. ~~The frequency of periodic sample collection.~~
- 97 10. ~~The frequency of antibody screenings.~~
- 98 11. ~~The criteria for crossmatching.~~
- 99 12. ~~The assay format that will be used for antibody screening and for crossmatching.~~
- 100 13. ~~The criteria for determining unacceptable antigens used during organ allocation.~~
- 101 14. ~~The duration for which specimens need to be stored for repeat or future testing.~~
- 102 15. ~~If desensitization will be performed, then a protocol for monitoring antibody levels.~~
- 103 16. ~~If the laboratory registers candidates for the transplant program, then a process for blood~~
- 104 ~~type verification according to *Policy 3.3: Candidate Blood Type Determination before Waiting*~~
- 105 ~~*List Registration.*~~
- 106 17. ~~If post-transplant monitoring is performed, then a protocol for monitoring antibody levels.~~

107

108 **DB. OPO Affiliation**

109 Histocompatibility laboratories must have written agreements with every OPO member the

110 laboratory serves, unless clinical urgency prevents such an agreement. Written agreements

111 between histocompatibility laboratories and OPOs must include *all* of the following:

112

- 113 1. HLA Typing Requirements:
- 114 • Sample requirements

- 115 • Loci and level of resolution typed
- 116 • Process for verifying and reporting results to the OPO and the OPTN
- 117 • Expected turnaround time from receipt of donor sample to reporting results to the OPO
- 118 and process of notification if turnaround time is going to be exceeded
- 119 • Process for resolving discrepancies and errors
- 120 2. Crossmatching Requirements:
- 121 • Sample requirements for both donors and recipients
- 122 • If OPO-contracted laboratory performs crossmatching, methodology and criteria for
- 123 physical crossmatching as well as interpretation and reporting of results.
- 124 • Process for reporting of crossmatching results to the OPO or transplant hospital and
- 125 verification of results, including verification if changes occur
- 126 • Expected turnaround time from receipt of donor sample to reporting results to the OPO
- 127 and process of notification if turnaround time is going to be exceeded

128

129 3. The length of time for which donor specimens are to be stored for repeat or future testing

130

- 131 ~~1. The sample requirements for typing and crossmatching.~~
- 132 ~~2. The loci and level of resolution typed.~~
- 133 ~~3. A process for requesting extended HLA typing.~~
- 134 ~~4. A process for verifying and reporting HLA typing results to the OPTN.~~
- 135 ~~5. A process for resolving HLA typing discrepancies and errors.~~
- 136 ~~6. The maximum turnaround time from receipt of donor sample to reporting of results to the~~
- 137 ~~OPO.~~
- 138 ~~7. A process for prioritizing donors for histocompatibility testing.~~
- 139 ~~8. The length of time for which donor specimens are required to be stored for repeat or future~~
- 140 ~~testing.~~
- 141 ~~9. If the OPO performs crossmatching, then all methods used for crossmatching and the~~
- 142 ~~interpretation and reporting of the results.~~

143

144 **C. Personnel Requirements**

- 145 1. All personnel must be licensed or meet the standards required by federal, state and local
- 146 regulations.

147 The histocompatibility laboratory must require that all laboratory staff complete all

148 continuing education and testing required to maintain accreditation by federal, state, and

149 local regulatory agencies.

- 150 2. Each histocompatibility laboratory must identify a Primary Data Coordinator and provide the
- 151 name of the individual to the OPTN. The primary data coordinator serves as the point of
- 152 contact for questions and communications from the OPTN on data submission.

153

154 **C.3 Histocompatibility Laboratory Key Personnel**

155 The laboratory must employ a Primary histocompatibility laboratory director, a technical

156 supervisor, a clinical consultant, and a general supervisor, and a clinical consultant. One person

157 individual may fill one or more positions. The laboratory may employ additional  
 158 histocompatibility laboratory directors, but only one may serve as the Primary histocompatibility  
 159 laboratory director of record with the OPTN. If an individual serves as histocompatibility  
 160 laboratory director for more than one laboratory, that individual cannot serve in the general  
 161 supervisor position.

162  
 163 The size and training of the histocompatibility laboratory staff must be enough to carry out the  
 164 volume and variety of tests required to ensure accuracy and prompt completion of tests. All  
 165 personnel must be licensed or meet the standards required by federal, state and local  
 166 regulations.

167  
 168 If the laboratory provides histocompatibility testing for deceased kidney, kidney-pancreas, or  
 169 pancreas transplants, then the laboratory must have personnel for the required  
 170 histocompatibility testing available 24 hours a day, seven days a week.

#### 171 172 **A. Histocompatibility Laboratory Director Qualifications**

173 The histocompatibility laboratory director ensures that the laboratory provides high quality and  
 174 comprehensive histocompatibility and immunogenetics testing.

175  
 176 The histocompatibility laboratory director must meet all the qualifications and fulfill the  
 177 responsibilities for technical supervisor for histocompatibility according to CLIA, 42 CFR §  
 178 493.1449(h) and 42 CFR § 493.1451(a) – (b) respectively.

179  
 180 The histocompatibility laboratory director must meet the requirements for at least *one* of the  
 181 following pathways:

- 182  
 183 ■— Pathway 1:
- 184 1. Have an M.D. or D.O. from an accredited institution, or equivalent degree from another
  - 185 country
  - 186 2. Have a license to practice medicine in the state where the laboratory is located
  - 187 3. Be certified in anatomic and clinical or clinical pathology by the American Board of
  - 188 Pathology or the American Osteopathic Board of Pathology, or possess qualifications of
  - 189 those equivalent to those required for such certification
  - 190 4. Have at least two years full-time experience directing or supervising clinical
  - 191 histocompatibility testing for solid organ transplantation

- 192  
 193 ■— Pathway 2:
- 194 1. Have a doctoral degree in a medical, chemical, physical, biological, or clinical laboratory
  - 195 science from an accredited institution, or equivalent degree from another country
  - 196 2. Have at least two years full-time, post-doctoral experience or four years pre-doctoral
  - 197 experience in immunology, histocompatibility, or immunogenetics, and two years post-
  - 198 doctoral training in directing or supervising clinical histocompatibility testing for solid
  - 199 organ transplantation
  - 200 3. Have one of the following certifications

- ~~Diplomate by the American Board of Histocompatibility and Immunogenetics~~
- ~~Associate by the American College of Histocompatibility and Immunogenetics~~
- ~~Fellow by the American College of Histocompatibility and Immunogenetics~~
- ~~High complexity laboratory director by the American Board of Bioanalysis~~
- ~~Diplomate by the American Board of Medical Laboratory Immunology~~

~~A professional who holds an earned doctoral degree but who does not hold one of these certifications may qualify if they were serving as director of an accredited laboratory performing human histocompatibility and immunogenetics testing before February 24, 2003.~~

The MPSC will review, in consultation with the histocompatibility accrediting agencies, the credentials of professionals with foreign education or training and determine whether the foreign education or training is equivalent to that obtained in the United States, according to CLIA.

Any professional being considered for the position of histocompatibility laboratory director who has not served in the role of laboratory director at an OPTN-approved histocompatibility laboratory prior to the date of application must also provide *all* of the following:

- A portfolio of 50 cases, covered during the five years prior to the date of application that demonstrates the professional's analytical skills, ability to recognize and resolve testing and interpretation issues, and instances when the applicant made recommendations for additional testing or clinical care.
- Proof of active interaction with transplant professionals.
- A letter from the applicant that describes all experience in immunology and clinical histocompatibility testing, including a summary of time spent in the laboratory, technologies used, level of responsibility, and specific tasks performed.
- A current curriculum vitae or resume.
- Demonstrated participation in transplant or clinical laboratory professional conferences or publications in peer-reviewed journals.

~~All documentation that verifies training and experience must be sent directly to the OPTN from all directors of histocompatibility laboratories where the training was obtained. A laboratory may appoint additional histocompatibility laboratory directors, but only one histocompatibility laboratory director may serve in the role as Primary. The Primary histocompatibility laboratory director is the person responsible for ensuring the operation and compliance of the laboratory according to the requirements set forth in these OPTN Management and Membership Policies. Additional histocompatibility laboratory directors must meet the qualifications to fulfill the responsibilities for histocompatibility laboratory director according to this section.~~

## **B. Technical Supervisor Qualifications**

The technical supervisor must meet all the qualifications and fulfill the responsibilities for laboratory director according to *C.3.A. Histocompatibility Laboratory Director Qualifications* above and for histocompatibility technical supervisor according to *42 CFR 493*.



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**C. Clinical Consultant Qualifications**

The clinical consultant must meet all the qualifications for laboratory director as outlined in C.3.A. Histocompatibility Laboratory Director Qualifications above and for histocompatibility clinical consultant according to 42 CFR 493.

**~~D.~~ General Supervisor Qualifications**

A general supervisor must meet the qualifications for a general supervisor according to 42 CFR 493 and have at least three years of experience in human histocompatibility or transplant immunology testing under the supervision of a qualified histocompatibility laboratory director or technical supervisor.

**~~D.~~ Histocompatibility Technologist Qualifications**

A histocompatibility technologist must meet the qualifications for a histocompatibility technologist according to 42 CFR 493 and must have had one year of supervised experience in human histocompatibility or transplantation immunology testing, regardless of academic degree or other training and experience.

**~~E.~~ Clinical Consultant Qualifications**

The clinical consultant must meet all the qualifications for laboratory director as outlined in C.3.A. Histocompatibility Laboratory Director Qualifications above and for clinical consultant according to 42 CFR 493.

**~~F.~~ Competency Testing and Continuing Education of Staff**

The laboratory must test its staff for competency in performing test procedures. The testing must be done annually, and must be completed for each type of test the staff performs.

The director, technical supervisor, and all technical staff must participate in continuing education in histocompatibility, immunogenetics or clinical transplantation as required for accreditation by national, state, and local regulatory agencies.

**C.4. Laboratory Coverage Plan**

The histocompatibility laboratory director, in conjunction with the technical supervisor, clinical consultant, and general supervisor, ~~and clinical consultant,~~ must submit a detailed Laboratory Coverage Plan to the OPTN. The Laboratory Coverage Plan must describe how continuous coverage is provided by laboratory personnel.

The laboratory must submit an updated Laboratory Coverage Plan when any key personnel accepts additional responsibilities for more than 30 days at another laboratory. The updated coverage plan must be submitted to the OPTN within 30 days of the key personnel accepting the additional responsibilities.

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The Laboratory Coverage Plan must address *all* of the following:

1. The laboratory must document that qualified key personnel are providing coverage at all times, including during the entire application process for changes in key personnel, regardless of the status of the application.
2. The laboratory must document that the laboratory director, technical supervisor, clinical consultant, and general supervisor, ~~and clinical consultant~~ are available to provide onsite, telephone, or electronic consultation to facilitate organ acceptance and transplantation.
3. The laboratory must document if any of the responsibilities designated to the laboratory director, technical supervisor, or clinical consultant will be performed by other laboratory staff. This documentation must include a list of the duties delegated, the times when the duties will be delegated, the qualifications of the staff that will perform the delegated duties, and the quality systems in place to ensure the duties are correctly performed.
4. If the laboratory is engaged in histocompatibility testing for deceased kidney, kidney-pancreas, or pancreas donor transplants, then the laboratory must document that key personnel and qualified testing personnel are available 24 hours a day, 7 days a week to provide laboratory coverage, unless a written explanation is provided that justifies the current level of coverage to the satisfaction of the MPSC.
5. If any key personnel serves more than one histocompatibility laboratory, then the Laboratory Coverage Plan must specify how continuous coverage will be provided at each histocompatibility laboratory served.

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## **C.5 Changes in Key Laboratory Personnel**

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### **A. Change in Laboratory Director, Technical Supervisor, Clinical Consultant, or General Supervisor, ~~or Clinical Consultant~~**

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When the histocompatibility laboratory is informed that the laboratory director, technical supervisor, clinical consultant, or general supervisor, ~~or clinical consultant~~ plans to leave or otherwise ends active participation in the laboratory, the laboratory must:

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1. Notify the OPTN in writing within seven business days of when the laboratory becomes aware of the change in key personnel.
2. Submit a completed Personnel Change Application to the OPTN no less than 30 days before the end of the individual's active employment or change in status. The Personnel Change Application must document that the new or acting laboratory director, technical supervisor, clinical consultant and general supervisor, ~~and clinical consultant~~ meet the requirements of OPTN policies.
3. Submit an updated Laboratory Coverage Plan no less than 30 days before the date of departure that specifies how continuous coverage will be provided at the laboratory by all key personnel during and after the transition period to a new or acting laboratory director, technical supervisor, ~~or clinical consultant~~, or general supervisor.
4. If the histocompatibility laboratory receives less than 60 days notice of the key personnel change, then the laboratory must submit a completed Personnel Change Application and

328 updated Laboratory Coverage Plan to the OPTN within 30 days ~~of the date of departure~~  
 329 from the date the OPTN was notified.

330

331 A change in key personnel can be any of the following:

332

333 1. Departure of the director, technical supervisor, clinical consultant, or general supervisor,~~or~~  
 334 clinical consultant.

335 2. Any key personnel unavailable to perform responsibilities for more than 30 days.

336 3. Reinstatement of the previously designated laboratory director, technical supervisor, clinical  
 337 consultant, or general supervisor,~~or clinical consultant.~~

338 4.~~Any key personnel that accepts additional responsibilities for more than 30 days at another~~  
 339 ~~histocompatibility laboratory.~~

340

### 341 **B. Failure to Notify the OPTN of Key Personnel Changes**

342 A histocompatibility laboratory's failure to inform the OPTN of a change in the laboratory  
 343 director, technical supervisor, clinical consultant, or general supervisor,~~or clinical consultant~~ or  
 344 to submit the required Personnel Change Application within the periods specified will be  
 345 considered a noncompliance with OPTN Obligations that may result in an OPTN action according  
 346 to *Appendix L: Reviews and Actions.*

347

### 348 **C. Rejected Key Personnel Change Applications**

349 The MPSC must offer the applicant an interview if the MPSC rejects a Key Personnel Change  
 350 application. The applicant may also be entitled to a hearing with the MPSC and an appearance  
 351 before the Board of Directors. Any interviews, hearings, or Board of Directors appearances that  
 352 occur as part of the Key Personnel Change application process will be conducted according to  
 353 *Appendix L: Reviews and Actions.*

354

## 355 ~~C.6 Histocompatibility Laboratory Policies and Procedures~~

### 356 ~~A. Criteria for Mandatory Performance Review a Histocompatibility Laboratory~~

357 The OPTN may review a histocompatibility laboratory if at any time it has *any* of the following  
 358 performance indicators:

359

360 ~~■ Failure to comply with the requirements and regulations according to *Section C.1:*~~  
 361 ~~*Histocompatibility Laboratory Compliance.*~~

362 ~~■ Any of the following performance indicators on external proficiency testing:~~

363 1.~~Less than 100% satisfactory performance in an ABO external proficiency testing~~  
 364 ~~program.~~

365 2.~~For programs other than ABO, a less than 80% satisfactory performance on more than~~  
 366 ~~one external histocompatibility proficiency testing program within the previous twelve~~  
 367 ~~months.~~

368 ~~■ Accreditation revoked by any OPTN approved histocompatibility regulatory agency.~~

369 ~~■ A focused re-inspection by any OPTN approved histocompatibility regulatory agency.~~

- 370 ~~■—Restrictions imposed on the laboratory by any OPTN-approved histocompatibility regulatory~~
- 371 ~~agency.~~
- 372 ~~■—One or more HLA typing or reporting errors on a deceased or living donor that results or~~
- 373 ~~could result in an incompatible transplant or the re-allocation of an organ to someone other~~
- 374 ~~than the intended recipient.~~
- 375 ~~■—Unresolved or repeat deficiencies identified during inspections conducted by OPTN~~
- 376 ~~approved regulatory agencies that are in violation of OPTN standards. When deficiencies are~~
- 377 ~~cited, laboratories must document that the deficiencies have been corrected.~~
- 378 ~~■—Complaints from transplant programs, OPOs, or other clients that have not been~~
- 379 ~~documented, investigated and resolved.~~
- 380 ~~■—Incomplete submission of all OPTN forms or forms not submitted within the 180 day time~~
- 381 ~~limit.~~

382

## 383 **B. Information Required from Laboratories with Unsatisfactory Performance**

384 The OPTN may request at any time from a histocompatibility laboratory with unsatisfactory  
385 performance *any* of the following:

386

- 387 ~~■—Letters from the affiliated transplant program or OPO staff describing the level of~~
- 388 ~~interaction and involvement of the director, technical supervisor and clinical consultant.~~
- 389 ~~■—Interviews with transplant program or OPO staff.~~
- 390 ~~■—Laboratory complaint log and documentation of resolutions from other healthcare~~
- 391 ~~professionals.~~
- 392 ~~■—Samples of laboratory reports that demonstrate the review of patient history, notation of~~
- 393 ~~unusual results, and recommendations for additional testing.~~
- 394 ~~■—Documentation of any professional extracurricular commitments, including estimates of~~
- 395 ~~time required, for laboratory director, technical supervisor, general supervisor, and clinical~~
- 396 ~~consultant outside of the histocompatibility laboratory.~~
- 397 ~~■—Quality Assessment and Performance Improvement records.~~
- 398 ~~■ Other material as requested.~~

399

## 400 **C. Inactive Status**

401 A histocompatibility laboratory that is voluntarily inactive, declared inactive or withdraws from  
402 membership will be ineligible and may not provide histocompatibility testing to any OPTN  
403 members.

404

## 405 **C.76 Histocompatibility Laboratory Testing Requirements**

### 406 **A. Subcontracting**

407 If a histocompatibility laboratory refers testing to another laboratory, the subcontracting  
408 laboratory must be *both*:

409

1. ~~CLIA certified, or unless exempt under federal law.~~
2. ~~OPTN-approved.~~

~~The laboratory director must review and approve all test results returned from the subcontracting laboratory before release. The identity of the subcontracting laboratory and that portion of the testing for which it bears responsibility must be noted in the report of the histocompatibility laboratory. A copy of the testing laboratory's report must be kept on file by the laboratory receiving the results.~~

## **B. Submission Requirements for New Laboratories**

If a laboratory seeking OPTN membership has not previously been approved as an OPTN histocompatibility laboratory member, then the laboratory must submit procedures and test validation data for all categories and methods of testing performed to the OPTN upon request.

## **C.7. Inactivation and Withdrawal of OPTN Membership**

A histocompatibility laboratory that is voluntarily inactive or withdraws from OPTN membership may not provide histocompatibility testing to OPTN members.

### **A. Inactivation**

A histocompatibility laboratory that is unable to provide histocompatibility testing for 15 or more consecutive days should voluntarily inactivate its OPTN membership. Voluntary inactivation may extend for a period of up to 12 months. The histocompatibility laboratory may request an extension beyond 12 months by making a request to the MPSC. The request must include a comprehensive plan with a timeline for resuming histocompatibility testing.

The histocompatibility laboratory must provide written notice to the OPTN of its inactivation, including the reasons for the inactivation.

A histocompatibility laboratory that voluntarily inactivates its membership in the OPTN must provide written notice to all OPTN members with which it has a contractual agreement no later than 7 days after inactivation. The histocompatibility laboratory must provide the OPTN a list of all organizations to whom it sent notice, along with information regarding the mode of notice and an example of the notice sent.

### **B. Withdrawal**

A histocompatibility laboratory that intends to withdraw its OPTN membership status must provide written notice to the OPTN, including the effective date and reasons for withdrawal, at least 30 days prior to the anticipated date of the withdrawal.

A histocompatibility laboratory that withdraws its membership in the OPTN must provide written notice to all OPTN members with which it has a contractual agreement at least 30 days prior to the anticipated date of withdrawal. The histocompatibility laboratory must provide the

452 OPTN a list of all organizations to whom it sent notice, along with information regarding the  
453 mode of notice and an example of the notice sent.

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## Appendix A: Post-Public Comment Changes

New language that was proposed following public comment is underlined and highlighted (**example**); language that is proposed for removal following public comment is struck through and highlighted (**example**).

### **Excerpt from *OPTN Management and Membership Policy C.3.A: Histocompatibility Laboratory Director Qualifications*<sup>30</sup>**

The histocompatibility laboratory director ensures that the laboratory provides high quality and comprehensive histocompatibility and immunogenetics testing.

The histocompatibility laboratory director must meet all the qualifications and fulfill the responsibilities for ~~high complexity laboratory director~~ **technical supervisor for histocompatibility** according to CLIA, 42 CFR § 493.14439 (h) and 42 CFR § 493.1451 (a) – (b) respectively.

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<sup>30</sup> This proposal was originally drafted using the former structure of the OPTN Policies and OPTN Bylaws. On July 24, 2024, the OPTN adopted a new structure of governance, splitting the OPTN Bylaws into two documents: the OPTN Bylaws and OPTN Management and Membership Policies. The references to the affected provisions have been updated to match the format adopted in July. For more information, please see the OPTN proposal *Revised Bylaws and Management and Membership Policies*, available at [https://optn.transplant.hrsa.gov/media/g1hfngvs/specialpc\\_invest\\_combinedoc.pdf](https://optn.transplant.hrsa.gov/media/g1hfngvs/specialpc_invest_combinedoc.pdf).